Fall 19

Consortium of Operative Dentistry Educators (CODE)

Annual National Report: Regions I - VI

Prepared by:

Gary L. Stafford DMD – National Director

gary.stafford@mu.edu

TABLE OF CONTENTS

2019 National Director's Update……5

Origins of CODE……8

Organizational Operation……11

CODE Advisory Committee……13

Regions and Schools……15

2019 Regional Meeting Hosts……19

2020 Regional Meeting Hosts……20

2019 Regional Meeting Reporting/2020 National Meeting Information……21

2019 National Agenda……23

2020 CODE Regional Meeting Report Form……25

2020 CODE Regional Meeting Attendee's Form……27

2019 Regional Reports:

Region I (Pacific)……31

Region II (Midwest)……127

Region III (South Midwest)……185

Region IV (Great Lakes)……247

Region V (Northeast)……328

Region VI (South)……340

National Director's Update

The six regions of the Consortium of Operative Dentistry Educators each reported that their individual fall meetings were not only successful, but as is typical with these meetings, enjoyable. The year officially began during the Academy of Operative Dentistry's Annual Meeting which was held at the Drake Hotel in Chicago, IL on Thursday, February 21st and Friday, February 22nd, 2019. CODE's Annual National Meeting, which was held on Thursday, included a presentation by Dr. Jay Morrow on "*Students Teaching Students; The Value of Peer-to-Peer Learning"*. Dr. Morrow is the Associate Dean for Preclinical Education at Midwestern University College of Dental Medicine-AZ and represented Region I.

Given that our annual dues remain low, we are by definition, a lean and mean operation and it is necessary that we function in that regard. Our organization could not operate were it not for the diligent efforts of our six Regional Directors and each of the hosts/host schools for the fall meetings. Their willingness to devote the energy necessary to coordinate the meetings and garner financial support from their parent institutions and corporate sponsors is noteworthy. Their work helps to ensure that the meetings are as memorable as they are productive. Speaking on behalf of the membership, we thank each of you for your commitment to the Consortium.

Meeting the stated goal of 100% active membership by U.S. Dental Schools remains a challenge, especially since institutional membership and support of CODE through annual dues payments declined slightly during 2019. As the Regional Director's understand, collecting our annual dues is one of the most difficult aspects of their volunteer position. Given the relatively small amount of our annual dues, payment can be easily overlooked by an institution's administration. Therefore, it is necessary for each member school to have a CODE Representative that will provide the appropriate follow-up and ensure that the payments are made to CODE in a timely fashion. With 2017 and 2018 as comparison, the breakdown of participation in CODE on a regional and national level is as follows:

Region	2019 US Schools	2019 Canadian Schools	2018 US Schools	2018 Canadian Schools	2017 US Schools	2017 Canadian Schools
I – Pacific	13/13 = 100%	2/2 = 100%	13/13 = 100%	2/2 = 100%	13/13 = 100%	2/2 = 100%
II – Midwest	8/9 = 89%	2/2 = 100%	8/9 = 89%	1/2 = 50%	8/9 = 89%	2/2 = 100%
III – South Midwest	6/7 = 86%	N/A	7/7 = 100%	N/A	7/7 = 100%	N/A

IV – Great Lakes	9/10 = 90%	1/1 = 100%	9/10 = 90%	1/1 = 100%	8/10 = 80%	1/1 = 100%
V – Northeast	13/14 = 93%	1/5 = 20%	11/14 = 79%	2/5 = 40%	13/14 = 93%	3/5 = 60%
VI – South	9/13 = 69%	N/A	12/13 = 92%	N/A	11/13 = 85%	N/A
National Totals:	**58/66 = 88%**	**6/10 = 60%**	**60/66 = 91%**	**6/10 = 60%**	**60/66 = 91%**	**8/10 = 80%**

As you can see, we have remained relatively constant over the course of the last three years and 2019 still compares favorably to historical benchmarks. Our slight decline in 2019 can be attributed to schools that did not send in their payment but that have historically maintained active membership. This would most likely be the result of an institutional oversight and/or lack of follow-up by the CODE representative for that school. That being said, our goal remains to have 100% participation by the dental schools in the United States. While I am proud of the level of institutional participation, I would ask each CODE Representative that if your school is listed as one of those not being an active member (see the Schools and Regions section of the 2019 Annual National Report at www.unmc.edu/code), please help facilitate payment by following up with the individual who is responsible for sending in the annual dues. Please contact me directly at staffoga@ohsu.edu with any questions you might have or assistance you might require.

During 2019, I accepted a new position at Oregon Health & Science University School of Dentistry as Senior Associate Dean for Academic Affairs. Regrettably, with the demands of the new position, I was unable to attend any of the Regional Meetings. I would like to extend my personal thanks to the following individuals who went to great lengths to ensure that the fall meetings were successful and that all of the attendee's had an informative and enjoyable few days.

- Region I Director, Dr. Rosemary McPharlin and hosts, Dr. Bernard Hurlbut and Dr. Davin Faulkner at the University of Nevada Las Vegas School of Dental Medicine.
- Region II Director, Dr. Christa Hopp and host, Dr. Brandon Crivello at the Missouri School of Dentistry & Oral Health.
- Region III Director, Dr.Shalizeh Patel and host, Dr. Joseph Connor at the University of Texas Health Science Center San Antonio School of Dentistry.

- Region IV Director and host, Dr. Michelle Kirkup at the Indiana University School of Dentistry.
- Region V Director and host, Dr. James Kaim at the University of New York College of Dentistry.
- Region VI Director and host, Dr. Roopwant Kaur at the University of East Carolina School of Dental Medicine.

I would also like to thank the Deans of each of the host schools for allowing us to visit their respective institutions and for providing us with meeting spaces, refreshments, and permission to tour their facilities. Similarly, I must thank our wonderful corporate sponsors who generously provide product demonstrations, presentations, and meals for those in attendance. As always, thanks must also go to Dr. William Johnson for his continued service as webmaster for the Consortium. Please continue to provide both he and I with any updates regarding your contact information.

Per CODE's Organizational Operation, we have three at-large members who serve on the CODE Advisory Committee. Their three-year terms are renewable but not to exceed two consecutive terms. All three of our at-large member's terms expire in 2019 and since each member has served for two consecutive terms, we must nominate and elect three new Advisory Committee members during the 2020 ADEA Section on Operative Dentistry and Biomaterials meeting. Please consider nominating someone or should you be willing to self-nominate, please email me directly and I will forward it to the Executive Council.

Dr. Hiroe Ohyama has agreed to deliver a presentation on "*Self-assessment with Digital Technology"* at the 2020 CODE Annual National Meeting that will be held at 5:10 pm in the Parkside Room of the Drake Hotel in Chicago, IL on Thursday, February 20th, 2020. Dr. Nagaoka is the Pre-doctoral Director of Operative Dentistry at Harvard University School of Dental Medicine and will be representing Region V. The Academy of Operative Dentistry continues to graciously provide support for this annual event so I would hope that many of you would be able to join us during the AOD's Annual Meeting. I will look forward to seeing you there. Until then, you have…

All my best,

Gary L. Stafford DMD
National Director – Consortium of Operative Dentistry Educators (CODE)

Origins of CODE

Project ACORDE (A Consortium of Restorative Dentistry Education)

The date usually cited as the starting point for the development of Project ACORDE is 1966. That year, in Miami, the Operative Dentistry Section of AADS formed a committee charged to plan for the cooperative development of teaching dental materials.

In July of 1971, the Dental Health Center, San Francisco, invited faculty from 14 dental schools to explore the feasibility of reaching consensus of a series of operative dental procedures. The outcome of the meeting suggested that it was feasible to achieve broad-based agreement on basic procedures: task analyses could be developed in which consensus could be reached on essential details of methods and instrumentation. The Project ACORDE committee was charged with the responsibility for coordinating curriculum development efforts on a national level in November of that year. Prominent in this project development were Bill Ferguson, David Grainger and Bob Wolcott.

The Broad Goals and Functions of this committee were:

1. To gain agreement among all participating dental schools on the teaching of operative dentistry functions and gain acceptance by all schools.
2. To produce materials which can be universally accepted and utilized for teaching dental students and expanded function auxiliaries.

During 1974, a 15-module package entitled Restoration of Cavities with Amalgam and Tooth-colored Materials was presented. The preparation package entitled Cavity Preparations for Amalgam and Tooth-colored Materials became available for distribution in March of 1976.

Project ACORDE was found to have produced three major benefits for dental education:

1. It opened new channels of communication among dental educators.
2. It suggested uniform standards of quality for the performance of restorative skills.
3. It produced numerous lesson materials that were useful both for teaching students and as models of developers of other lessons.

The benefit, most frequently cited by dental school faculty, was communication. The primary example of the communication begun by Project ACORDE, which has lasted well beyond the initial project, is CODE (Consortium of Operative Dentistry Educators). CODE has as its goal, the continuation of meetings for the purpose of information

exchange among teachers of operative dentistry. Regional CODE meetings are held annually with minutes of each session recorded and sent to the national director for distribution. This system is a direct spin-off of Project ACORDE.

The first annual session of CODE was held in 1974/75.

The Early Years (1974-1977)

As founding father of the concept, Robert B. Wolcott of UCLA assumed the role of national coordinator and appointed Frank J. Miranda of the University of Oklahoma as national secretary. A common agenda to be provided to all six regions was established at this time. The first regional meetings were held in the winter of 1974. During the first three years of operation, each region devised a system of rotation so that a different school hosted the regional meeting each year, thus providing a greater degree of motivation and bringing schools closer together in a spirit of fellowship and unity. Each region submitted suggestions for future agendas, thereby insuring a continued discussion of interesting and relevant topics. A collection of tests or a test bank was started in early 1976. This bank consisted of submitted written examination questions on specified topics that were compiled and redistributed to all schools.

The Transition Years (1977-1980)

The first indication that the future of CODE was in jeopardy came in 1977, the first year that a national report could not be complied and distributed. As the result of the efforts of a committee chaired by Dr. Wolcott, the original concept was renewed in 1980. Its leadership had been transformed from the structure of a national coordinator and secretary to a standing subcommittee under the auspices and direction of the Section of Operative Dentistry of the AADS.

The Reaffirmation Years (1997 - 1998)

During the 1997 meetings of both the Operative Dentistry Section Executive Council and the Business meeting of the Section, interest was expressed about reorganizing CODE and aligning it more closely with the Section. During the following year, fact-finding and discussions occurred to formulate a reorganization plan.

The plan was submitted for public comment at the 1998 meeting of the Operative Dentistry Section Executive Council and the Business meeting of the Section. At the conclusion of the Business meeting the reorganization plan was approved and implemented.

Reaffirmation of CODE official title (2003)

CODE changed its name from *Conference of Operative Dentistry Educators* to *Consortium of Operative Dentistry Educators* due to a ratification vote at the Fall 2003 Regional CODE meetings.

Establishment of Board of Directors and Articles of Incorporation

In 2013, Dr. Larry Haisch stepped down as National Director. The organization flourished under Larry's outstanding leadership and 15-year tenure as National Director. Bank accounts needed to be transferred to the new National Director's locale and name. In a post 9-11 society, bank accounts are not as easy to establish for non-profit organizations as they once were. The organization was compelled to establish a Board of Directors and write Articles of Incorporation in order to conduct regular organizational business. The Board of Directors consists of all Regional Directors as well as the At-Large Directors.

The Future of CODE

The official sponsorship by the Section of Operative Dentistry of ADEA (formerly ADDS) and the revised administrative structure of CODE are both designed to insure its continuance as a viable group. The original concepts, ideas and hopes for CODE remain unchanged and undiminished. Its philosophy continues to be based on the concept of dental educators talking with each other, working together, cooperating and standardizing, when applicable, their teaching efforts and generally socializing in ways to foster communication. There is every reason to believe that organizations such as CODE, and those developed in other fields of dentistry, will continue to crumble the barriers of provincialism and provide the profession with a fellowship that is truly national in scope.

This section was written by Larry D. Haisch, DDS – CODE National Director 1998 – 2012

Past and Current National Directors (Coordinators)

1974 - 1982	Robert B. Walcott DDS	University of California Los Angeles
1982 - 1986	Thomas A. Garmen DDS MS	University of Georgia
1986 - 1989	Frank J. Miranda DDS	University of Oklahoma
1989 - 1998	Marc A. Gale DMD M Ed	University of Florida
1998 - 2012	Larry D. Haisch DDS	University of Nebraska
2013 - 2015	Edward J. DeSchepper MA Ed DDS MSD	University of Tennessee
2016 - Present	Gary L. Stafford DMD	Oregon Health & Science University

Organizational Operation

The Section on Operative Dentistry and Biomaterials of the American Dental Education Association (ADEA) has "oversight" responsibility for sustaining and managing the activities of CODE.

- The Executive Council of the Operative and Biomaterials Section will appoint the National Director of CODE for a three-year renewable term.
- The National Director will be selected from a list of one or more individuals nominated for the position by the CODE Advisory Committee after input from the regions.
- The National Director will perform the functions and duties as set forth by the Council.
- The National Director will be a joint member on the Council and will be expected to attend a regional CODE meeting and the annual meeting of the Council and Section. The National Director may also serve as an elected officer of the Council.

A CODE Advisory Committee (and now also Board of Directors) will assist the National Director with his/her duties.

- A CODE Advisory Committee will consist of the Regional Directors from each of the six regions, the National Director and three at-large members.
- Each region will select their Regional Director. The National Director and/or the Executive Council may select the at-large member(s).
- The terms are three years, renewable, not to exceed two consecutive terms.
- The National Director serves as Chair of the Advisory Committee.

The annual CODE Regional meetings will serve as the interim meeting of the section. Some section business may be conducted at each CODE Regional meeting as part of the National agenda.

Regional Directors:

- Will be a member of ADEA and the section of Operative Dentistry
- Will oversee the conduct and operation of CODE in their respective region while working in concert with the national director
- Will have communication media capabilities including e-mail with the capability of transmitting attachments

- Will attend the region's meeting
- Ensure that meeting dates, host person and school are identified for the following year
- Do follow-up assist on dues "nonpayment" by schools
- Ensure that reports of regional meetings are submitted **within 30 days** of meeting conclusion to the National Director
- Ensure that individual school rosters (operative based) are current for the region
- Identify a contact person at each school
- Assist in determining the national agenda
- Other, as required

Advisory Committee

(Board of Directors)

Updated 12.31.19

	Region	Regional Directors	Phone/email	3 Year Term
I	Pacific	Rosemary McPharlin DDS Associate Professor Oregon Health & Science University School of Dentistry 2703 SW Moody Ave Portland, OR 97201	503.494.6209 mcpharli@ohsu.edu	2018 - 2021
II	Midwest	Christa Hopp DMD Associate Professor Restorative Department Southern Illinois University School of Dental Medicine 2800 College Ave. Alton, IL 62002	618.474.7052 chopp@siue.edu	2018 - 2021
III	South Midwest	Shalizeh A. Patel Associate Professor Department of Restorative Dentistry and Prosthodontics University of Texas Health Science Center at Houston, School of Dentistry SOD-5442 Houston, TX 77030	713.486.4269 Shalizeh.Patel@uth.tmc.edu	2020 - 2022
IV	Great Lakes	Michele L. Kirkup DDS Clinical Assistant Professor Department of Restorative Dentistry Indiana University College of Dentistry 1121 West Michigan St. Indianapolis, IN 46202	317.278.3398 mkirkup@iu.edu	2020 - 2022
V	Northeast	James M. Kaim DDS Professor Department of Cariology and Comprehensive Care New York University College of Dentistry Floor 6, 137 East 25th St. New York, NY 10010	212.995.4889 jmk2@nyu.edu	2020 - 2022
VI	South	Roopwant Kaur BDS, MS Clinical Assistant Professor East Carolina University School of Dental Medicine Greenville, NC 27834	252.737.7148 kaurr@ecu.edu	2018 - 2021
		At-Large Members	Phone/email	3 Year Term
II	At-Large	William W. Johnson DDS MS Professor and Vice Chair Department of Adult Restorative Dentistry University of Nebraska 4000 East Campus Loop South Lincoln, NE 68583-0740	402.472.9406 wwjohnson@unmc.edu	2016 -2019
III	At-Large	Edmond R. Hewlett DDS Professor Associate Dean for Outreach & Diversity University of California Los Angeles School of Dentistry 10833 Le Conte Ave., 23-088D CHS Los Angeles, CA 90095-1668	310.825.7097 edhewlett@dentistry.ucla.edu	2016 - 2019

VI	At-Large	Kevin B. Frazier DMD EdS Vice Dean Professor, Oral Rehabilitation Dental College of Georgia, GC 5210 Augusta University Augusta, GA 30912	706.721.2881 kfrazier@augusta.edu	2016 - 2019
II	Web Master	William W. Johnson DDS MS Professor and Vice Chair Department of Adult Restorative Dentistry University of Nebraska 4000 East Campus Loop South Lincoln, NE 68583-0740	402.472.9406 wwjohnson@unmc.edu	No Term
II	National Director	Gary L. Stafford DMD Associate Professor and Chair Department of General Dental Sciences Marquette University School of Dentistry 1801 W. Wisconsin Ave. Rm 336C Milwaukee, WI 53233	414.288.5409 gary.stafford@mu.edu	2016 - 2019

Regions and Schools

North American Dental Schools = 76 (10 Canada* and 66 United States)

Region I (Pacific) – 15 Dental Schools (2 Canada* and 13 United States)

Region	Dental School	2019/20 Member
I	University of Alberta*	✓
I	University of British Columbia*	✓
I	AT Still University of Health Sciences - Arizona	✓
I	Midwestern University - Arizona	✓
I	Loma Linda University	✓
I	Roseman University of Health Sciences	✓
I	University of Nevada at Las Vegas	✓
I	University of Southern California	✓
I	University of California at Los Angeles	✓
I	University of California at San Francisco	✓
I	University of the Pacific	✓
I	Oregon Health Sciences University	✓
I	University of Utah	✓
I	University of Washington	✓
I	Western University of Health Sciences	✓

Region II (Midwest) – 11 Dental Schools (2 Canada* and 9 United States)

Region	Dental School	2019/20 Member
II	University of Manitoba*	✓
II	University of Saskatchewan*	✓
II	Missouri School of Dentistry & Oral Health	✓
II	University of Colorado Health Sciences Center	✓
II	The University of Iowa	✓
II	Southern Illinois University	✓
II	University of Minnesota	✓
II	University of Missouri at Kansas City	
II	University of Nebraska Medical Center	✓
II	Creighton University	✓
II	Marquette University	✓

Region III (South Midwest) – 7 Dental Schools (7 United States)

Region	Dental School	2019/20 Member
III	Louisiana State University Health Sciences Center	✓
III	University of Mississippi Medical Center	✓
III	Oklahoma University Health Sciences Center	✓
III	University of Tennessee	✓
III	Texas A & M Health Science Center College of Dentistry	✓
III	University of Texas Health Sciences Center at Houston	✓
III	University of Texas Health Sciences Center at San Antonio	

Region IV (Great Lakes) – 11 Dental Schools (1 Canada* and 10 United States)

Region	Dental School	2019/20 Member
IV	The University of Western Ontario*	✓
IV	Midwestern University - Illinois	✓
IV	The University of Illinois – Chicago	✓
IV	Indiana University School of Dentistry	✓
IV	University of Detroit Mercy	✓
IV	University of Michigan	✓
IV	University of Buffalo	✓
IV	Case Western University	
IV	The Ohio State University	✓
IV	University of Pittsburgh	✓
IV	West Virginia University	✓

Region V (Northeast) – 19 Dental Schools (5 Canada* and 14 United States)

Region	Dental School	2019/20 Member
V	Dalhousie University*	
V	McGill University*	
V	University of Toronto*	✓
V	Laval University*	
V	University of Montreal*	
V	University of Connecticut Health Center	✓
V	Howard University	
V	Boston University	✓
V	Harvard University	✓
V	Tufts University	✓

V	University of Maryland	✓
V	University of New England	✓
V	Rutgers University	✓
V	New York University	✓
V	Stony Brook University	✓
V	Columbia University	✓
V	Temple University	✓
V	Touro College of Dental Medicine	✓
V	University of Pennsylvania	✓

Region VI (South) – 13 Dental Schools (13 United States)

Region	Dental School	2019/20 Member
VI	University of Alabama	✓
VI	East Carolina University	✓
VI	Lake Erie College of Osteopathic Medicine	
VI	Nova Southeastern University	✓
VI	University of Florida	
VI	The Dental College of Georgia at Augusta University	
VI	University of Kentucky	✓
VI	University of Louisville	✓
VI	University of North Carolina	✓
VI	University of Puerto Rico	
VI	Medical University of South Carolina	✓
VI	Meharry Medical College	✓
VI	Virginia Commonwealth University	✓

2019 Regional Meeting Hosts

Region/Dates	University/Address	Host Name/Phone/email
I – September 26-27, 2019	University of Nevada, Las Vegas School of Dental Medicine 1001 Shadow Lane MS 7415 Las Vegas, NV 89106	Davin Faulkner 702.774.2559 davin.faulkner@unlv.edu Bernard Hurlbut 702.774.2687 bernard.hurlbut@unlv.edu
II – September 19-20, 2019	A.T. Still University Missouri School of Dentistry & Oral Health 1500 Park Ave St. Louis, MO 63104	Brandon Crivello 314.685.3573 brandoncrivello@atsu.edu
III – October 24-25, 2019	University of Texas Health Science Center at San Antonio School of Dentistry 7703 Floyd Curl Drive San Antonio, TX 78232	Joseph Connor 210.567.3693 connorj@uthscsa.edu
IV – October 3-4, 2019	Indiana University School of Dentistry 1121 W Michigan St Indianapolis, IN 46202	Michele Kirkup 317.278.3398 mkirkup@iu.edu
V – September 16-17, 2019	New York University College of Dentistry 345 E 24th St New York, NY 10010	James Kaim 212.998.9720 Jmk2@nyu.edu
VI – October 16-18, 2019	East Carolina University School of Dental Medicine 441 Brauer Hall Greenville, NC 27834	Roopwant Kaur 252.737.7148 kaurr@ecu.edu

2020 Regional Meeting Hosts

Region/Dates	University/Address	Host Name/Phone/email
I – September 24-25, 2020	University of Utah School of Dentistry 530 S Wakara Way Salt Lake City, UT 84108	James Keddington 385.439.7774 james.keddington@hsc.utah.edu
II – September 17-18, 2020	Marquette University School of Dentistry 1801 W Wisconsin Ave PO Box 1881 Milwaukee, WI 53233	A. Patrick Longo 414.288.6610 alfred.longo@mu.edu
III – TBD, 2020	The University of Texas Health Science Center – Houston School of Dentistry 7500 Cambridge St Houston, TX 77054	Shalizeh Patel 713.486.4269 shalizeh.patel@uth.tmc.edu
IV – October TBD, 2020	West Virginia University School of Dentistry 64 Medical Center Dr PO Box 9600 Morgantown, WV 26506-9600	Tammy Chipps 304.293.1245 tchipps@hsc.wvu.edu
V – October 5-6, 2020	New York University College of Dentistry 345 E 24th St New York, NY 10010	James Kaim 212.998.9720 Jmk2@nyu.edu
VI – TBD, 2020	The Dental College of Georgia at Augusta 1430 John Wesley Gilbert Dr Augusta, GA 30912	Martha Brackett 706.721.8308 mbrackett@augusta.edu

Regional Meeting Reporting/National Meeting Information

The 2019 National Agenda was established after a review of the suggestions contained in the reports of the 2018 Fall Regional meetings, National CODE Meeting and from the Regional CODE Directors. Previous National agendas were reviewed to avoid topic duplication. Inclusion of a previous topic may occur for discussion from the aspect as to what has changed and the response/action taken and/or the outcome.

Thank you to the Regional CODE Directors and the membership for making recommendations to establish the National Agenda. Each Region is encouraged to also have a Regional Agenda.

Each school attending a Regional Meeting is requested to bring their responses to the National Agenda in written form AND electronic media. This information is vital to timely publication of the National Annual Report.

Continue to invite your colleagues, Dental Licensure Board examiners, and your Military and Public Health Service colleagues who head/instruct dental education programs to your Regional meetings. The strength of the organization lies in its membership.

Each Region should select next year's meeting site and date/tentative date during your Fall Regional CODE meeting so this information may be published in the Annual National Report and on the CODE website.

The Regional meeting reports are to be submitted to the National Director **in publishable format** as an email attachment.

The required format and sequence will be:

1. **CODE Regional Meeting Report Form***
2. **CODE Regional Attendees form***
3. **Summary of responses to the National Agenda**
4. **Individual school responses to the National Agenda**
5. **The Regional Agenda summary and responses**

***(copies may be obtained from the CODE website: www.unmc.edu/code or within this document)

Send an electronic copy of the final regional report via an email attachment to the National Director (staffoga@ohsu.edu) within thirty (30) days of the meetings conclusion.

2020 Annual National CODE Meeting:

The meeting will be held Thursday, February 20th, 2020 from 5:10 – 6:30 pm in the Parkside Room at the Drake Hotel, 140 East Walton Place, in Chicago, IL.

2020 ADEA Section on Operative Dentistry and Biomaterials Forum:

The meeting will be held on Monday, March 16th at 7:00 am during the ADEA Annual Session & Exhibition, March 14-17, 2019 in National Harbor, MD.

National Directory of Operative Dentistry Educators:
The CODE National Director maintains the National Directory of Operative Dentistry Educators as a resource for other dental professionals. It is critically important that this information be as current as possible.

You may update your university's directory listing on the CODE website at www.unmc.edu/code or by sending an email directly to the National Director at staffoga@ohsu.edu.

In an effort to keep the National Directory up to date, please have each school in your Region update the following information:

1. *School name and complete mailing address*
2. *Individual names: (F/T Faculty), phone number and email address of F/T Faculty who teaches operative dentistry.*
    a. This could be individuals who teach in a comprehensive care program, etc… if there is no defined operative section of the department.

Your help and cooperation in accomplishing the above tasks helps save time and effort in maintaining a complete National Directory and publishing the Annual National Report in a timely fashion.

All my best,

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director
Professor, Restorative Dentistry
Oregon Health & Science University
School of Dentistry
MC: SD-AA
2800 SW Moody Ave
Portland, OR 97201
503.494.8801
staffoga@ohsu.edu

2018 National Agenda

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?
c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?
d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
    i. If not, what do you contribute your success to?
    ii. If so, please describe the issues
e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3
    i. What types of experiences are the most difficult to find in your patient pool?
f. Describe your screening/patient admissions process?
g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?
    i. If so, please describe?
h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?
    i. If your state MLP's, who is responsible for the education? Please describe?
    ii. Do the students, faculty, and local dental community embrace the concept?
    iii. Would your institution be willing to provide this instruction?

II. Cariology

a. What terminology does your school use to define and categorize dental caries?
b. How does your school calibrate its faculty for caries diagnosis?
c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?
b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…
    i. Class V composite resin?
    ii. Sandwich technique?
    iii. Bulk fill technique?
    iv. Resin Modified Glass Ionomers (RMGI)?

v. Amalgam?
    1. % of direct restorations?
    2. Bonded or unbonded?
vi. Air abrasion?

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?
    i. Has it replaced gold in your clinic?
d. Who performs molar endo?
    i. Pre-doc students %, Endo Residents %, Endo Faculty %
e. Do you utilize bond strength testing exercises?
    i. Who supervises?
f. Do you use electric handpieces in the simulation laboratory? In the clinic?
    i. If no, why not?
    ii. If Yes, what system?

IV. Student Assessment

a. Does your institution have an international dental program?
    i. If yes, does your school utilize a bench test? Please describe.
    ii. If yes, how many students are enrolled?
b. Do you evaluate students using OSCE's?
c. Describe your primary didactic testing methodology
    i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
    ii. Pros/cons to the one you are primarily using?
    iii. Are you investigating other methods?
        1. If yes, which one(s)?

V. Administration

a. What is your policy on attendance?
    i. Please provide the actual attendance policy statement.
    ii. Who is responsible for tracking attendance?
    iii. How effective is your policy?
b. What is your policy with student complaints about grades?
c. What is your policy on student absences?
d. Regional licensure exam
    i. What exam(s) does your school host?
    ii. What's the general consensus towards the benefits of the exam?
    iii. What's the general consensus on the elimination of the exam?
    iv. What are the alternatives?
e. Discuss opinions on realigning the CODE regions.
    i. Are there schools you feel should be in your region that are not?
f. Discuss and describe suggestions for improving CODE.

2020 Regional Meeting Report Form

Region:

Host University, Address, and Dates of 2020 Regional Meeting:

Host University	Address	Dates of Meeting

Chairperson and Contact Information for 2020 Regional Meeting:

Chairperson	University/Address	Phone/email

List of Attendees: (Please complete CODE Regional Meeting Attendees Form on the following page)

Contact Person, Host University, and Dates of 2021 Regional Meeting:

Contact Name Phone/email	Host University/Address	Dates of Meeting

Suggested Agenda Items for 2021:

2020 Regional Meeting Attendee's Form

Name	University	Phone	email

2020 Regional Meeting Attendee's Form

Name	University	Phone	email

Please return all completed enclosures to:

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director

Professor, Restorative Dentistry
Oregon Health & Science University
School of Dentistry
MC: SD-AA
2800 SW Moody Ave
Portland, OR 97201

503.494.8801
staffoga@ohsu.edu

Deadline for return: 30 days post-meeting

Please send the requested documents via email with attachments

2019 Region I C.O.D.E. responses

ASDOH/AT Still Curriculum

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

Create a more 'adaptable' curriculum to support ongoing changeGeneralize many of the innovative curricular approaches already being done in small areas to more fully utilize them across the curriculum
Introduces need for improving integrated learning as well as opportunity for early clinical approach

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

For the didactic one attempt, pre-clinical after the fail the course they can remediate it once. For the clinic depend on the faculty evaluation. .

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Yes they do. Depending on the procedure sometimes every week the longest the stay in the same row is 3 weeks

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

NO

i. If not, what do you contribute your success to?

We have enough patients. The school in residential area. Parking is not an issue for patients.

ii. If so, please describe the issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3

Yes we do have enough patients. Some time student share the patient for the Complete Denture essential experience

i. What types of experiences are the most difficult to find in your patient pool?

ENDO

F. Describe your screening/patient admissions process?

Patients are screened in the CCUS and the CUU director assign patients for the students.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

NO

i. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept.

iii. Would your institution be willing to provide this instruction?

Loma Linda University

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?:

complete curriculum make-over

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

No remediation exam is offered, clinical procedure remediation has no limit, a course may be remediated up to twice

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?:

faculty do not rotate but stay for the entire course and not assigned to a specific group of students

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

i. If not, what do you contribute your success to?:

demographic make-up of location and reputation

If so, please describe the issuesE.Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?: **yes**

ii. What types of experiences are the most difficult to find in your patient pool?:

endo and RPD

F .Describe your screening/patient admissions process**?:**

screening process leads to COE at Wellness Center where all the patient diagnosis and treatment planning happens

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

iii. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?:

RDAEF, no other mid-level provider exists

iv. If your state MLP's, who is responsible for the education? Please describe?:

RDAEF programs

v. Do the students, faculty, and local dental community embrace the concept?:

some but not all

vi. Would your institution be willing to provide this instruction?:

We have an RDAEFf program

MIDWESTERN

Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination?

No, except for examination format.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

One attempt and then they are referred to the student promotions committee.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Faculty rotate on a quarterly basis

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

No

i. If not, what do you contribute your success to?

Our school is in a newer area with multiple retirement communities.

ii. If so, please describe the issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Yes, except removable dentures.

iii. What types of experiences are the most difficult to find in your patient pool?

Pediatric and RPD's.

F. Describe your screening/patient admissions process?

For each clinic session, each suite is assigned 2-3 new screening patients. One D3/D4 pair is assigned to "Screening" each session from each suite. These students triage and screen these patients and, with the assistance of faculty, determine if the patients are suitable teaching cases. If they seem to be a good fit at that time, the students begin the

comp exam (either at that appointment or the patient is scheduled for a future appointment to complete the exam). The CCC (supervising faculty) then determines the appropriate assignment to students based on the treatment needs of the patient and the clinical experiences needed for the students in their suite. Typically the screening students end up with the patients they screen unless there is a significant need somewhere. Due to the volume of patients screened and the frequency of their assignments to the screening chair (typically every 7 clinic days—every week and a half), most students have no problem finding the procedures determined to be too difficult and the patient is notified and referred to the state

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

No.

iv. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

Yes, it has been passed.

v. If your state MLP's, who is responsible for the education? Please describe?

It must be an accredited program.

vi. Do the students, faculty, and local dental community embrace the concept?

No

vii. Would your institution be willing to provide this instruction?

No

OHSU

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

The SoD at OHSU has taken the following steps:

For the Class of 2023 the first year has been greatly decompressed by moving some of the biomedical courses into the second year

have eliminated one Sim Clinic restorative course and will be looking to reduce simulation even more

will be integrating biomedical and clinical training (will involve much faculty development especially for clinical care faculty)

are redesigning Mock NB examinations to be more case based

will be administering Mock NB examinations in the second and third years (same exam, different scoring). Second year students will not be allowed into the Third Year Patient Care clinics without passing the Mock Exam. Fourth Year students will not be allowed to challenge the INBDE until they have passed the Mock Exam.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

The SoD at OHSU has established the following as part of our Examination and Grading Policies:

- ***Midterm written exams and Simulation Clinic Clinical Procedure exams***
  - ***Students are allowed one and only one attempt at passing a remedial/makeup exam***
  - ***Failure on the remediation exam results in a determination by the Student Performance Committee as to course of action taking into consideration the recommendation of the Course Director***
- ***Final written exams***
  - ***Students are not allowed to remediate a failed cumulative final exam***
  - ***Failure on the final exam results in a determination by the Student Performance Committee as to course of action taking into consideration the recommendation of the Course Director***
  - ***May result in a hearing with the student to determine outcome – repetition of the exam, repetition of the course, repetition of the year, dismissal***

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Weekly or bi-weekly

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Only in Pediatric Dentistry

i. If not, what do you contribute your success to?

Endo and Implants have fees that are attractive to patients; OS has fees less than private practice; for restorative dentistry, the patients like the facility and the care,

ii. If so, please describe the issues

Many parents opt for private practices for their childrens' needs and have found providers who accept ACA insurance

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

We are sharing patients for removable prosthetics and implant retained removable pros

i. What types of experiences are the most difficult to find in your patient pool**?**

Removable pros: complete dentures, RPDs

F. Describe your screening/patient admissions process?

Students are assigned rotations in admitting. A DS3/DS4 pair are assigned. The patient will get FMX if needed for only $47 and be assigned to the pair for comprehensive exam ($40) and treatment planning. All consults on predoc floor are at no charge. If the patient is complex, he/she will be referred to GPR, FDP, Grad Clinics or outside private practices.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

i. If so, please describe?

We just changed to what is described above.

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

No—Oregon is in the midst of a pilot study with DHATs and the heat is up

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept**?**

Oregon is in the middle of a pilot program for Dental Health Aide Therapists; other mid level providers include the hygienists, who are being considered for additional restorative procedures. Currently, the dental school is not

educating MLPs and the DHATs providing services at Tribal (Indian) facilities were trained by the Alaska Native Health Tribal Consortium DHAT program.

iii. Would your institution be willing to provide this instruction?

No

ROSEMAN

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

We switched to OSCE type examinations in 2016 in anticipation of change

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

once. additional learning opportunities are administered before additional reassessment is allowed.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

yes, by block

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

No

i. If not, what do you contribute your success to? large demographic of underserved

ii. If so, please describe the issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Usually

i. What types of experiences are the most difficult to find in your patient pool?

RCT & RPD

F. Describe your screening/patient admissions process?

Screening included at comp exam. Referral made if deemed beyond student capability

G. Is your institution planning any changes to the protocols for screening/patient pre-doctoral program?

i. If so please describe.describe?

H. Does your state have, or are they investigating the incorporation of mid-level the oral health care team?

Yes. a new "pilot pod" has been created to teach this MLP's,

i. If your state MLPs, who is responsible for the education?

ii. Do the students, faculty, and local dental community embrace the concrpt?

iii. Would your institution be willing to provide instruction?

University of Alberta

I. Curriculum

A.How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

NA Canada. U of A is in the process of curriculum renewal.

B.How many attempts do students get to remediate an exam, a clinical procedure,and a course?

No comprehensive school policy. Each course coordinator has the discretion to set remediation in their area. For final written exams there is only one rewrite allowed.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Each course has a course coordinated who has discretion to assign lab supervision. For operative, assignments are for the day and faculty rotate each session.

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Problems in some areas, others are OK.

i. If not, what do you contribute your success too?

Patients are given a 50% fee discount which appeals especially to seniors.

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Marginally.

ii. What types of experiences are the most difficult to find in your patient pool?

Cosmetic cases for veneers.

F. Describe your screening/patient admissions process?

Day 1: 1 hour visual exam by senior student then interview to determine suitability

Day 2: full clinic data gathering (radiograghs, external/internal exam, models, etc.

Day 3: student case presentation and treatment planning

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

No

iii. If so, please describe?

iv.

H, Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

No

i. If your state MLP's, who is responsible for the education?

No

ii. Do the students, faculty, and local dental community embrace the concept?

iii. Would your institution be willing to provide this instruction?

UBC XXXXXXXXXX

UCLA

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National BoardDental Examination (INBDE)?

To adapt to the INBDE, we are including more case-based learning in our preclinical curriculum:

1. **Case-based learning: Twice a quarter, students will be given simulated patient cases instead of the traditional project assignments (e.g. #18 MO amalgam preparation and restoration). The cases generally contain typical medical conditions with implications on dental management (e.g. Stage II hypertension, mitral valve replacement etc.). This is a collaborative effort with the Oral Medicine courses so students begin to "treat the whole patient" instead of "treating the tooth". In lab sessions, students are to simulate a patient encounter, from reviewing medical history in AxiUm, present cases to instructors for start check, attaining patient consent, all the way to completing treatment and entering SOAP notes. This is done via collaborative efforts with Oral Medicine faculties and AxiUm training staff.**
2. **Integrative treatment planning: in traditional curriculum, teaching is mostly procedure-based, and students are to perform prescribed treatment in the preclinic, and only begin to consider treatment options/alternatives as they enter clinic. In light of the INBDE,**

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course**?**

For a clinical procedure that is failed, no action is taken other than no credit being awarded. When a procedure is failed for the second time, the student is asked to participate in remediation before attempting the exam again.

For preclinical courses, students will be asked to repeat/remediate the practical exam for as many times as needed until they pass. Written exams are to be remediated as well. In between attempts, students are given makeup assignments and tutorial sessions (faculty supervision and peer tutoring). Generally students have not needed more than two rounds of makeup practical exams. They are issued an InProgress grade until they pass the written/practical exam. In D2 Fall/Winter quarter, students must pass the practical exam before they are allowed to see patients.

C. Within the preclinical courses, do the faculty rotate among the students during the

course (e.g. weekly, by project)?

By quarter.

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Yes

i. If not, what do you contribute your success to?

ii. If so, please describe the issues.

Parking is expensive. The treatment planning process takes a long time (up to 3 appointments before any treatment is started). Traffic/congestion around UCLA can be a barrier for many patients wanting to come.

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? **No**

i. What types of experiences are the most difficult to find in your patient pool?

Crowns/indirect, FPD's, implants

F. Describe your screening/patient admissions process?

Patients go through patient assessment, medical history gets reviewed and they get screened by the GPD's who then decide which clinic to go to (general or specialty or non-accept). Then patient's get assigned to student.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

Not currently as we have a curriculum redesign team that is in charge of redesigning the clinic physically and thus responsible for the flow changes as well.

i. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team**?**

Not to our knowledge

i. If your state **MLP's**, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

Mixed. We have had meetings about this. It's about 50/50 in terms of acceptance/rejection.

iii. Would your institution be willing to provide this instruction?

UCSF

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

All courses are under review and will be developing a case-based approach. All existing examinations next academic year include a mix of examination questions to support students challenging Part I and II or the INDBE.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

Varies on the nature/type of assessments. As defined within the School's Bylaws

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Yes

D. Are you having difficulty attracting patients to any of your predoctoral teaching programs?

i. If not, what do you contribute your success to?

ii. If so, please describe the issues

The majority of the patients we treat are Dentical. Endo and implants are challenging predoc patient areas.
Enough patients –But many are too complicated for treatment in the pre-doctoral clinics. The result is referral or compromised treatment.

E. Do you have enough patients to supply each pre-doctoralstudent with the essential experiences needed without sharing patients among students?
No

i. What types of experiences are the most difficult to find in your patient pool?
Bridge pts, implant cases

F. Describe your screening/patient admissions process?
Faculty screen with students (rotated) in a specified area.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? i.
i. If so, please describe?
Possibly-things in flux with new Dean

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?
Not at present time

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

iii. Would your institution be willing to provide this instruction?

UNLV

Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
We have not yet made changes to the curriculum. However, we will be looking at several things when that time comes including but not limited to:
1. Reviewing unnecessary redundancies
2. Looking to more just-in-time learning (between biomedical, behavioral, and clinical) given we don't have to cramp so much in the first 2 years for Part I
3. Inclusion of more case-based learning with a foundational knowledge focus to ensure students are ready to answer these type of items.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

The number of attempts to remediate an exam is at the discretion of each course director. The number of attempts for remediation of a clinical procedure is monitored and determined by the Clinic Team Leaders, Director of Comprehensive Care and the Chair of Clinical Sciences. Post-course remediation shall be limited to two (2) courses per academic year and a total of three (3) courses during a student's dental school career. More than two (2) course failures per academic year will result in Academic Expulsion (dismissal). More than three (3) course failures during a student's school career will result in Academic Expulsion (dismissal). The post-course remediation limits apply to all required SDM courses; elective courses are exempt from these limitations.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

How the faculty rotate among the students is course dependent. In some courses faculty are assigned a certain group of students for the semester, in other courses faculty are assigned a group of students each week or project and this assignment changes with each new week or project and in other courses the faculty are not assigned a specific group and are free to work with all of the students in a course.

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

It has not been difficult to attract patients to the pre-doctoral teaching programs but there has been some difficulty in finding certain procedures among these patients.

i. If not, what do you contribute your success to?

ii. If so, please describe the issues

Recently the most difficult patient procedures to come by are dentures and fixed bridges.

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Yes

i. What types of experiences are the most difficult to find in your patient pool?

Dentures and Fixed Bridges

F. Describe your screening/patient admissions process?

Prospective patients have a screening appointment where a student and covering faculty member review the patients' medical and dental history, do a clinical exam

and usually take a pano or other x-rays as needed to assess the patients' condition and determine eligibility for them to become a comprehensive care patient.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

No

i. If so, please describe?

H**.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team**?**

Nevada just approved the incorporation of mid-level providers in 2019.

i. If your state MLP's, who is responsible for the education? Please describe?

Unknown

ii. Do the students, faculty, and local dental community embrace the concept?

The majority have not

iii. Would your institution be willing to provide this instruction?

Unknown

UOP

Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE**)?**

Major re-design: Increase in medical content Increase in application to dentistry New content: genetics & epideminology

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

One

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Quaterly

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

NO

i. If not, what do you contribute your success to?

Change in Denti-cal benefits

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Yes

i. What types of experiences are the most difficult to find in your patient pool?

Endodintics / implants/Major esthetics/indirect laminates

F. Describe your screening/patient admissions process?

1. **Prescreening Appointment**

Patients attend for a prescreening appointment to complete new patient's intake form that includes medical history, patient responsibilities, materials warning and compliance material. They visit with an insurance advisor to review any insurance and provide information of financial aspects of treatment. They receive information on length of time of appointments, commitment and expectation of student dental clinic experience to ensure they are a good fit for treatment. Having completed this step, if they wish to continue, they are appointed for a screening appointment.

2. **Screening appointment**

a. **Patients attend for a 15-minute appointment with a student and faculty member. At this appointment, medical history is checked and any medical consults are sort. Patient expectations and responsibilities are reviewed and confirmed. Patient is examined intraorally to ensure they have suitable dental needs for a predoctoral clinic. Any patients who have dental needs that require care that is beyond the scope for predoctoral treatment are referred elsewhere.**
b. **If the patient is accepted they have radiographs prescribed and are taken to radiology. Once the radiographs are complete, a Group Practice leader assigns to a student doctor. Patients are assigned randomly to our six group practices.**

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

NO

i. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

NO

If your state MLP's, who is responsible for the education? Please describe?

Do the students, faculty, and local dental community embrace the concept?

USC

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

Several faculty calibration meetings had been done to:

1. Inform our faculty what the changes will be.

2. Teach faculty how to write exam questions to synchronize with the INBDE questions. Encourage faculty to start using the INBDE question format in their courses.

3. The dates and questions of our mock NB exams has been modified to match the new INBDE format and date.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

None for clinical procedures (exams). One attempt for courses. For fixed pros and operative course/modules, the courses are graded in two different categories: hand skill & knowledge. If a student failed either of the category, they will have to go through a two-week remediation process. The remediations are built into the final weeks of the course/ module schedule. The remediation finals take place during the final week of the trimester.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

It depends on the course/module director. In the three fixed prosth module between trimester 3, 4, 5, we start with no faculty rotation, then transition into rotation as the student became more proficient in their work.

D Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

We do not have difficulty attracting patients at this time. The only area we slightly struggled is the RPD patients. Many of them became implant patients.

i. If not, what do you contribute your success to?

We realized many years ago that we had issues with our patient admitting process and our clinic set-up. It was just not user friendly for students and patients.

First, we did a national search several years ago, and hired a new clinical director in hope to improve the situation.

This year, we reconfigured our first-floor reception area and streamlined our new patient admitting process and returning patient check in process. We build new furniture in the sitting area with wide screen TVs to promote the dental school.
We established a Calling Center to triage and assign new patients to Departments or Group Practices and shorten the waiting time between when the patient called and when they get their first appointment.
We set up computers right inside the front door to improve our daily patient check in process.
Set up New Patient Service Representatives (PSR) counters on the first and second floor, to help patients and also function as cashiers. Made it easier for the patient to make payments before receiving treatment.
Reform how the clinic works, and how dental students get their appointments.
Established Mandatory Clinic Sessions and Visitors Sessions for D3's and D4's.

We also streamlined the process from the first day the patient comes in to the day when the final treatment plan is done.

ii. If so, please describe the issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

No. Students still need to share patients within group practice, especially close to graduation.

i. What types of experiences are the most difficult to find in your patient pool?

RPD cases. First, many resorted to implants, Second, even if the patient is treatment planned for RPD, the RPD is usually the last procedure. Many steps are required to get to the RPD. And many things can deviate from the original treatment plan or delay the treatment.

Fixed partial dentures. For the same reason we are doing more implants. But FPD and implants are both under the "Tooth replacement competency", so students get to combined implants and FPD to finish their experience and competency exam.

F. Describe your screening/patient admissions process?

The Calling Center: New patients calls are directed to the Calling Center. The Calling Center goes through the first step of screening. They go over things like appointments, payments, treatment process etc, to make sure patient understands and accepts the process at the dental school and also to make sure the patient will fit in the dental school clinic. They also triage and send referral patients to Specialty Programs, such as endo, pedo, pros and perio, oral-facial pain. Patients who are accepted at this stage get assigned to Group Practices based on patient availability during the week and the Mandatory Clinic Sessions open during those sessions. The assigned student in the group practice, then gets 48 hours to contact and schedule the patient for a clinical screening/data collection appointment.

Screening appointments could be scheduled in open chairs in any section in the clinic. Students go through a check list/template on Axium before presenting it to the supervising faculty. The faculty decides at this time, whether the patient is accepted or not. If the patient is accepted, the student will start and complete the Data Collection process, including charting, radiographs, and make impressions for diagnostic casts.

Treatment planning is done in the next appointment with the students Group Practice Director.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program.

We are currently in the process of upgrading our screening and patient admission process.

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

i. If your state MLP's, who is responsible for the education? Please describe?
ii. Do the students, faculty, and local dental community embrace the concept?
iii. Would your institution be willing to provide this instruction?

UTAH

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

We are not making specific changes to the curriculum until we have data to determine student success. Class of 2022 will be the first to take the INDBE. Our Faculty Development series will include sessions on writing questions that are similar to the style of the INDBE, and clinical faculty will be encouraged to ask questions that require students to apply basic science knowledge to clinical decision-making.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

The faculty in the Operative Dentistry Courses rotate project to project. In some of the other courses, they rotate week to week

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Not at the moment

i. If not, what do you contribute your success to?

We are seeing Medicaid patients, who have not had access to care for quite some time. We also seem to be filling a niche for those underserved in Salt Lake City

ii. If so, please describe the issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Yes and no, we have the patients, but it depends on the students to be proactive and organized to ensure that their schedule is filled. We also find that there is some sharing of patients to ensure that competencies are being fulfilled. This should occur

i. What types of experiences are the most difficult to find in your patient pool?

Molar endo, surgical extractions, and anterior crowns.

F. Describe your screening/patient admissions process

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

No, except to maybe increase the volume of the patients seen in screening.

i. If so, please describe?

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

No

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

No

iii. Would your institution be willing to provide this instruction? Not at this time

UW

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

We revised the Biomedical Foundation courses in the past few years. These courses include: Early Clinical Immersion; Head & Neck Anatomy; Molecular & Cellular Basis of Disease; Invaders & Defenders; Cardiac, Pulmonary & Renal; Blood & Cancer; Energetics & Homeostasis; Mind, Brain & Behavior; Lifecycle & Reproduction. The Biomedical Foundation courses' educational experience is composed of lecture and small group active learning sessions along with various hands on laboratory experiences, many of which are conducted in conjunction with the UW School of Medicine. In the coming years, we will be able to assess the success of this program for INBDE.

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

There is an afternoon clinic session dedicated to remediation every week for students who need to remediate clinical procedures and patient cases with the clinical course director.

For preclinical training and didactic course, there is one remediation attempt. If the student fails (less than 70%) , the course director refers the student to the Student Progress Committee who will make a decision. At the end of each quarter, the Student Progress Committee makes one of the academic recommendations listed below for each predoctoral dental student. These recommendations are not necessarily made in a progressive sequence: 1. Good Standing is a recognition that the student is free of academic deficiencies/failures and is proceeding satisfactorily in the curriculum. A student must maintain a 2.8 cumulative GPA to remain in Good Standing. a. Good Standing with Recommendations is a recognition that a student is in Good Standing as defined above, but that certain steps are recommended to ensure that the student maintains Good Standing. 2. Formal Warning is a warning to the student that they must show improvement if they are to avoid Academic Probation. 3. Academic Probation is a warning to the student that they must promptly improve academic performance to avoid a Remedial Year, Suspension, or Dismissal. 4. required to repeat a course(s) or an entire year at the discretion of the Student Progress Committee. The Student Progress Committee shall recommend what remediation is necessary after consultation with UWSOD departments. Remediation may include retaking courses previously passed if repetition is deemed necessary for the student's projected successful completion of the entire curriculum. The Dean shall

make the final decision in this regard. The student shall be informed that first-received grades on repeated courses shall remain on the transcript and shall be used, along with the new grade, to compute the cumulative GPA. 5. Suspension for a specified period of time. 6. Dismissal.

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Faculty instructors and peer mentors (who are 4th year students acting as teaching assistants) are assigned coverage zones in the simulation clinic. These coverage zones rotate every session, considering the number of faculty/mentors for that session.

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Yes, while we have long waiting lists for patients to get into the clinics, we do not have enough cases for certain procedures. We are among the few who accept state Medicaid patients, which has contributed to the waitlists.

i. If not, what do you contribute your success to?

ii. If so, please describe the issues

We have a considerable rate of missed appointments due to no shows. These problems have been attributed to the scheduling difficulties, staff shortage, daily heavy traffic, expensive and insufficient patient parking, and other issues

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

We feel that there is a shortage of cases for more sophisticated procedures that are typically not covered by insurance or Medicaid

i. What types of experiences are the most difficult to find in your patient pool?

Fixed and removable pros such as cast frame RPD with survey crowns, implant-supported restorations and simple endo cases

F. Describe your screening/patient admissions process?

We have various ways for patients to enter our system;

Routine cases for comprehensive care:

1) patient registers at school with/without external referral

2) patient is scheduled for an initial assessment and/or treatment planning with a third year or fourth year student (typically 1 or 2 appointments)

3) patient is scheduled with (the same or a different) student for a planned treatment or referred to graduate clinics

4) patient presents for the procedure

Dental urgent care clinic:

patient walks in and is seen/treated by a student for pain/urgent care, then referred to student clinics for care, step 2) above.

Limited care patients:

Patient is referred from outside sources for certain clinics/procedures (RCT, surgical, restorative)

Patient is contacted by the clinic and scheduled for procedure (step 3 above)

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

Yes

i. If so, please describe?

We have had changes in the system over the past several years. For about three years, we had a dental admissions clinic in which the patients were briefly examined by licensed dentist and provided with a tentative care plan and expectations. This clinic was shut down due to financial reasons.

Currently, the school is considering the possible ways to increase efficiency of the screenings, particularly for the third year students by combining prosthodontic, operative and treatment planning clerkships.

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

State of Washington currently allows the use of dental therapists only on tribal lands. A bill is under discussion at House Health Care and Wellness Committee for allowing them in wider areas of the state.

i. If your state MLP's, who is responsible for the education? Please describe?

NA

ii. Do the students, faculty, and local dental community embrace the concept?

A published research from UW showed that MLPs could improve overall health of communities in Alaska where access to oral health was limited or not available. However, the issue remains controversial among the community of dentists in our state. Some concerns include that after licensure the MLPs may not choose rural areas and prefer to stay in big cities and communities. The MLP education model would allow people with much less training than a dentist to treat a population with the most complex dental and medical problems.

iii. Would your institution be willing to provide this instruction?

This will depend on the funding. Currently we are facing severe faculty shortage to cover our main DDS program and adding a new program will not be possible unless a considerable funding is provided.

WESTERN

I. Curriculum

A. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
   - **i. Midterm and Final examinations have been moving towards case base questioning**
   - **ii. More virtual patients**
   - **iii. With being a relatively newer school, WesternU has always taught integrated; therefore, haven't had to change to it**

B. How many attempts do students get to remediate an exam, a clinical procedure, and a course?
   - **i. Individualized – some preclinical may be less**
   - **ii. 3 – Maximum percent drops for retakes: 100%, 85%, 85%, 70%**

C. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?
   - **i. No, however, students have access to other faculty**

D. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
   - i. If not, what do you contribute your success to?
   - ii. If so, please describe the issues

It wouldn't hurt to have more removable – in particular, partials

Crowns and ortho would be nice as well

E. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3
   - i. What types of experiences are the most difficult to find in your patient pool?

Partials, crowns, ortho

F. Describe your screening/patient admissions process?

Patients come and are seen for a screening appt. They have a PAN taken and are evaluated intraorally through a form in AxiUm that investigates their needs. Student and pt discuss that they will be working with a student and ensure pt understands the pros/cons of this (ie, longer appts, more frequent appts, more affordable treatment, etc). Faculty verifies and approves findings, reiterates school protocols, and pt is accepted or provided alternative treatment options.

G. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

i. If so, please describe?

There has been consideration to group the patient needs and classify them. Then divide the classification evenly among students. Currently only in discussion

H. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

No

i. If your state MLP's, who is responsible for the education? Please describe?
ii. Do the students, faculty, and local dental community embrace the concept?
iii. Would your institution be willing to provide this instruction?

WesternU does not provide instruction for MLPs, but we have a couple who have received the instruction.

We would be willing to listen to a discussion about MLPs

ASDOH/AT Still

CARIOLOGY

I. Cariology

A. What terminology does your school use to define and categorize dental caries?

CAMBRA

B. How does your school calibrate its faculty for caries diagnosis?

All the teaching material is available to the faculty. Schedule sessions during lunch time to review the protocols

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

It is part of the operative course

Loma Linda University

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

ADA's classification of dental caries

1. **E0-D3**
2. **Cavitated vs non-cavitated**
3.

B. How does your school calibrate its faculty for caries diagnosis?

N/A but we focus on caries management and prevention using CAMBRA protocol

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

DNES 705 Etiology and Management of Dental Caries,
it is also integrated into other courses like
Biochemistry, Microbiology, and Operative Dentistry

MIDWESTERN

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

We use the ADA Dental Caries Classification System (CSS), but students are introduced to ICDAS, GCCM, CAMBRA, and ICCMS

B. How does your school calibrate its faculty for caries diagnosis?
C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

It is integrated into Oral Health Sciences curriculum throughout

D1 and D2 years

OHSU

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

ICDAS terminology as well as ADA classification is taught in the preclinical curriculum; we do not find consistency of terminology when students enter clinic and we are working on calibrating the faculty to use the same terminology in clinic that is taught preclinically.

B. How does your school calibrate its faculty for caries diagnosis?

We have discussions at restorative meetings (quarterly) and a major meeting every fall, but we are trying to implement a module system where faculty would take modules year round.

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

We do not have a separate cariology curriculum; cariology is woven into several courses throughout the curriculum.

ROSEMAN

II. Cariology

A. What terminology does your school use to define and categorize dental caries?
B. How does your school calibrate its faculty for caries diagnosis?
C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

University of Alberta

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

ICDAS: healthy 0/ initial 1/moderate 2/advanced 3/ pulpal pathology 4

B. How does your school calibrate its faculty for caries diagnosis?

Annual meeting

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses?

Both

Please describe.

Introduced in separate course then continued in operative.

UBC XXXXXXXXXX

UCLA

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

Loosley ICDAS

B. How does your school calibrate its faculty for caries diagnosis?

No

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Both.

There is a separate curriculum and course dedicated to cariology, but it is also intertwined into the pre-clinical direct restoration courses as well. We have an integrative session where students determine if an occlusal pit stain/caries is to be restored on extracted natural teeth. Cariology concepts are reinforced when we introduce clinical caries removal (on extracted natural teeth) in operative course.
We teach selective caries removal.

UCSF

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

the terminology of CAMBRA

B. How does your school calibrate its faculty for caries diagnosis?

lunch meetings

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses?

Yes

Please describe.

CAMBRA and minimally invasive

UNLV

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

Dental caries is an infectious microbiologic disease of the teeth that results in localized dissolution and destruction of the calcified tissues. Dental caries is categorized as primary, recurrent or incipient. Carious dentin can also be classified as infected or affected.

B. How does your school calibrate its faculty for caries diagnosis?

Formal calibration of the faculty has not occurred in recent years however lectures on caries diagnosis have been given to faculty in the last couple years. There are plans to begin more calibration in this area in the coming months.

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

. **The school used to have a separate cariology course but in the last couple years the cariology curriculum has been integrated into the operative courses and biomedical science courses like microbiology and nutrition.**

UOP

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

ICDAS (1-6)

B. How does your school calibrate its faculty for caries diagnosis?

Crosstraining

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Integrated into restorative courses

USC

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

Starting in Fall of 2018 with the D1 students use of ICDAS has been promoted for definition and categorization of dental caries. As these students will reach the clinic, this concept will be used clinic wide.

B. How does your school calibrate its faculty for caries diagnosis?

Faculty members are calibrated during in-service calibration sessions when taking part in the preclinical Cariology and Microdentistry module. All other faculty members are being calibrated by an online calibration.

C, Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

In the fall of 2018 a new cariology curriculum was created, providing training to the D1 students already in the preclinical stage. Within this module non-invasive and micro-invasive caries management techniques are being taught didactically as well as practically (e.g., resin infiltration, SDF). Furthermore, the practical use of caries diagnostic techniques are being taught (e.g., transillumination, laser fluorescence, such as SiroInspect and Diagnodent Pen). Additionally, cavity preparation for temporary GI restorations and permanent composite restorations are taught and practiced. Amalgam has been removed from the curriculum. Additional topics include the introduction of dental microscopes for restorative purposes and ergonomics in collaboration with the Division of physical therapy. Once this class this class comes to the clinic, the concepts and techniques will be used clinic wide.

UTAH

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

We teach the GV Black classification for both routine practical use and historical reasons. We also familiarize students with the ADA Caries Classification System (CCS) 2015 by site and stage, and with the concepts behind ICDAS.

B. How does your school calibrate its faculty for caries diagnosis?

We calibrate for caries diagnosis the same way that we calibrate for other aspects of preventive, restorative, and periodontal care, by group presentations and discussions.

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

We have a separate cariology curriculum, and we also integrate into the preservation and restoration course, as well as the patient assessment and treatment planning course.

UW

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

We teach the GV Black classification for both routine practical use and historical reasons. We also familiarize students with the ADA Caries Classification System (CCS) 2015 by site and stage, and with the concepts behind ICDAS.

B. How does your school calibrate its faculty for caries diagnosis?

We calibrate for caries diagnosis the same way that we calibrate for other aspects of preventive, restorative, and periodontal care, by group presentations and discussions.

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

We have a separate cariology curriculum, and we also integrate into the preservation and restoration course, as well as the patient assessment and treatment planning course.

WESTERN

II. Cariology

A. What terminology does your school use to define and categorize dental caries?

ICDAS

B. How does your school calibrate its faculty for caries diagnosis?

Realizeit

C. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

There is a presentation on cariology; however, it is woven into each discipline

ASDOH/AT Still **Materials & Techniques '19**

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

We teach Complex composite restorations

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Composite & GIC

ii. Sandwich technique?

Open & close sandwich technique

iii. Bulk fill technique?

We do not teach bulk fill

iv. Resin Modified Glass Ionomers (RMGI)?

Yes

v. Amalgam?

a. % of direct restorations?

We teach it in the sim-clinic about 25-30% of the procedures. In the clinic the students do not do many amalgam restorations

a. Bonded or unbonded?

Unbonded

vi. Air abrasion?

NO

C, Are you doing more milled partial coverage as a result of the scanning and milling capability?

YES

vii. Has it replaced gold in your clinic?

We built a new digital clinic and hired a full time prosthodontics who is expert in Digital Dentistry. I believe we will be doing more digital restoration.

D. Who performs molar endo?

D4 Students

viii. Pre-doc students %, Endo Residents %, Endo Faculty %

We do not have Endo Residency

E. Do you utilize bond strength testing exercises?

NO

i. Who supervises?

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

YES, BOTH CLINICS

i. If no, why not?

ii. If Yes, what system?

Loma Linda University

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

Do not teach cusp replacement with composite

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

bevels and retention, caries or esthetic demand, composite resin or RMGI

ii. Sandwich technique?

open and closed sandwich techniques, deep lesions with non-ideal isolation or high caries risk, use RMGI

iii. Bulk fill technique?

Build-ups & Bioclear Pilot Program

iv. Resin Modified Glass Ionomers (RMGI)?

temporization, class V, sandwich technique

v. Amalgam?
a. % of direct restorations?

b. Bonded or unbonded?
Unbonded

vi. Air abrasion?
Being taught as an option

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?
YES

i. Has it replaced gold in your clinic?
We offer both options to our patients

D. Who performs molar endo?
i. Pre-doc students %, Endo Residents %, Endo Faculty %
For 2018

Predoc students: 53 cases (19%)

Endo residents: 223 cases (81%)

E. Do you utilize bond strength testing exercises?
i. Who supervises?
Yes, Iris Nam

F. Do you use electric handpieces in the simulation laboratory? In the clinic?
i. If no, why not?
ii. If Yes, what system?
Bien Air

MIDWESTERN

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?
Cusp must be covered with a minimum of 2mm of material. We generally use Emax or Zirconia CAD/CAM restorations.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…
   i. Class V composite resin?
      YES
   ii. Sandwich technique?
      Rare
   iii. Bulk fill technique?
      No
   iv. Resin Modified Glass Ionomers (RMGI)?
      In select cases
   v. Amalgam?
      a. % of direct restorations?
         ~2% or less.
      b. Bonded or unbonded?
         Unbonded
   vi. Air abrasion?
      No

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?
   Yes
   i. Has it replaced gold in your clinic?
      Yes

D. Who performs molar endo?
   i. Pre-doc students **75**%, Endo Residents **0**%, Endo Faculty **25%**

E. Do you utilize bond strength testing exercises?
   i. Who supervises?
      Yes Faculty

F. Do you use electric handpieces in the simulation laboratory? In the clinic?
   YES, Both
   i. If no, why not?
   ii. If Yes, what system?
      Bien Air

OHSU

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

We are not teaching cusp replacement in resin; rather cusp replacement is treatment planned with indirect restorations or direct complex amalgams.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

We are using composite resin when there is bondable enamel and using RMGI for open sandwich technique or fully RMGI if the apical margin is on cementum.

ii. Sandwich technique?

Yes, we are using Fuji II LC and composite for sandwich technique where appropriate.

iii. Bulk fill technique?

Yes, we are using Surefill SDR flow as bulk fill flowable.

iv. Resin Modified Glass Ionomers (RMGI)?

We use Fuji IILC for patients with high caries risk or with apical margins that are not on enamel

v. Amalgam?

We are still teaching amalgam use in preclinic and using amalgam in clinic, especially in high caries risk patients or for complex amalgams (cusp replacement)

a. % of direct restorations?

It has significantly decreased (20% or direct restorations) as patients are choosing composite when appropriate. At external rotations, the number is significantly higher.

b. Bonded or unbonded?

Unbonded

vi. Air abrasion?

We are not utilizing air abrasion for cavity preparations.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes—we have dedicated operatories on the clinic floor for CADCAM restorations and the milling unit is just a few feet away.

i. Has it replaced gold in your clinic?

No—we still advocate gold restorations for 2nd molars or where a patient has a high regard for the value and integrity of gold restoration

D. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

18% predoctoral students and 82% endo residents

E. Do you utilize bond strength testing exercises?

No, only the researchers are performing these tests

i. Who supervises?

F. Do you use electric handpieces in the simulation laboratory? In the clinic

Yes, we are using W &H electric handpieces both in the clinic and sim lab. We are testing the Bien Air handpieces in the faculty practice and in the CADCAM clinic

i. If no, why not?

ii. If Yes, what system?

ROSEMAN

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

cuspal overlay

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Heated

ii. Sandwich technique?

iii. Bulk fill technique?

Bioclear

iv. Resin Modified Glass Ionomers (RMGI)?

Fuji II LC, Fuji IX

v. Amalgam?

We are an amalgam free school

a. % of direct restorations?
b. Bonded or unbonded?
c.

vi. Air abrasion?
Micro etcher

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?
Some

i. Has it replaced gold in your clinic?
Mostly

D. Who performs molar endo?
Some pre-doc students, mostly AEGD residents

i. Pre-doc students %, Endo Residents %, Endo Faculty %

E. Do you utilize bond strength testing exercises?
NO

i. Who supervises?

F. Do you use electric handpieces in the simulation laboratory? In the clinic?
YES , YES

i. If no, why not?
ii. If Yes, what system?
Bien Air

University of Alberta

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?
Adequte reduction for bulk

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?
Incremental technique using filtek supreme. Almost always.

ii. Sandwich technique?
Use Fuji II (RMGIC) when there is no enamel on the finish line.

iii. Bulk fill technique?
Use filtek bulk fill for most posterior restorations

iv. Resin Modified Glass Ionomers (RMGI)?

Restorations with no enamel or high caries risk.

v. Amalgam?

High caries risk/patient request/no enamel on the finish line/poor moisture control.

a. % of direct restorations?

20%

b. Bonded or unbonded?

UnBonded

vi. Air abrasion?

Not used at this time.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

YES

i. Has it replaced gold in your clinic?

YES

D. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

No grad endo program at this time. Some difficulty in finding easy molar cases therefore students perform more complex cases with faculty assistance.

E. Do you utilize bond strength testing exercises?

i. Who supervises?

Faculty

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Use only electric

i. If no, why not?

ii. If Yes, what system?

ADEC

UBC XXXXXXXXXX

UCLA

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

Not really taught

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Both occlusal/gingival margins in enamel, easy to isolate with 212 clamp or cord, restore with composite resin. Bevel on all enamel margins.
Occlusal margin in enamel, gingival margin on root dentin, open sandwich technique with Fuji IX on gingival portion with retention groove no bevel.
Both occlusal and gingival margins in dentin, restore with GI or Amalgam.
When not able to isolate or on patients with high caries risk, amalgam is recommended.

ii. Sandwich technique?

Open for Class V's on root surface. Closed when deep caries.

iii. Bulk fill technique?

Not taught

iv. Resin Modified Glass Ionomers (RMGI)?

For use with open sandwich technique. (we use Fuji IX because its non-load bearing and better F release?)

v. Amalgam?

a. % of direct restorations?

Currently about 16-18% of our restorations.

b. Bonded or unbonded?

All unbonded

vi. Air abrasion?

Not taught

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes, Some

i. Has it replaced gold in your clinic?

No

D. Who performs molar endo?

i.Pre-doc students **20** %, Endo Residents **80** %, Endo Faculty %

E. Do you utilize bond strength testing exercises?

Yes

Who supervises?

One faculty

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Both

vii. If no, why not?
viii. If Yes, what system?
Bien Air

UCSF

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?
varies, not on molars

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?
GI, RGI, FLOW, SANDWICH

ii. Sandwich technique?
Yes, both open and closed

iii. Bulk fill technique?
No

iv. Resin Modified Glass Ionomers (RMGI)?
Yes

v. Amalgam?
a. % of direct restorations?
10%

b. Bonded or unbonded?
Sometimes bonded, most of the time not

vi. Air abrasion?

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

No

i. Has it replaced gold in your clinic?

We do very few gold crowns. Mostly ceramic or zirconia and PFMs.

D. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

Mostly endo residents

E. Do you utilize bond strength testing exercises?

No

i. Who supervises?

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Both

i. If no, why not?

ii. If Yes, what system?

Bien Air

UNLV

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

While cusp replacement with direct composite is possible it is not the best option and is usually considered temporary. An indirect restoration is the better option when replacing a cusp.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Indications: Esthetic areas, margins mostly in enamel, ability to isolate well. Materials used: Filtek Supreme Ultra and Premise. Frequency of use: unknown.

ii. Sandwich technique?

Indications: When a gingival margin is not on enamel. Materials used: Fuji II and Filtek Supreme Ultra or Premise. Frequency of use: unknown.

iii. Bulk fill technique?

Indications: Large or deep preparations. Materials used: none. Frequency of use: not used.

iv. Resin Modified Glass Ionomers (RMGI)?

Indications: High caries risk, when margins are not in enamel and there are no occlusal forces directly on the area being restored. Materials used: Fuji II. Frequency of use: unknown.

v. Amalgam?

Indications: Posterior teeth, when isolation is not ideal, patient has a high caries rate, esthetics is not a concern. Materials used: Ionosphere

a. % of direct restorations?

Unknown but not the majority

b. Bonded or unbonded?

Both

vi. Air abrasion?

Indications: PRR's or small caries. Materials used: none. Frequency of use: not used.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

No

i. Has it replaced gold in your clinic?

No

D. Who performs molar endo?

i. Pre-doc students **100** %, Endo Residents %, Endo Faculty %

E. Do you utilize bond strength testing exercises?

Yes

i. Who supervises?

It is a part of the Dental Materials course and is supervised by the course director

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Yes Both

i. If no, why not?

ii. If Yes, what system?

Bien Air

UOP

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

Capping cusps with composite if trying to avoid a crown

Patient financial resources may dictate cuspal restoration with composite

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

Class V composite resin?

Use Universal adhesive with compositeSurface preparation with microetcher, total etch, Scotch Universal adhesive, flowable layer on dentin, then Kerr Harmonize paste, will soon add composite warmers. We treat NCCL's as well as carious lesions.

i. Sandwich technique?

Only closed technique is taught, using Activa Base.

ii. Bulk fill technique?

Discouraged only for build-ups Doing serious study of the dual cured bulk fill techniques Capped with Harmonize, looking at Danville BulkEZ, Parkell Hyperfill, Apex injectafil.

iii. Resin Modified Glass Ionomers (RMGI)?

Fuji IILC: Caries control. Cl V Looking to replace Fuji II LC with Activa

iv. Amalgam?

Taught in first quarter Pre-clin

a. % of direct restorations?

Very few 2% ?

b. Bonded or unbonded?

Unbonded

v. Air abrasion?

YES Mostly for indirect restorative Will be incorporating air abrasion or water/aluminum Trihydroxide water blaster preparation to remove biofilm Prior to etching.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes

i. Has it replaced gold in your clinic?

Not yet

D. Who performs molar endo?

i. Pre-doc students **33**%, Endo Residents **66**%, Endo Faculty %

E. Do you utilize bond strength testing exercises?

Yes

i. Who supervises?

Research Faculty and Victoria Wallace from Ultradent

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Begin with air driven HPs in Sim Lab, later teach electric HPs

i. If no, why not?

ii. If Yes, what system?

KAVO (Electric HPs)

USC

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

For small cuspal fractures, we just use composite to restore the defect. For medium to large size fractures, we use CAD-CAM onlays. But if the fracture is subgingival to the level we could not properly isolate during bonding, we would resort to traditional cemented full coverage crowns.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

We are in the process of transferring from Hybrid composite (Herculite HRV), to Nano-filled composite. (3M Filtek Supreme Plus)

ii. Sandwich technique?

We still use closed sandwich tech using either GI or RMGI as the base material for indirect pulp capping under composite final restoration. We do not use open sandwich technique.

iii. Bulk fill technique?

We had a faculty calibration/lecture regarding bulk fill composite, but we have not use bulk fill technique in the DDS clinic at this time.

iv. Resin Modified Glass Ionomers (RMGI)?

We use FujiCem II for cementation and Fuji II as base or interim restoration after caries clean out and endo.

v. Amalgam?

a. % of direct restorations?

Less than 1%, mostly in our satellite clinics

b. Bonded or unbonded?

We never used bonded amalgam

Air abrasion?

Air abrasion is mainly used to condition the intaglio of crowns and bonded inlay-onlays, and tooth surface prior to luting. It is also used to micro-etch the metal bonding surface of Maryland bridges prior to bonding.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes. We have been doing this since 2007. Since 2012, all students need to pass a clinical bonded inlay/onlay competency exam prior to graduation

i. Has it replaced gold in your clinic?

It has replaced many full coverage restorations, including PFM and gold crowns. However, gold crowns had not been eliminated from our clinic. We do gold crowns when indicated.

D. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

It's hard to say. Students need to finish one molar endo before graduation. However, difficult molar cases are usually referred to Grad Endo and are done by endo residents. The residents also do endo for cases referred to the school by dentists in private practice. The faculty does not do cases for the dental school, except cases in Faculty Practice. But the faculty may occasional step in to help a student or resident solve a problem

E. Do you utilize bond strength testing exercises?

Not sure what this question means. Students do an exercise in the composite course to try to break off bonded composite, to understand the difference between enamel, dental and combination bonding. Advanced Operative Residents do fatigue testing on different dental materials using an Instron Machine in their lab.

i. Who supervises?

The sim lab faculty supervises the composite break off exercise. The Advanced Operative faculty supervises the tests on the Instron Machines.

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

We switched from traditional to electric handpieces in the sim lab in 2013, and in the clinic since 2014. But traditional handpieces are still available to be checked out in the clinic.

i. If no, why not?

ii. If Yes, what system?

Bien Air

UTAH

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

Cusp replacement with composite resin is discussed on a patient to patient basis. It is not generally encouraged; however, it is still performed in the clinic. Partial coverage (onlays), full coverage or the use of dental amalgam is taught to be more predictable.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Class V composites are indicated when esthetics are important and when appropriate Cusp replacement with composite resin is discussed on a patient to patient basis. It is not generally encouraged; however, it is still performed in the clinic. Partial coverage (onlays), full coverage or the use of dental amalgam is taught to be more predictable.isolation can be achieved. Ideally the preps are supragingival.

ii. Sandwich technique?

The sandwich technique is taught and used where appropriate clinically. When used it is meant to elevate the margin to a more controlled situation, where isolation will be predictable. Fuli II or Fuji IX are the glass ionomers used.

iii. Bulk fill technique?

Only with composite build up material, i.e. compcore

iv. Resin Modified Glass Ionomers (RMGI)?

RMGI is taught, along with GI restoratives, as a base or a liner. It is also taught as a restorative material for smooth surface and root caries, especially when isolation is an issue.

v. Amalgam?

a. % of direct restorations?

Our numbers show that we place one amalgam for every 4.3 composite restorations in the student clinic.

b. Bonded or unbonded?

Unbonded, but gluma is used under each amalgam restoration.

vi. Air abrasion?

Introduced in lecture

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

We are just now in the implementation phase of chairside digital acquisition. We are using the TRIOS 3Shape scanner. I don't think this is affecting, one way or the other, the number of partial coverage all-ceramic restorations that we are doing. The students have been doing pressed ceramic onlays for several years.

i. Has it replaced gold in your clinic?

We are still doing a small number of onlay, ¾, ⅞ and full-coverage high noble gold crowns. Not too many gold inlays…

D. Who performs molar endo?

i. Pre-doc students **100%,** Endo Residents %, Endo Faculty %

E. Do you utilize bond strength testing exercises?

Yes

i. Who supervises?

Neil Jessop from Ultradent and I present to the D2 and D3 students, and the shear strength testing is assessed.

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

No, No

i. If no, why not?

Cost prohibitive

ii. If Yes, what system?

UW

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

For the cases where indirect restoration (onaly or crown) is not an option, cusp replacement using hybrid composite is indicated after close inspection of the occlusion. In certain cases, fiber-laminated composite (known as wallpapering technique) is used for endodontically treated or cracked teeth. The technique is introduced in the preclinical operative dentistry 4.

B. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Provided that a perfect isolation can be established, preparation to remove infected dentin caries or sclerotic dentin or bevel as necessary, elective enamel etching, Scotchbond Universal, Filtek flowable or Fuji II LC RMGI as a liner, Filtek Supreme regular composite.

ii. Sandwich technique?

Both open and closed techniques are taught, closed more commonly used with Fuji II LC

iii. Bulk fill technique?

We currently do not have a bulkfil composite available in the clinics but considering the dual-cure composite BulkEZ.

iv. Resin Modified Glass Ionomers (RMGI)?

For class V cases where isolation is a concern, where caries (rampant caries) is a concern or where silver diamine fluoride has been applied to dentin and bonding may be compromised. Sometimes used as a liner.

v. Amalgam?

For posterior cases where isolation is a concern, or patient is high caries risk. Some faculty prefer amalgam for large direct posterior restorations.

a. % of direct restorations?

20%-30%

b. Bonded or unbonded?

Majority unbonded

vi. Air abrasion?

We use the Danville Micro-etcher for certain cases of ename discoloration, enamel preparation for sealants or preventive resin in adults and pretreatment of existing composite for repair.

C. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes, depending on the case, faculty preference and availability of the scanners, full ceramic onlays are done for cases where there is good amount of intact enamel walls.

i. Has it replaced gold in your clinic?

While direct gold foil and partial coverage gold are rarely done in regular predoctoral clinics, full coverage gold crown remains a popular choice at UW. Perhaps CADCAM takes is a good share of PFMs and conventional full ceramics.

D. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

10%-90%-0 *student are allowed to do only lower first molars subject to faculty approval

E. Do you utilize bond strength testing exercises?

We have a brief bond strength exercise in the preclinical training of operative

i. Who supervises?

operative faculty

F. Do you use electric handpieces in the simulation laboratory? In the clinic?

Yes

i. If no, why not?

ii. If Yes, what system?

We are switching air-driven systems across the school to Bien air electric handpieces, while the high-speed capability and attachments will remain available.

WESTERN

III. Materials and Techniques

A. What does your school teach in terms of cusp replacement in composite resin?

Usually indirect restorations are created when available

B.

C. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Yes

ii. Sandwich technique?

Yes

iii. Bulk fill technique?

No

iv. Resin Modified Glass Ionomers (RMGI)?

Yes – Class Vs, Rely X, Indirect Pulp Cap

v. Amalgam?

% of direct restorations?

1. **Preclinically yes, clinically minimal**
2. **Clinical % of amalgams last year was 1.7% of total restorations**

a. Bonded or unbonded?

Unbonded

vi. Air abrasion?

For indirect restoration cementation protocols

D. Are you doing more milled partial coverage as a result of the scanning and milling capability?
    i. Has it replaced gold in your clinic?
        Yes, it has largely replaced gold

        There does not seem to be more inlays/onlays than there used to be – mostly full coverage milling. Full coverage was roughly 75% of all CAD/CAM restorations

E. Who performs molar endo?
    i. Pre-doc students %, Endo Residents %, Endo Faculty %
        Most are completed by Pre-doc students (90%); however, the endo faculty will perform the endo needed on curved canals or retreats (10%)

F. Do you utilize bond strength testing exercises?
    i. Who supervises?
        Unofficially the bonding is tested; however, there is no official measuring device to perform this test

G. Do you use electric handpieces in the simulation laboratory? In the clinic?
    i. If no, why not?
        No Due to finances

    ii. If Yes, what system?

ASDOH/AT STILL Assessment '19

IV. Student Assessment

A. Does your institution have an international dental program?

No, but if we have space in the class we accept international students and they start with the second year students

i. If yes, does your school utilize a bench test? Please describe.

We do skill evaluation for operative procedures

ii. If yes, how many students are enrolled?

It differ but usually no more than one students depending on the space availability

B. Do you evaluate students using OSCE's?

Yes, in the pre-clinical courses and an OSCE by the end of the second year which is part of the pre-clinical competencies

C. Describe your primary didactic testing methodology

Written exam, multiple choice

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Exam soft

ii. Pros/cons to the one you are primarily using?

Great feedback and fast

iii. Are you investigating other methods?

No

Loma Linda University

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe

Bench test on class II on manikin and critical thinking questions based on case studies on two Sundays in August for 250 applicants for the class size of 32.

If yes, how many students are enrolled?

32

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft for all the exams that weighs 20% or more for the course

ii. Pros/cons to the one you are primarily using?

Students need to download the exam prior to the exam

iii .Are you investigating other methods?

a. If yes, which one(s)?

Not at this time

MIDWESTERN

IV. Student Assessment

A. Does your institution have an international dental program?

No

i. If yes, does your school utilize a bench test? Please describe.

ii. If yes, how many students are enrolled?

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

Primary is multiple choice exams using assessment programs in the testing center. Scantrons when necessary.

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Pros/cons to the one you are primarily using?

Availability of space

ii. Are you investigating other methods?

Not at this time

OHSU

IV. Student Assessment

A. Does your institution have an international dental program?

No

B. Do you evaluate students using OSCE's?

Yes, at the DS1 and DS2 level and some OSCE tests are being developed for the DS3 and DS4, but not to the same degree.

C. Describe your primary didactic testing methodology

MC, short answer.

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft

ii. Pros/cons to the one you are primarily using?

Pro: fast results, has time stamps to detect cheating. Cons: set up/technical

iii. Are you investigating other methods?

No

ROSEMAN

IV. Student Assessment

A Does your institution have an international dental program?

i. If yes, does your school utilize a bench test? Please describe.

ii. If yes, how many students are enrolled?

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft

ii Pros/cons to the one you are primarily using?

Editing & spelling

ii. Are you investigating other methods?
If yes, which one(s)?

University of Alberta

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe.

Candidates perform a comprehensive series of lab exams over five days.

ii. If yes, how many students are enrolled?

12 per year

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Computer exams using the Moodle plateform.

ii. Pros/cons to the one you are primarily using?

Ease of grading (MCQ are computer scored).

Long answer questions are typed thus easy to read then manually scored

Able to place photos and videos into questions

Immediate feedback

iii. Are you investigating other methods?

Not at this time

UBC XXXXXXXXXX

UCLA

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe.

Yes, bench test (Class II prep and restoration).

ii. If yes, how many students are enrolled?

20

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Combination of pen/paper for essays/quizzes; scanTron for MCQs, occasional digitally administered exams using CCLE (server/network capacity issues).

ii. Pros/cons to the one you are primarily using?

Majority of the testing is done with scanTron for ease of grading and similarity to NBDE. Pros: easy to grade. Cons: limitations when we try to extract more thought process from the students.

iii. Are you investigating other methods?

Not at the moment

UCSF

IV. Student Assessment

A. Does your institution have an international dental program?

Yes, Currently

i. If yes, does your school utilize a bench test? Please describe

Yes

ii. If yes, how many students are enrolled?

28

B. Do you evaluate students using OSCE's?

Yes

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft

ii. Pros/cons to the one you are primarily using?

Electronic/computer problems (only allow multiple choice questions or single word answers NO paragraphs)

iii. Are you investigating other methods?

No

UNLV

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe.

Yes. The bench test includes operative and fixed prosthodontic procedures performed on typodont teeth.

ii. If yes, how many students are enrolled?

Eight each year

B. Do you evaluate students using OSCE's?

No

C. Describe your primary didactic testing methodology

i Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft

ii. Pros/cons to the one you are primarily using?

Standardizes testing format between courses, it is secure and helps prevent cheating, it is online and can be accessed by faculty from anywhere, has flexibility in test question format and grading. There are sometimes issues with uploading of exams but these can almost always be rectified.

iii. Are you investigating other methods?

No

UOP

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe.

Yes - The following day there is a bench top test of prepping a CL II and a FVC

ii. If yes, how many students are enrolled?

26

B. Do you evaluate students using OSCE's?

Not there yet

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Electronic with Examsoft

ii. Pros/cons to the one you are primarily using?

Pros: Tagging items of interest, reports for students & faculty, Quicker administration of exams
Cons: Cost, Faculty comfort

iii. Are you investigating other methods**?** **Not at this time**

USC

IV. Student Assessment

A. Does your institution have an international dental program?

Yes, since 1967. We just had our 50th class graduated this year.

i. If yes, does your school utilize a bench test? Please describe.

Yes. We have used bench tests for our ASPID applicants since the 1970's. The format differs over the years. The past 10 years, we invite a group of selected candidates for a two-day interview. The first day is the interview. The second day is the bench test. The candidates are tested on three procedures, usually two preps and one wax carving project. A group of faculties will proctor the exam from 8am to 1pm and grade the exam in the afternoon.

ii. If yes, how many students are enrolled?

We can only invite the number of students to fill our two sim labs for the one day practical exam. 180 seats.

B. Do you evaluate students using OSCE's?

We use OSCE exam in our "Integrated Restorative Science" Module, which is the last fixed prosth module before the students enter the clinic (D5). Students are tested on instruments, radiographs, preps, and anything they have learned through the operative and fixed prosth courses they went through.

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

We stopped using paper and scantron for written exams about 4 years ago. Examsoft is our primary way of didactic testing. This year, we start using Examsoft for

1. **Giving quizzes during the lecture and in the sim lab**
2. **Student self-evaluation (in the sim lab and for homework)**
3. **Faculty sign-offs in the sim lab.**
4. **Taking attendance**

ii. Pros/cons to the one you are primarily using?

-Pros: 1. Easy to proctor. Not have to worry about students sitting too close together. Not have to worry about printing, carrying, and collecting the test questions, or running the scantrons to the test center for scanning.
2. Can see the results instantly, even in the middle of the exam.
3. We review the questions and answers immediately after the exam. We can throw away, give credit, to mistakes in the questions or bad questions. We also get to read student feedback on the questions after the test.
4. When we use Examsoft in the lecture as quizzes, it actually works as taking attendance.
5. When we use Examsoft to sign off procedures in the sim lab. We could analyze the data in many ways, including faculty calibration, common area of mistakes.
6. We need to provide the students with a scratch paper and have to make sure we give each student only one piece of paper, usually in a different color, and make sure we collect the paper at the end of the exam.
7. We can put nice pictures as part of the question.

-Cons: 1. You need to format the questions & answers to follow Examsoft protocol. For example, no symbols allowed in the questions.

2. Occasional problems with student downloading, signing in and uploading the exam. IT support is needed during midterm or final exams.

3. Some students just don't follow instructions, read emails. Sometimes they forgot to download or upload on timme.

iii. Are you investigating other methods?

Not at this time

UTAH

IV. Student Assessment

A. Does your institution have an international dental program?

No

i. If yes, does your school utilize a bench test? Please describe.

ii. If yes, how many students are enrolled?

B. Do you evaluate students using OSCE's?

Because opportunity for doing a FPD in the clinical setting is not uniform with all students, all D4 students, at the beginning of their senior year, do a Fixed Bridge Competency. This competency is done as a class in the Sim-lab. A portion of the Fixed Bridge Competency is OSCE based. The students rotate through a series of stations, each with questions that relate to treatment planning for, preparation of and evaluation of fixed bridges.

C. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

We use a combination of pen/paper-hand graded, ExamSoft and Canvas for testing.

ii. Pros/cons to the one you are primarily using?

Pros/cons to each method, we leave testing methodology up to the professor so that they can best fit the need of our students' education.

iii. Are you investigating other methods?

Not at this time.

UW

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe

Yes, consisting of treatment planning, fixed and removable pros, dental anatomy and operative

ii. If yes, how many students are enrolled?

8 Students

B. Do you evaluate students using OSCE's?

yes, depending on the course

C. Describe your primary didactic testing methodology

Multiple Choice Questions

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft (majority of courses), Canvas (some courses), paper (some courses)

ii. Pros/cons to the one you are primarily using?

ExamSoft is a powerful tool, take a little more work to develop exams initially compared to paper tests, students use their own devices for the exams but computer issues sometimes create problems during exams. We always have paper versions available just in case

iii. Are you investigating other methods?

Yes

a. If yes, which one(s)?

MERELY

WESTERN

IV. Student Assessment

A. Does your institution have an international dental program?

Yes

i. If yes, does your school utilize a bench test? Please describe.

ii. If yes, how many students are enrolled?

Yes, 5 students are evaluated on a Class II preparation and restoration

B. Do you evaluate students using OSCE's?

Yes, all 4 years

C. Describe your primary didactic testing methodology

Realizeit, ExamSoft, Top Hat, and Oral evaluations are all utilized

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ii. Pros/cons to the one you are primarily using?

a. **Pros: Analytics**
b. **Cons: Slow user interface**

iii. Are you investigating other methods?

NO

AT Still University/ ASDOH Administration '19

V. Administration

A. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

We do not have mandatory attendance but is some courses we require that

ii. Who is responsible for tracking attendance?

Faculty with help of the staff when attendance is taken. In the pre-clinic the row instructors.

iii. How effective is your policy?

It is effective when attendance is Mandatory

B. What is your policy with student complaints about grades?

They can review their exams and email the instructor with any issues

C. What is your policy on student absences?

They submit an absence request form to the administration (there is special email) a month a head (unless it is an emergency) they must get approved before they miss the class.

Students have to request to excy=used before missing, examThey can miss an exam if they are approved (with limitation to how many times). If they are sick, they can miss one exam without providing documentation after that they must provide doctor notes to miss an exam

D. Regional licensure exam

i. What exam(s) does your school host?

BOTH WREB & CDCA

ii. What's the general consensus towards the benefits of the exam?

The faculty are supportive

iii. What's the general consensus on the elimination of the exam?

iv. What are the alternatives?

Non

Loma Linda University

V. Administration

A. What is your policy on attendance?

i. Please provide the actual attendance policy statement

100% attendance is expected and absence in excess 15% may lead to a failing grade for the course

ii. Who is responsible for tracking attendance?

Course directors

iii. How effective is your policy?

not so much

B. What is your policy with student complaints about grades?

Students talk to the course director first, then to the department chair, then the academic dean as necessary

C. What is your policy on student absences?

Students are supposed to email to llusdabscence@llu.edu

D. Regional licensure exam

i. What exam(s) does your school host?

WREB Exam

ii. What's the general consensus towards the benefits of the exam?

user friendly exam

iii. What's the general consensus on the elimination of the exam?

not at this time

iv. What are the alternatives?

CAPE or CDCA

MIDWESTERN

V. Administration

A. What is your policy on attendance?

Attendance is mandatory.

Please provide the actual attendance policy statement.

CLASS AND EXAMINATION ATTENDANCE POLICY FOR DENTG 1614

As course director, I strongly believe that student learning is increased by greater attendance in class. Therefore, the number of classes that can be missed is limited. The types of absences that may be missed in this course that are advanced notice or excused are as follows:

Advanced notice absences:

1. **Chronic illness**
2. **Subpoenas**
3. **Official school business**
4. **ASDA/other dental organizations**
5. **Jury duty**
6. **Military duty**
7. **Religious Observance**

ii. Who is responsible for tracking attendance?

Administrative assistants through an online program (Tophat)

iii. How effective is your policy?

95%

B. What is your policy with student complaints about grades?

There is a 24 hour moratorium on grade discussions. Didactic questions must go through the class liaisons, practical questions through course directors only.

C. What is your policy on student absences?

In this course:

Students are allowed to miss 10 lecture hours in the course without a grade reduction. Students missing from 11 to 20 lecture hours in the course, without an advanced notice absence or an excused absence, will receive a percentage reduction from the grade earned in the course, corresponding to the number of lectures missed. The percentage deductions are noted below.

- **11-13 lectures missed = a 3% deduction from the final course percentage score**
- **14-17 lectures missed = a 6% deduction from the final course percentage score**
- **18-20 lectures missed = a 10% deduction from the final course percentage score**
- **21 or more lectures missed = automatic failure for the course**

TopHat software will be used to take attendance each lecture hour. Students who show up after attendance has been initiated, or who are not in present when attendance is taken, will be considered to be absent.

Signing for a fellow student is a breach of the honor code. Should this occur, both students will be reprimanded as deemed appropriate. Students should plan to be present through the Friday of finals week as examination and lecture dates and times are subject to change.

D. Regional licensure exam

i. What exam(s) does your school host?

ADCS and WREB

ii. What's the general consensus towards the benefits of the exam?

iii. What's the general consensus on the elimination of the exam?

iv. What are the alternatives?

Speaking as an ADEX examiner, I do not see a significant benefit for the regional board exams for our students. These exams end up being "hoops" to jump through and fees to pay in order to get licensed. We have never had a student not be able to pass the exam during the year they graduated, so I question if there is any benefit. The only thing I see is it is a way for state dental boards to "pass the buck" so they can say one of their licensees passed the boards to determine competence. As far as alternatives go, I can only speak for our school. Due to the quantity of procedures our students do, I feel comfortable with our school determining competence. . I do not believe we have a viable alternative at this point that state dental boards will consider to replace the regional board exams. The ADA's National OSCE is a possible future.

OHSU

V. Administration

What is your policy on attendance?

Mandatory 100% with exception for legitimate reasons spelled out in the policy statement. Students must request absences in advance when possible and when not possible, provide documention/authentication of legitimate reasons.

Please provide the actual attendance policy statement.

ATTENDANCE POLICY FOR DMD STUDENTS

Overview

The policy of the School of Dentistry is that attendance for all students enrolled in the DMD Program is mandatory at all scheduled class, pre-clinic and clinic sessions.

Purpose:

This policy establishes the expectations for student attendance while enrolled in the School of Dentistry at the Oregon Health & Science University and sets forth notification requirements in the event of absence.

Attendance Expectations:

Student attendance at scheduled classes, small group sessions, seminars, presentations, intramural clinics and rotations, extramural clinics and rotations, and official School or University required functions is mandatory. Students are expected to challenge all assessments given as part of the DMD program of study at the times scheduled by the course director. A score of "0" (zero) will be recorded for assessments that have been missed. At the discretion of Course Directors, attendance may be part of the course grading rubric and in general, there is no make-up for quizzes or assessments that require laboratories, or simulation activities.

Acceptable reasons a student may be allowed to make reschedule an assessment are defined by OHSU Policy 02-70-045 "Change in Scheduled Examination and Other Assessments" and include the following:

- **Serious Illness**
- **Hospitalization**
- **Death in the immediate family**
- **Approved religious observance**
- **Approved accommodations for disabilities**
- **Unique academic or professional opportunities (pre-approved by the Office of Academic Affairs)**
- **SOD Approved Events (pre-approved by the Office of Student Affairs)**
- **Jury Duty**
- **Other compelling reason (pre-approved by the Office of Academic Affairs)**

Students who seek to reschedule an examination for medical reasons may be required to provide appropriate documentation.

Students anticipating an absence that conflicts with a scheduled assessment must inform the Office of Academic Affairs in writing, OHSU email preferred, at least 30 days prior to the anticipated absence. For absences due to illness or unexpected emergencies, students must

call or email the Office of Academic Affairs prior to scheduled exam. Students who miss an assessment for medical reasons will be required to provide appropriate documentation.

Students who will miss a scheduled assessment due to attendance at an SOD approved event, must notify the Associate Dean for Student Affairs no later than 30 days prior to the SOD approved event in which they would like to participate. The Office of Student Affairs will provide the Office of will provide the Office of Academic Affairs with a list of students approved to participate in each SOD Approved Event two weeks prior to the scheduled event. Only the students pre-approved will be allowed to reschedule any missed examinations or tests.

The Associate Dean for Academic Affairs, in consultation with the course director has the authority to reschedule assessments for students who have missed a scheduled assessment due to reasonably excused absence.

Attendance during Extramural Patient Care Sessions

The student shall notify the Office of Community Dentistry prior to the scheduled session that will be missed due to the absence. The Office of Community Dentistry will notify the appropriate community sites and the Office of Academic Affairs. Depending on the length of the absence, students may be required to make-up the missed community rotation absences.

Special Conditions

From time to time special situations will arise that need individualized planning and considerations. Among these situations are personal health issues, family obligations, as well as post graduate educational applications and National Board examinations.

Personal Health Issues and Family Obligations

The student is advised to meet with the Associate Dean for Student Affairs and/or the Associate Dean for Academic Affairs preferably two weeks prior to the expected absence. The School and University have resources available to help address issues. School Bylaws permit the granting of Leaves of Absence to facilitate this process. Accommodating remedial work will be determined by the Student Promotions Committee (SPC). The plan will be communicated to the student and the appropriate Course Directors, Group Leader, Office of Extramural Programs and the Office of Student Affairs.

Post Graduate, GPR, AEGD and Private Practice Interviews

Interviews should be conducted outside of regularly scheduled school hours. If students are unable to arrange interviews outside of school hours and the interview falls on an examination or test date, prior approval must be obtained from the course director and the Office of Academic Affairs at least one week in advance. Course instructors are not obligated to provide make-up exams for absences due to interviews.

Externships

Externships should be scheduled during break weeks between terms. All externships must be pre- approved by Associate Dean of Academic Affairs in conjunction with the Group Leader.

National Board Examinations

Students are expected to schedule National Board examinations during term breaks. It is understood that limitations related to testing sites and dates occur. In these circumstances, students must notify the Course Director and the Office of Academic Affairs prior to challenging the exam.

Faculty Responsibility

There is no intent in this policy to mandate monitoring of student attendance by faculty. However, Course Directors may choose to include attendance in their course assessment measures and to document the expectation in the course syllabus. In addition, if a faculty is aware of student attendance issues, the faculty may submit a Professional Monitoring Form to the Office of Academic Affairs.

ii. Who is responsible for tracking attendance**?**

Course Directors, Group Leaders/Clinical Coordinators

iii.. How effective is your policy?

For the majority of students, the policy is effective. There are always those who need to be reminded either through grades or conversation that the policy is enforced or carries consequences

B. What is your policy with student complaints about grades?

Follow the chain of command: course director, office of academic affairs, the dean, the university

C. What is your policy on student absences?

Absences are excused for legitimate reasons outlined above. There are a certain number of absences that are unexcused for weddings, personal family events that do not penalize the student. However, if a student is a non-performer, then that will be reflected in the grade.

D. Regional licensure exam

i. What exam(s) does your school host?

WREB only

ii. What's the general consensus towards the benefits of the exam?

It is stressful but easy to pass for any practitioner who knows what he/she is doing. It is convenient for the students because it is offered here; the results are obtained quickly. It is a fair exam.

iii. What's the general consensus on the elimination of the exam?

It depends on the alternative

ii. What are the alternatives?

OSCE, Portfolio. Our students put together a portfolio of focused and comprehensive cases and it documents their clinical procedures, treatment planning, evidence basis for making choices, critical thinking, self assessment/reflection

ROSEMAN

V. Administration

A. What is your policy on attendance?

90% required

i. Please provide the actual attendance policy statement.ii.

- - - - - - - - - - -

ii. Who is responsible for tracking attendance?

clinic managers

iii. How effective is your policy?

Struggles

B. What is your policy with student complaints about grades?

Review Board

C. What is your policy on student absences?

Must make up missed experiences

D.Regional licensure exam

i. What exam(s) does your school host?

WREB & CDCA

ii. What's the general consensus towards the benefits of the exam?

iii. What's the general consensus on the elimination of the exam?

iv. What are the alternatives?

C. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

D. Discuss and describe suggestions for improving CODE.

University of Alberta

V. Administration

A. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

Absence Policy & Procedure

Students are required to submit an absence form for any missed mandatory sessions and clinics. Please note, 3rd and 4th year students may only miss up to 5% of clinics annually.

Absence forms must be completed by the student with details of all curriculum components that will be missed due to the absence. Forms must be submitted to Academic Teaching Services at least 10 business days in advance of the date being requested for approval.

- ***Absence forms for planned absences submitted less than 10 business days of requested date will be denied*. In cases of illness or emergent situation, students are expected to submit an absence form within a reasonable time frame and these will be reviewed on a case-by-case basis.**
- **For flex day absence requests: Blackout days (dates flex days cannot be used): OSCE; EXAM; ASSESSMENT; DISCOVERY LEARNING; UNIQUE DIDACTIC AND LABORATORY SESSIONS or during any EXTERNAL ROTATIONS. Any requests for time that falls on blackout events *will not* be approved.**
- **If a flex day request is completed before the 10 days and does not involve blackout times, Student Affairs will ascertain whether such leave will impact existing patient bookings before granting approval.**

Absence forms for illness or extenuating circumstances should be submitted to Academic Teaching Services *within 2 (two) working days* following the missed session or as soon as the student is able.If you are sick, you need to report your absence as soon as possible, especially if you are missing an assessment/examination.

i. Who is responsible for tracking attendance?
Course coordinators and clinical supervisors.

ii. Who is responsible for tracking attendance?
Very

B. What is your policy with student complaints about grades?
1. Appeal to course coordinator 2. Department of dentistry/faculty 3. University

C. What is your policy on student absences?
See above

D. Regional licensure exam
i. What exam(s) does your school host?
National Dental Boards (Canada)

ii. What's the general consensus towards the benefits of the exam?
Positive since it forces students to review the entire program.

iii. What's the general consensus on the elimination of the exam?
Okay for the time being.

UBC XXXXXXXXXX

UCLA

V. Administration

A. What is your policy on attendance?
No specific policy for clinic.

Preclinical courses, we have weekly quizzes at the beginning/end of the lecture to ensure student attendance. It counts as 40% of the students' written grade for the course

i. Please provide the actual attendance policy statement.
ii. Who is responsible for tracking attendance?
iii. How effective is your policy?
Effective

B. What is your policy with student complaints about grades?
Speak directly with Course Chair(s).

C. What is your policy on student absences?
If excused by student affairs office, student can make up for quiz/exam and in-lab projects afterwards. If students do not inform course chairs before the exam/quiz, barring extraneous circumstances, makeup is not allowed.

D. Regional licensure exam
   i. What exam(s) does your school host?
   WREB only
   ii. What's the general consensus towards the benefits of the exam?
   Mixed. Most understand it is necessary at this point in time. More seasoned faculty think it's necessary, less seasoned faculty seem to think an OSCE is more fair.
   iii. What's the general consensus on the elimination of the exam?
   Very mixed for the reasons above.
   iv. What are the alternatives?
   Licensure by portfolio, but we have a very low interest rate in this.

UCSF

V. Administration

A. What is your policy on attendance?
   i. Please provide the actual attendance policy statement.
   Mandatory quizzes
   ii. Who is responsible for tracking attendance?
   Course Diectors
   iii. How effective is your policy?
   Fair

B. What is your policy with student complaints about grades?
Review by course director

C. What is your policy on student absences?
A**llowed-website register**

D. Regional licensure exam
   i. What exam(s) does your school host?
   WREB
   ii. What's the general consensus towards the benefits of the exam?

GOOD

iii. What's the general consensus on the elimination of the exam?
iv. What are the alternatives?

UNLV

V. Administration

A. What is your policy on attendance?
   i. Please provide the actual attendance policy statement

1. Attendance. In accordance with the NSHE Board of Regents Handbook, Title 4 Chapter 20, Section 3.1, there shall be no official absences from any University class. This SDM class attendance policy will be detailed in each course syllabus. All students/residents at the SDM are expected to attend all scheduled programs, seminars, meetings, classes, and clinical sessions regardless of date or time throughout the academic year, unless formally excused. It is the personal responsibility of the student/resident to consult with each individual faculty member regarding absence(s) from class or clinic.
Students/residents are expected to notify the Office of Admissions and Student Affairs or respective Program Director in accordance with the specific program policies prior to an absence. In the case of unexpected emergencies, students are expected to notify the Office of Admissions and Student Affairs or respective Program Director as soon as reasonable possible afterwards.
Absences will be approved only for reasons of illness or emergencies of the student/resident or immediate family, religious observance, jury duty, and participation in approved activities (e.g., involvement in national organizations and/or professional activities). Family reunions, days off for recreation, travel, social events (e.g., birthdays, weddings, and anniversaries), additional vacation, etc., are not considered approved absences. Pre-doctoral students with four (4) or more absences without prior notification can be dismissed. Course Directors shall document and report all absences without prior notification to the Office of Academic Affairs. Absences for pre-doctoral students (DMD and/or DDS) attending an employment interview and for postgraduate residency interviews will be limited to no more than ten (10) days within an academic year. Approval for absences relative to job interviews and residency program interviews will be dependent on academic progress. Postgraduate students/residents must refer to their individual program supplement for attendance policies within their program.
UNLV, School of Dental Medicine 2019-2020 Student Handbook May 1, 2019 7
In the event of a medical problem of a student/resident or a family member, the student will contact the Associate Dean for Admissions and Student Affairs or respective Program Director who will inform the appropriate faculty member(s). The course director, team leader, or Program Director, as applicable, will approve/disapprove the absence.
Activities missed during an approved absence may be completed by the student based

upon the discretion of the course director, team leader, or respective Program Director. At the discretion of the course director, absence due to illness extending beyond three (3) days may require a physician's letter.

2. Extended Leave/Leave of Absence. Leave that is required for an extended period of time (e.g., maternity leave, leave for personal health, or family-related emergencies) will be dealt with on an individual basis and may lead to extended time in the program. Such decisions will be made by the Dean (or designee), the Department Chair and/or respective Program Director, in consultation with the faculty and the student. Postgraduate students/residents must refer to their individual program supplement for extended leave of absence policies within their program.

In addition to this section, please review the UNLV's Voluntary Health Withdrawal Policy. When in doubt about who to contact regarding an unexpected emergency, contact the Office of Admissions and Student Affairs at 702-774-2520.

3. Religious Observance. It is the policy of the Nevada System of Higher Education (NSHE) to be sensitive to the religious obligations of its students. Pre-doctoral students (DMD and DDS) and post-graduate students/residents must submit their written notification requesting absence due to religious observance to the Office of Admission and Student Affairs or respective Program Director, where applicable. Any student missing class quizzes, examinations, or any other class/lab work because of observance of religious holidays shall be given an opportunity during that semester to make up missed work. The make-up will apply to the religious holiday absence only. It shall be the responsibility of the student to notify the instructor within the first 14 calendar days of the course (excepting modular courses) of his or her intention to participate in religious holidays which do not fall on state holidays or periods of class recess. This policy shall not apply in the event that administering the test or examination at an alternate time would impose an undue hardship on the instructor or the university that could not reasonably have been avoided by student compliance with this policy.

ii. Who is responsible for tracking attendance?

Each Course Director tracks attendance within their course and the Office of Admission and Student Affairs tracks attendance overall.

iii. How effective is your policy?

It is effective

B. What is your policy with student complaints about grades?

Academic Appeals Process. All students have the right to appeal a grade or academic decision

made by a faculty member, or the Associate Dean of Academic Affairs.

1. Academic Appeals Committee (AAC). AAC is responsible for hearing appeals relating any academic decision made by the SPC, Associate Dean of Academic Affairs and/or AEC. The AAC shall consist of three (3) faculty members appointed by the Dean (or designee). The Dean (or designee) will appoint the chair of the AAC. The Associate Dean of Academic Affairs (or designee) and Associate Dean for Admissions and Student Affairs (or designee)

will be ex-officio members.

2. Appeal of Final Course Grade. Students who believe that a grade or academic decision rendered by a faculty member is not representative of their performance or academic policies were violated, may elect to appeal the grade or academic decision rendered by a faculty member. Please note calculations of timeframes are made in working days, which excludes weekends, recess, and/or holidays. The student must submit an appeal in writing to the faculty member no later than five (5) working days after the UNLV Registrar posts grades. The faculty member must respond to the student's appeal in writing within five (5) working days after receipt of appeal. If the faculty member determines that the original grade (or academic decision) is correct, the student may then appeal in writing to the faculty member's Department Chair/Program Director (as applicable) within five (5) working days after receiving the faculty member's decision. The Department Chair/Program Director (as applicable) must respond to the student's appeal in writing within five (5) working days. If the student wishes to appeal the Department Chair/Program Director's decision, they must submit the appeal in writing to the SDM AAC through the Dean's Office within five (5) working days after receiving the Department Chair/Program Director's decision. The AAC will meet and prepare a written recommendation regarding the student's appeal and forwarded to the Dean within ten (10) working days after receiving the student's appeal. The Dean will review the recommendation and make a final decision regarding the student's appeal. The Dean may approve, amend, modify, or reject the recommendation of the AAC. The Dean will make a final decision and notify the student within five (5) working days after receiving the AAC's recommendation. The decision of the Dean in all review matters shall be final.

3. Appeal of Mandated Repeat of Course or Academic Year, Academic Suspension, or Academic Expulsion (Dismissal). In situations where a student does not meet the criteria for satisfactory progress, the Dean (or designee) will consider all evidence and recommendations from the SPC/AEC and Associate Dean of Academic Affairs/Associate Dean for Advanced Education (or designee) prior to meeting with the student and issuing a written decision. Please note calculations of timeframes are made in working days, which excludes weekends, recess, and/or holidays.

A student may appeal the Dean's (or designee's) decision. Pre-doctoral students/ postgraduate students must submit their appeal in writing through the Dean's Office to the AAC within five (5) working days of receiving the written decision from the Dean (or UNLV, School of Dental Medicine 2019-2020 Student Handbook May 1, 2019 31 designee). During the appeal process, the student will be removed from all classes and clinic participation.

The AAC will review all evidence and make a recommendation to the Dean within ten (10) working days from the date of receiving the student's appeal. The Dean will review the recommendation from the AAC. The Dean may approve, amend, modify, or reject the recommendation of the AAC. The Dean will make a final decision and notify the student within five (5) working days after receiving the AAC's recommendation.

The decision of the Dean in all review matters shall be final.

4. Academic Appeals Hearing. During any academic appeal hearing, the student may have one advisor present (e.g. an attorney, family member, fellow student, or faculty member).

The student has the right to be assisted by any advisor they choose, at their own expense. The student is responsible for presenting his/her own information. An advisor is NOT permitted to speak on behalf of the student and not allowed to be both advisor and witness on their behalf. If a student requests an advisor, the student will be required to complete a FERPA Privacy Waiver and the advisor may be required to sign a confidentiality agreement.

5. Extension of Time Limits. It is intended that the all-academic appeals be addressed quickly, and where reasonably possible the time limits in this process should be met. However, there may be circumstances where more time is required to conduct a thorough review, accordingly, the AAC conducting the review or the appealing student may request an extension of the time limits. Any extensions must be in writing and signed by the student and the Associate Dean of Academic Affairs (or designee

C. What is your policy on student absences?

Refer to attendance policy

D. Regional licensure exam

i. What exam(s) does your school host?

ADLEX, WREB

ii. What's the general consensus towards the benefits of the exam?

It is required by the vast majority of states to be licensed.

iii. What's the general consensus on the elimination of the exam?

Elimination of the exam would save the students money, eliminate concerns about patient based clinical exams, eliminate redundancy in testing competence and allow schools to teach best practices based on the most current evidence rather than trying to teach that and to the licensure exam.

iv. What are the alternatives?

Portfolio, OSCE style/Typodont bench test, no licensure exam, residencies.

UOP

V. Administration

A. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

Currently under revision

ii. Who is responsible for tracking attendance?

Office of academic affairs / Course directors / Group Practice Leaders

iii. How effective is your policy?
Marginal

B. What is your policy with student complaints about grades?
Students meet with course director, then the assistant dean and if unresolved can meet with the student appeals committee.

C. What is your policy on student absences?
Under revision

D. Regional licensure exam
i. What exam(s) does your school host?
WREB

ii. What's the general consensus towards the benefits of the exam?
Positive results, Good examiners, Quick response/results

iii. What's the general consensus on the elimination of the exam?
Positive: Use OSCE like Canada & eliminate live patients

iv. What are the alternatives?
OSCE like Canada, Portfolio (only in California)

USC

V. Administration

A. What is your policy on attendance?
Students must attend all lectures and lab session unless they have an "Excused Absence", which they have request through email to Academic Affairs and cc the course directors. Academic Affairs will then inform the course directors whether the requests have been granted or not. Course directors will decide how to deal with cases where student requested time-off but Academic Affairs denied.

i. Please provide the actual attendance policy statement.
Herman Ostrow School of Dentistry of USC Absence Policy
***Excused absences* include the following:**

- **Illness (must provide Dr.'s note to Academic Affairs including dates absent)**
- **Death in the family (must provide documentation - funeral program, etc to Academic Affairs)**
- **Holy Day (notification must be sent to Academic Affairs two weeks prior or make-up arrangements cannot be guaranteed)**
- **Only excused absences allow for make-ups (exams, etc) to be given if deemed appropriate by the course director. If your absence does not fall within the categories below, it will be Unexcused and will have a negative academic impact.**

ii. Who is responsible for tracking attendance?

The co-course director tracks the attendance. We have assigned seats in the lecture room and in the sim lab. Attendances are taken through checking open seats. This year, we start taking attendances using Examsoft, where we have students download the quiz file before the lecture and pull out the quiz in the middle of the lecture with the prompt of the slides. Students have to upload the quiz before the end of the lecture. In the lab, we still take physical attendance. But with the help of Examsoft, daily work is graded on the student's laptop on the spot, which is time stamped electronically, and students must finish and upload it before the end of the session

iii. How effective is your policy?

Attendance is part of the grade and all daily work are graded on time and on the spot. It is "reasonable" effective if the course director

1. Run a tight course with good course material, nicely structured, and students are well informed of the schedule every session, what they have to do, and what their expectations are.

2. Take routine attendances in class and record the attendances

3. Follow up the excused absences through email, chats and provide provisions for how to make-up the session.

B. What is your policy with student complaints about grades?

First, grading is a big operation and we organize the exam and grading process very seriously. From the collection of the typodonts, to sorting out typodonts, grading sheets, the actual grading, and finalizing the process, just to make sure the exam is fair and the faculty/TAs don't make any mistake during and after the exam. We make sure everything is accounted for before we grade and after we

finalize the process and put everything away. We make sure the students do not have any reason to argue for any type of incidences that can occur.

-As far as students arguing for grades after the grades had been handed out. We tried everything, from regrading, appealing in the past.

-Students usually complains about the "0"s, we call "Critical Errors", they made in an area of the exam. So first, students are graded very strict on their "critical errors" during their daily work. They have two "Challenge Exams" in each trimester and they must pass at least one "Challenge" without a critical error. Or they will be put in Remediation regardless of their grade. For grading Challenge Exams, we have a double/triple grading system for this situation. When it comes to the "unacceptable" grades, we call "Critical Errors" in any category, such as "marginal finish". Two faculty grading the category will have to agree and put their initials on the grading sheet and check the reason(s) on the grading sheet. Then one of the course directors will take a third look at it and if agrees, put his or her initial on the "0". The grades are handed out with the typodonts at the same time, and if the students disagree with the grade, they could line up and meet with the course directors, one by one to go over the grades. The way it is now, we rarely made any modifications to the grade after. There may be one, or the most, two that we had to change in any exam.

C. What is your policy on student absences?

Excuse absences will not get points off "attendance", but students do need to make up for the work they missed. The co-course director sends email to student who missed the session the provision how to make up the session.

-Unexcused absence will get points deducted from "attendance", and graded down for the work, if they made up for the session afterwards

D. Regional licensure exam

i. What exam(s) does your school host?

WREB, NERB

ii. What's the general consensus towards the benefits of the exam?

-I don't think we have any positive or negative feeling toward these exams.

iii. What's the general consensus on the elimination of the exam?

-No one has ever mentioned the idea of elimination of these exams.

iv. What are the alternatives?

UTAH

V. Administration

What is your policy on attendance?

a. What is your policy on attendance?

Student Attendance and Expectations

A. The primary responsibility of dental students is to participate in the curriculum and master its educational objectives. Due to major time commitments, students are strongly counseled against outside employment during dental school.

B. New information, knowledge and skills in the curriculum are foundational and integrated to build on previously introduced material. Teaching formats include formal classroom learning activities and laboratory sessions, clinical experiences, and collaborative learning. Interactions between students and faculty are critical to the educational experience and these learning experiences cannot be duplicated. Hence, attendance is a professional responsibility and is mandatory. Students are expected to attend all scheduled learning experiences, and course directors are responsible for defining the impact that non-attendance will have on grades in each course syllabus.

C. Classroom Hours

D. All classroom activities begin on the hour and end 50 minutes after the hour. Faculty, students and materials used for learning activities must be out of the room at least five minutes before the start of the next hour so the next learning activity can be set up and begin on time.

E. Class Cancellation

F. University of Utah official class cancellations apply only to non-clinical activities. Students with clinical responsibilities are expected to remain on service unless excused by supervisory or clinic personnel or course director.

G. When it is necessary to cancel classes at the University of Utah, official notice will be given by the President's Office through the KUED TV (Channel 7) and KUER (FM90) and the campus alert system.

H. All dental students are encouraged to sign up for campus alerts at: https://alert.umc.utah.edu/

I. Quiz and Examination Protocol

J. Specific requirements/protocols for examinations will be published or announced prior to the examination.

K. Missed Class, Examination, or Learning Activity

L. Anticipated Absence (Student knows of Conflict in Advance)

M. Occasionally, life circumstances or professional events may interfere with a student's ability to attend a learning activity or take a scheduled quiz or examination. Requests for an excused absence from learning activities or for quiz/exam rescheduling will be considered when health or life circumstances would preclude class attendance or quiz/exam performance. Such circumstances might include presentation of investigational work at professional meeting, death in the immediate family, serious illness, the birth of one's child, a family emergency, accident, or trauma.

N. Emergency or Unanticipated Absence (Student does not know of Conflict in Advance)

O. In the case of an unexpected or emergency situation, the student must notify the instructor as soon as possible. If the student is unable to reach the instructor, the student should notify the Office of Education and Student Life. The Office will notify the appropriate course director of the emergency. The student must submit a written explanation of the emergency and, upon request of the Associate Dean for Education and Student Life, provide additional supporting documentation.

P. Examinations, assignments, and clinical/learning experiences missed due to an emergency must be rescheduled and completed within the time frame approved by the course director, unless there are extraordinary circumstances (such as a student's ongoing hospitalization). If, due to circumstances beyond the student's control, the student is unable to reschedule a missed exam, assignment, or clinical experience in this time frame, the Associate Dean for Education and Student Life will determine the appropriate time to reschedule the activity in consultation with the course instructor.

Q. If students demonstrate a pattern of missing examinations, assignments, or clinical experiences on an emergency basis, they may be asked to provide written documentation from a third party explaining the nature of the emergency.

R. Unexcused Absence

S. An "unexcused absence" is defined as an absence in any course or clinical rotation that has not been approved. A first unexcused absence will prompt the student meeting with the cognizant dean (Associate Dean for Education and Student Life or Associate Dean for Clinics and Patient Care) who may impose disciplinary action appropriate to the circumstances. A second

T. unexcused absence will trigger a second meeting. Students with a third unexcused absence will be presented to the Academic and Professionalism Review Committee (APRC), which has access to a full range of disciplinary actions, including dismissal.

i. Who is responsible for tracking attendance?

For courses, the instructor is. For clinic, the group practice leaders are responsible.

ii. How effective is your policy?

To **date, attendance in classes has been a minimal issue. Frequent quizzes and attendance as part of the grade are much more of a motivator than a policy that no one reads**

B. What is your policy with student complaints about grades?

Academic and Professionalism Review Committee (APRC) Responsibilities

• _To monitor student academic performance, ethical conduct, and progress through the dental school curriculum.
• _To consider and evaluate for approval all course remediation recommendations that originate from faculty, course director or Section Head
• _To consider, evaluate and make recommendations to the Associate Dean of Education and Student Life an academic action or academic sanction based on a student's performance in a course, delayed course completion, failure to uphold the code of ethics and/or lapses in professionalism
• _To make recommendations to the Dean regarding each student's yearly promotion
• _To make recommendations to the Dean regarding each student's candidacy to receive the DDS Degree

"Academic action" means the recording of a final grade (including pass/fail) in a course, on a comprehensive or qualifying examination, on a culminating project, rotation, or paper. It also includes, but is not limited to a decision to impose course remediation, extend the curriculum, reprimand, place a student on academic probation, or to suspend or dismiss a student from an academic program because the student failed to meet the relevant academic standards of the discipline or program. An academic action may be overturned on appeal only if the academic action was arbitrary or capricious.

"Academic sanction" means a sanction imposed on a student for engaging in academic or professional misconduct. It may include, but is not limited to, requiring a student to retake an exam(s) or rewrite a paper(s), a grade reduction, a failing grade, probation, suspension or dismissal from the UUSOD, or revocation of a student's degree or certificate. It may also include community service, a written reprimand, and/or a written statement of misconduct that can be put into an appropriate record maintained for purposes of the profession. An academic action may be overturned on appeal only if the academic action was arbitrary or capricious.

"Arbitrary and capricious" means that there was no principled basis for the academic action or sanction.

University Policy 6-400 http://regulations.utah.edu/academics/6-400.php

Student Academic Performance

Assessing Academic Performance

Faculty members, including members of the Academic and Professionalism Review Committee (APRC), are qualified as professionals to observe and judge all aspects of a student's academic performance, including demonstrated knowledge, technical and interpersonal skills, attitudes and professional character, and ability to master the required curriculum.

Automatic Actions

The following academic actions are automatic and shall be imposed by the Associate Dean of Education and Student Life after confirming that the facts that serve as the basis for the automatic action actually occurred (e.g., failure of a course):

Academic Warning: Interim (mid-year or mid-block) failing grade of a didactic and/or clinical course or rotation; students placed on academic warning may not participate in school-sponsored travel

Academic Probation: Course or rotation failure or delayed course completion; students on academic probation may not hold elected office in the SOD or University of Utah or participate in school-sponsored travel.

Students will remain on Academic Warning or Academic Probation until the deficiencies have been corrected or the conditions set by the Associate Dean of Education and Student Lifehave been satisfied.

Appeal of Academic Actions

The UUSOD follows the appeals policies of the University of Utah Code of Student Rights and Responsibilities (http://www.regulations.utah.edu/academics/6-400.html). All references to "days" are understood to mean business days.

Appeals Process

A student who believes that an academic action taken is arbitrary or capricious has the right to appeal the academic action according to the process defined in the University of Utah Code of Student Rights and Responsibilities (http://www.regulations.utah.edu/academics/6-400.html) and described for the UUSOD in the following synopsis:

1. Discussion with the Faculty Member

Within twenty (20) business days of notification of the academic action, discuss the academic action with the involved faculty member and attempt to resolve the disagreement.

2. Consultation with Associate Dean for Education and Student Life

Initiate formal appeals process

- **_If the faculty member does not respond within ten (10) business days**
- **_If the student and faculty member are unable to resolve the disagreement, or**
- **_If the faculty member fails to take the agreed upon action within ten (10) business days**

Within forty (40) business days of notification of the academic action, the student shall appeal the academic action *in writing* to, and consult with, the Associate Dean for Education and Student Life.

3. Appeal to Academic Appeals Committee.
Within fifteen (15) business days of consulting with the student, the Associate Dean for Education and Student Life shall convene and notify the Academic Appeals Committee that the student is appealing the academic action.
4. Proceedings Before the Academic Appeals Committee
Proceedings before the Academic Appeals Committee shall follow the procedures defined in the University of Utah Code of Student Rights and Responsibilities (http://www.regulations.utah.edu/academics/6-400.html). The Academic Appeals Committee shall be comprised two SOD faculty members and one faculty member outside the SOD, appointed by the Personnel and Elections Committee of the Academic Senate. The dean shall appoint two graduate student members who are graduate students within the college. The members of the Committee who shall hear the case are the three faculty members and the two students from the appealing student's peer group. The dean shall designate one of the faculty members to serve as chair of the Committee. The Committee shall establish internal procedures consistent with the Student Code.
5. Review and Decision by the Dean or Designee
The UUSOD Dean, or designee, shall within ten (10) business days, consider the findings and recommendations of the Academic Appeals Committee, render a decision and communicate it as described in University of Utah Code of Student Rights and Responsibilities (http://www.regulations.utah.edu/academics/6-400.html).
6. Appeal to Senior Vice President for Health Sciences
Within ten (10) business days of receipt of the Dean's, or designee's, decision, any party may appeal the decision by filing a written notice of appeal with the Senior Vice President for Health Sciences, as described in University of Utah Code of Student Rights and Responsibilities (http://www.regulations.utah.edu/academics/6-400.html).

d. Regional licensure exam

i. What exam(s) does your school host?

WREB

ii. What's the general consensus towards the benefits of the exam?
Meh

UW

V. Administration

A. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

UW School of Dentistry Predoctoral Absence Policy & Procedures for General Absences Quizzes and Examinations Off-Campus Clinical Experiences Absences from Clinic

Attendance for all lectures, laboratory, and clinical sessions are mandatory. Course directors strongly discourage you to miss lecture, laboratory and/or clinical sessions. Excused absences may be granted by course directors for illness or for family emergencies. All missed work needs to be accomplished. Arrangements should be made directly with course directors as soon as it is practical to do so. If an unforeseen situation arises that causes an absence, it must be documented in writing (e-mail OK) to the course directors and the Office of Student Life and Admissions as soon as possible. For students with clinical responsibilities, the notification will provide clinic personnel with the opportunity to make arrangements to cover the absence. The course directors reserve the right to decide if makeup sessions, exercises or exams are possible.

Absences Due to Inclement Weather: The University of Washington usually remains open regardless of the weather. To confirm any UW closures/suspended operations, call the UW Information Hotline at (206) 547-INFO. If the UW is open but you are unable to travel, please follow the General Absences procedure above.

Appeals Process: Student doctors may appeal recommendations through, or seek assistance from, the Associate Dean for Student Life and Admissions, or the Student Life and Professionalism Committee.

ii. Who is responsible for tracking attendance?

Course directors, attending faculty and support staff

iii. How effective is your policy?

We believe it is effective

B. What is your policy with student complaints about grades?

Students direct their questions about exams and grades to course directors. Analyses of the exam results are used to identify questions that had errors or ambiguities and adjustments may be made based on these analyses. Final grades will not be changed except where a mathematical or computer error is evident.

C. What is your policy on student absences?

Refer to the attendance policy question

Biomedical Foundations: In addition: ATTENDANCE IS MANDATORY FOR ALL BIOMEDICAL FOUNDATIONS SESSIONS. Unexcused absences will result in the student's final grade in a Biomedical Foundation course.

Third year clerkship: a student may miss up to four half days of a clerkship without penalty to their clerkship grade. It is at the discretion of the Clerkship

Depending on what needs to be made up, it is possible that make up sessions will need to be scheduled in the fourth year.

Fourth year general practice: Exclusive of the SLR, Block or RIDE rotations, up to 20 full days may be permitted for excused absences across the entire 4th year. A maximum of 5 of these days may be used in Spring quarter, only by students who have successfully completed all clinical competency assessments and are in good standing with their clinical cases, as determined by the 4th Year Clinic Director.

D. Regional licensure exam
   i. What exam(s) does your school host?
      WREB
   ii. What's the general consensus towards the benefits of the exam?
      An actual practical/clinical exam is necessary to ensure that students have certain basic skills in clinical dentistry
   iii. What's the general consensus on the elimination of the exam?
      The exam is costly, and finding appropriate cases is sometimes difficult and may face ethical issues. Meanwhile, restorative faculty generally do not support complete elimination of the WREB.
   iv. What are the alternatives?
      Washington state will accept the OSCE exam following the Canadian model, which will be introduced in 2020

WESTERN

V. Administration

A. What is your policy on attendance?
   i. Please provide the actual attendance policy statement.
      Attendance is required at all scheduled instructional periods. Absence from instructional periods for any reason does not relieve the student from responsibility for the material covered during the periods missed. Frequent absences will be viewed as violations of the Standards of Academic and Professional Conduct. Students are expected to participate fully in all classroom, laboratory, and clinic activities. Students must notify CDM Office of Academic Affairs with notice of an absence by submitting a time off request via SharePoint as well as notifying the course director. Monitoring of the attendance policy will be the

responsibility of the Office of Academic Affairs. Excused absences include illness with a doctor's excuse, bereavement time for immediate family, CDM approved business (for example attendance as student reps at CDA, ASDA or ADEA). Student notification of absence does not constitute an excused absence. A written explanation of the absence, using the Absence Request Form DMD 6250 (including documentation on physician letterhead, in the case of illness), must be provided to the Office of Academic Affairs and the Course Director the next day the student is on campus.

ii. Who is responsible for tracking attendance?
Faculty and Staff

iii. How effective is your policy?
Fairly effective – OAA follows and tracks

B. What is your policy with student complaints about grades?
There is a Formal Appeal process that can be brought up on a case by case basis

C. What is your policy on student absences?
OAA Staff monitors absences. Usually they are considered unexcused unless an emergency is involved

D. Regional licensure exam
i. What exam(s) does your school host?
WREB

What's the general consensus towards the benefits of the exam?

Large Portability

ii. What's the general consensus on the elimination of the exam?
We have a good relationship with WREB. If there was to be a change, we would still like to have 3rd party involvement

iii. What are the alternatives?
California Hybrid Portfolio

2019 National Agenda: Southern Illinois University – School of Dental Medicine

I. Curriculum

1. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
   -We have a team-based approach to many courses throughout the curriculum, which we are continuing to ensure are represented by both biomedical and clinical faculty.
      -This occurs in biomedical foundations courses where clinical faculty are brought in to help teach as well as consult on the clinical relevance of biomedical knowledge.
      -Our Grands Rounds will now be involving biomedical faculty not only in being present, but evaluating students ability to integrate and apply biomedical knowledge to clinical care. The key assessment is through the Senior Case Presentation.
   -We are verifying that clinical competencies (across disciplines) have clear assessment criteria for student ability to integrate/apply biomedical knowledge to clinical care.
   -We are asking faculty to transition exams to simulate the format of INDBE. (this is still work in progress as new information comes in from the Joint Commission)
   -We are considering the prospect of a pre-test which simulates the INDBE, that may also be used as a screening tool prior to entrance of students into 3rd year clinic.

2. How many attempts do students get to remediate an exam, a clinical procedure, and a course?
   i. Exam – none, grade is percentage of course no mater result
   ii. Clinical procedure – once without penalty, then points required for discipline increase
   iii. Course - once
3. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?
   i. weekly
4. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
   i. If not, what do you contribute your success to? ii. If so, please describe the issues
   ii. No, due to location
5. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3
   i. No
   ii. What types of experiences are the most difficult to find in your patient pool?
      i Removable partial dentures
      ii Fixed partial dentures
6. Describe your screening/patient admissions process?
   i.
7. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?
   i. If so, please describe? Yes, there has been discussion because this tends to be the bottleneck of the process but there is currently no definitive plans.
8. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

i. No

9. If your state MLP's, who is responsible for the education? Please describe? ii. Do the students, faculty, and local dental community embrace the concept? N/A

iii. Would your institution be willing to provide this instruction? N/A

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

1. G.V. Black system
2. International Caries Detection and Assessment System (ICDAS) (two digits, first digit signifying restorative status, second digit signifying caries status)
3. ADA Caries Classification System (CCS) (tooth, surface, origin, classification (sound, initial, moderate advanced)6, active or inactive)
4. axiUm system (1/2mm into enamel, to DEJ, etc.)

b. How does your school calibrate its faculty for caries diagnosis?

1. Faculty calibration sessions
2. Competency exams
3. Mock board exams

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

1. Both… D1, semester 1 first 9 week course titled, "Cariology, Community and Preventive Dentistry" acts as a separate cariology curriculum
2. "Operative Dentistry I" D1, semester 1 has one lecture on cariology
3. "Operative Dentistry III" D2, semester 2 has one lecture dedicated to clinical cariology and also has it integrated into other lectures throughout the course

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

If a cusp is replaced with composite the patient should be advised of the need for full coverage in the near future**.**

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin? Indications: Good isolation, esthetics, Materials: total etch with Solo Optibond Plus, Filtek Supreme composite

ii. Sandwich technique? Indications: Class II composites, Materials: Surfil SDR, Frequency: all proximal boxes

iii. Bulk fill technique Not recommended, taught to layer 2mm increments

iv. Resin Modified Glass Ionomers (RMGI)? Indications: Root caries, difficulty in isolation, rampant caries, temporary, Material: Fuji II LC, Frequency: depends on instructor preference case by case

v. Amalgam?

1. % of direct restorations? Steadily decreasing
2. Bonded or unbonded? Bonded whenever there is a need for additional retention or size of restoration indicates need to reinforce remaining tooth structure

vi. Air abrasion? No

c. Are you doing more milled partial coverage as a result of the scanning and milling capability? Yes, but only to the extent that it is chosen over gold when indicated

i. Has it replaced gold in your clinic? Yes, almost completely for partial coverage though occasionally gold is still used

d. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

Almost all molar endo is being done by predoc students as we no longer have grad endo. We are drafting IAPP and AEGD students to do some retreats which amounts to about 10%. Patients can be referred out to private practice endodontists but due to fees charged this has not worked out. Retreatments, calcified canals are typically referred to either AEGD or IAPP (some of whom are endodontist already). As more difficult cases are being attempted by the pre-doctoral students more assistance is being given by the faculty.

Do you utilize bond strength testing exercises? No

ii. Who supervises?

e. Do you use electric handpieces in the simulation laboratory? In the clinic? No

i. If no, why not? cost to convert over from air

ii. If Yes, what system?

IV. Student Assessment

a. Does your institution have an international dental program? Yes

i. If yes, does your school utilize a bench test? Please describe. Yes, the test is 7.5 hours to do the following: class II amalgam preparation, class II amalgam restoration, class III preparation, class IV restoration, crown preparation, bridge preparation, bridge temporary and partial denture design

ii. If yes, how many students are enrolled? 6

b. Do you evaluate students using OSCE's? Several courses do including pre-clinical pediatrics, pre-clinical periodontics, a treatment planning course

c. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ScanTron sheets

ii. Pros/cons to the one you are primarily using?

Pros: quick feedback to students, time savings with staff assistance, no subjectivity, can follow board exam format (case based)

Cons: formatting the ideal question, varying the questions year to year, difficulty in assessing critical thinking

iii. Are you investigating other methods? Yes

1. If yes, which one(s)? More integration by use of case based questions, OSCE's

V. Administration

a. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

(Clinical policy as stated in the Student Interactive Learning Progress System (SILPS) document 2019)

Personal/Sick Leave. *You are expected to be actively participating in clinical patient care during every clinic session. Personal time away from the SDM is not guaranteed. If you wish to request leave time from the SDM for a valid reason (program interview, doctor appointment, etc.), you must make a formal request using a "Student Absence Request" form (available in the Office of Student Services) to do so. This request must be approved by all faculty instructors with whom you have scheduled courses, the Records Office Supervisor, and the Assistant Dean for Student Services.* ***All requests must be fully processed at least 30 days prior to the anticipated date of absence with the exception of illness.*** *For illness, the above listed individuals must be notified no later than 8am by SIUE email or voicemail (SDM office phone) on the day of illness. Failure to do so will be considered an unexcused absence. Return from any absence due to illness which extends beyond three consecutive days must be accompanied by a physician's statement, although the Office of Student Services has the right to request a physician's statement at any time. The Office of Student Services will track all absences and excessive requests will be denied. You should not request leave time, schedule National Board examinations, etc., when you are scheduled for rotations. If you* ***must*** *schedule a requested leave during an assigned rotation you* ***must*** *arrange for another student to cover your responsibilities. Also, this change must be approved by the Instructor of Record for that rotation. Once you have Instructor approval for the change, it must be logged into the clinic computer schedule by a scheduling clerk so that you will not be penalized for an unapproved absence. If illness forces you to miss clinic, you must inform Dr. Thomas' office (Admissions and Student Services) and the Records Office Supervisor in advance of your patient's (or a rotation patient's) arrival. This will allow rescheduling or alternative coverage to be arranged so as to minimize the inconvenience for your patient. (see page 8 for office phone numbers)*

Pre-clinical ATTENDANCE POLICY (as stated in each syllabus)

1. Attendance at all lectures, laboratories, quizzes and exams is mandatory.
2. Permission to be absent from a class is given either administratively or at the discretion of the Course Director. Depending on the type of absence requested, ADVANCE notification is required for planned absences. Students are to use the Student Absence Request Form, available from the Office of Admissions and Student Services, to file such requests. Refer to this form for details on the process of applying for an approved absence. Notifications of unexpected absence (such as illness) must be called to the Course Director's office phone or e-mailed to their SIUE e-mail PRIOR to the beginning of the class (both of these methods are date and time stamped). It is the student's responsibility to obtain all missed class material.
3. In the event of an unexpected absence, no student absence request form needs to

be completed, however, a student must also notify the Office of Admissions and Student Services @ 7170 or 7171 and (if in Year III or Year IV) the Clinical Records Supervisor @7012. The Assistant Dean for Student Services or the Associate Dean for Academic Affairs reserves the right to request a Physician's statement of a student at any time.

4. If a student misses a quiz, exam or other weighted course component as a result of an absence (as described above), appropriate remediation of the missed graded component will be determined by the course director, but may include:

a. Essay or short answer exam or quiz

b. Library research project

c. Multiple choice exam or quiz

d. Laboratory project or practical

e. Oral examination

f. Receive no credit for the graded component

**When possible, students will be notified at the time of their absence request as to the means of remediation that will be assigned for the missed component. If a student misses an examination or assignment as a result of attending a school sanctioned event, every opportunity will be afforded to that student to make up an examination or assignment that is of equivalent length, type and content as the rest of the class.*

ii. Who is responsible for tracking attendance?

The Dean of Admissions and Student Services office

iii. How effective is your policy? Adequate

b. What is your policy with student complaints about grades?

Academic Grievance Policy (as stated in the Student Progress Systems document 2019)

1. This policy is intended to provide students a grievance process without encroaching on academic freedoms or restricting the traditional prerogatives of teachers.

2. A student academic grievance consists of a complaint against faculty, administrators, staff members or other employees of the SDM concerning evaluation of student performance, conduct of instructors, and other matters concerning academic performance.

3. Students should be aware of their responsibilities under University policies covering admission, academic performance and retention.

4. Potential grounds for a grievance may include the following. This list shall not be considered all inclusive nor shall the proof of any of the following necessarily assure finding in favor of the grievant. A difference of opinion between student and instructor concerning evaluation of student work or progress normally shall not be considered a grievable matter.

a. Consistent failure of the instructor to be available to students for individual consultation outside the classroom during scheduled hours or by appointment;

b. Grades based on factors other than the student's academic or professional performance;

c. Class assignments, which are not related to the course, including work assigned solely for the instructor's personal benefit;

d. Class assignments which are punitive in nature;
e. Excessive absenteeism by the instructor;
f. Unreasonable departure from the primary objectives as stated in the course description and/or syllabus.
5. Any student who brings a grievance against a faculty or staff member has the burden of proof to establish, by a preponderance of evidence, the allegation.

c. What is your policy on student absences?
See attendance policies stated above

d. Regional licensure exam
i. What exam(s) does your school host? CRDTS
ii. What's the general consensus towards the benefits of the exam?
Minimal benefit
iii. What's the general consensus on the elimination of the exam?
In favor of elimination but uncertain of best alternative
iv. What are the alternatives?
-portfolio system
-residency program

e. Discuss opinions on realigning the CODE regions.
Dental schools that are within the same region and especially within the same state should be able to share information and collaborate within the CODE organization due to the many shared governances, economic issues, population issues, etc.
i. Are there schools you feel should be in your region that are not?
Yes, University of Illinois – Chicago, Midwestern University – Downers Grove, IL

f. Discuss and describe suggestions for improving CODE.
- Website
  - Create an access point to submit questions/topics for future agendas
  - Update/streamline the information for simplification and ease of access
- Annual agendas
  - Consider a fillable form version that would simplify the organization of all the information submitted by each school and possibly make it searchable

2019 National Agenda: Creighton University

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
Not changing to my knowledge

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?
i. Exam and clinical procedure remediations/retakes are up to professors/course directors
ii. Remediation or retake of a course must be decided by the SoD Student Performance

Committee

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?
Yes, weekly

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
Somewhat

i. If not, what do you contribute your success to?

ii. If so, please describe the issues
We draw from a large rural area in NE and western IA. Many patients are driving 1-2 hours to have treatment done at the school.

Patients become easily frustrated with the long appointments. As new patients they go through an assessment screening appointment with radiographs to see if they can be managed at the SoD. Then they are assigned to students, who may or may not call them in a timely manner. They are then brought in for a comprehensive exam with any consults, finish up the treatment plan, and maybe the prophy at that appointment. Sometimes there are several appointments before the patient perceives they've actually had anything done.

During the past 5 years or so, the phone number to our clinic was answered by a recording with the instruction to leave a message and expect a call back. We noticed a big drop off on new patients.

We are now investing on a call center that will be staffed by people who will answer the incoming calls and schedule appointments immediately.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?
We have student teams, and they sometimes share patients within the team to meet required procedures; also to provide coverage when away from the
school on externships or rotations to FQHCs.

i. What types of experiences are the most difficult to find in your patient pool? Class IIIs

f. Describe your screening/patient admissions process?

i. Assessment Clinic – about one hour given to each patient to see if they are eligible to be treated at our clinic.
   a. Screened = 96 scheduled/week; 30% no show
   b. Yield = 60/week

ii. Relatives, friends, acquaintances of student

iii. Referrals from private practice or FQHCs

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? No

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? No

i. If your state MLP's, who is responsible for the education? Please describe?
ii. Do the students, faculty, and local dental community embrace the concept?
iii. Would your institution be willing to provide this instruction?

II. Cariology

a. What terminology does your school use to define and categorize dental caries?
International Caries Detection and Assessment System (ICDAS)

We also use general terms of dentin such as Necrotic, Affected, Infected, Sclerotic

b. How does your school calibrate its faculty for caries diagnosis?
Ongoing with new Chair of Diagnostic Sciences (DS) Dept. They are calibrating, and will then invite Dept of General Dentistry (GD) to calibrate too

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.
No separate cariology course; instead it is taught in many courses, mainly DS and GD. Part of calibration is to review cariology delivery in curriculum.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?
Much the same as SA; consider pin placement and/or grooves, slots, divots

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?
   a. Centered over CEJ – gingival groove, incisal groove, bevel all enamel
   b. Completely on cementum – grooves and Glass Ionomer to restore
ii. Sandwich technique?
   a. In extreme circumstances, if pt. insists on tooth-colored material
iii. Bulk fill technique? No
iv. Resin Modified Glass Ionomers (RMGI)?
   a. For liner, sometimes for Class V restorative
   b. Prefer Glass Ionomer for restorative
v. Amalgam? Yes
   a. % of direct restorations? 10%-20%
   b. Bonded or unbonded? Unbonded
vi. Air abrasion? Yes, for microabrasion prior to CR veneers, or repairing CR restorations. We use the Kavo Rondoflex with 27 or 50 micron particles size.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability? No
   i. Has it replaced gold in your clinic? Ceramics have largely replaced gold in the clinic. Maybe 1%-5% gold restorations compared to ceramic restorations.

d. Who performs molar endo?
   i. Pre-doc students % - 100% or refer to private practice, Endo Residents %, Endo Faculty %

e. Do you utilize bond strength testing exercises? For students? If it is part of a table clinic study that investigates bond strengths.
   i. Who supervises? Faculty, lab technician

f. Do you use electric handpieces in the simulation laboratory? Yes In the clinic? Yes
   i. If no, why not?
   i. If Yes, what system? Bien-Air. There is a laminated reference sheet in each operatory listing suggested RPMs for different procedures in the lab and clinic (e.g. caries removal on slow speed 1500-2000 RPMs).

IV. Student Assessment

a. Does your institution have an international dental program? No
   i. If yes, does your school utilize a bench test? Please describe.
   ii. If yes, how many students are enrolled?

b. Do you evaluate students using OSCE's? No

c. Describe your primary didactic testing methodology
   i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
      a. Presently in the 2nd year of a 4-year integration of ExamSoft

   ii. Pros/cons to the one you are primarily using?
      a. Otherwise using paper and pen with multiple printed exam copies
   iii. Are you investigating other methods? No
      a. If yes, which one(s)?

V. Administration

a. What is your policy on attendance? Under revision
   i. Please provide the actual attendance policy statement.
   ii. Who is responsible for tracking attendance?
      a. Assistant Dean for Student Affairs
   iii. How effective is your policy?
      a. Needs improvement, that's why it's being revised

b. What is your policy with student complaints about grades?
   i. Begin with course director, then Dean for Academic Affairs

c. What is your policy on student absences? Under revision

d. Regional licensure exam
   i. What exam(s) does your school host? WREB and ADEX/CDCA
   ii. What's the general consensus towards the benefits of the exam? favorable
   iii. What's the general consensus on the elimination of the exam? None
   iv. What are the alternatives? None, unless the States in the Union do away with them

e. Discuss opinions on realigning the CODE regions.
   i. Are there schools you feel should be in your region that are not? No

2019 National Agenda: Colorado University

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

We have completely reorganized our curriculum to better prepare the students for the INBDE. This has included a change to a systems-based approach to the basic sciences from a discipline specific approach. In addition, we have added a course in the first and third years specifically focused on the integration of the basic science with clinical dentistry. We have had a calibration about the patient box question and we were encouraged to introduce it to pre-clinical courses. The administration hope is to develop a bank of patient box questions and course directors are expected to contribute with that.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

If the remediation is occurring within the course prior to the final grade being given the remediate process is up to the course instructor. If the remediation is occurring due to a course failure the student is allowed one attempt.
In Clinical Operative, students are allowed to remediate the practical exam one time before the failed the course and go through official remediation.
In Pre-Clinical Operative, one remediation practical exam is given as a single and optional opportunity before student officially fails the course.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

In Pre-Clinical Operative instructors rotate though the students' bay per lab session. We have 4 bays in the lab, with 10 students each, and about 5-6 instructors per session. We keep faculty consistently moving on to the bays and the overflow faculty will be a floater. Usually course directors are floaters.

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

We have some difficulties in attracting patients but we have been able to supply an ample number of patients to support the student's clinical education with some exception.

i. If not, what do you contribute your success to?

We have a centralized ongoing screening process for all clinics in the school. We also have been able to acquire some additional funding to directly support the care of eligible patients. In addition, we have enhanced our external referral process to support our need for specific treatment experiences i.e. endodontics

ii. If so, please describe the issues

We have difficulties supplying endodontic and complete denture patients.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

In general, yes, specifically we have difficulties with endodontic and complete dentures. We do co-assign patients among students if need to accommodate patients' needs in timely manner, threshold for graduation and competencies. We try to keep patients within practice, then team. Ultimately patient will be move to a different team according to needs.

i. What types of experiences are the most difficult to find in your patient pool?

Endodontic and complete dentures

f. Describe your screening/patient admissions process?

We have a centralized screening process for all clinics in the school (undergrad, graduate and faculty practice). The complexity of the patient (medical and social) as well as the complexity of the dental care needed determine the patient assignment. Screening sessions happened Monday through Friday, morning and afternoon sessions. On each session, about 16 patients are screened, each student will screen 2 patients, under supervision of 2 faculty. There is a staff that manages the screening clinic and patient assignments according to patients/students needs. Students' needs are managed through AxiUm.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? No significant changes at present

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? No

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

iii. Would your institution be willing to provide this instruction?

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

Definition: Dental Caries is the localized destruction of susceptible dental hard tissue by acidic by-products from bacterial fermentation of dietary carbohydrates.

Classification by site, extent, activity as well as classification systems such as ICDAS and Pitts' Iceberg model of caries

Clinically we define caries and chart on AxiUm as Inactive-Incipient, Active-Incipient, Moderate, Severe and Root Caries. We classify as incipient caries the non-cavitated lesions; therefore, non-surgical treatment. We classify as moderate lesions the ones that are cavitated and as severe when approaching to the pulp.

b. How does your school calibrate its faculty for caries diagnosis?

Cariology is a topic which may be included in the Faculty Calibration Program (open to all faculty, same lecture is repeated Monday through Friday 8am-9am, topic changes weekly)

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Yes, it does. Previously there were two separate courses:

Cariology I for DS1 Fall - 19 hours total (16 hours lecture + 3 hours exam)

Cariology II for DS2 Spring - 15 hours total (12 hours lecture + 1 hour clinic + 2 hours exam)

Effective Fall 2020, there will be one combined Cariology course occurring in DS2 Fall - 19 hours total (16 hours lecture + 1 hour clinic + 2 hours exam)

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

Not a primary indication, however done in transitional situations and when finances dictate. Taught for crown BU. Students can either use regular composite (Filtek Supreme Ultra) or core BU material (Cosmecore). Complex composite restorations are taught in pre-clinical operative. Additional retention as coves and boxes might be

needed depending on quality of dentin. If cusp coverage direct restoration is final restoration, Amalgam is recommended.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

We teach the use of composite resin to restore Cl V lesions and NCCL anytime proper isolation can be achieved.
Preparation: Preparation is caries/defect oriented. No ideal preparation size, depth pre-determined for clinical situation. Bevel recommended on enamel for esthetic purposes when applicable. For NCCL no preparation recommended.
Isolation: Rubber dam is taught as first choice and performed in Simulation Clinic for every prep and restoration. Alternative methods of isolation, such as Isovac, Optragate and retraction cord with Hemodent are also taught and often used in clinical cases.
Materials: OptiBond FL bonding system and Nanofill composite (Filtek Supreme Ultra), single or dual shade are taught and used in clinic. Liner recommended if deep cavity preparation, usually VitreBond.

ii. Sandwich technique?

Open and Closed sandwich techniques are taught.
Open sandwich for Cl II's: Mostly recommended for premolars, when preparation is subgingival and amalgam restoration can't be performed either because of patient's choice or preservation of tooth structure. RMGI (Fuji II LC) used on this case in combination with composite to rise the gingival floor to a more ideal position and facilitate restoration and proper contour of composite. RMGI must be below contact area.
Open Sandwich for Cl V's: When the cavity preparation is too large that a RMGI rest won't allow proper resistance, but yet subgingival that will benefit of RMGI properties, chemical bonding to dentin and fluoride release. RMGI (Fuji II LC) used on this case in combination with composite to rise the gingival floor to a more ideal position and facilitate restoration and proper contour of composite.
Closed sandwich technique: a liner or base is recommended any time for deep cavity preparation and when sclerotic or affected dentin is present. In general, Vitrebond liner or Fuji Triage (white or pink) as base.

iii. Bulk fill technique?

Only used for foundations when Cosmecore build up material is used.

iv. Resin Modified Glass Ionomers (RMGI)?

Differences between RMGI liner and base are taught. As liner material we recommend Vitrebond, while as base material we recommend Fuji II LC.
As restorative material, RMGI is used to restore Cl V's. Mostly recommended when subgingival moderate size carious lesion.
RMGI is also used as crowns luting agent (Fuji Plus).

v. Amalgam?

1. % of direct restorations?

For direct restorations, completed by pre-doc students, between 8/1/2018 – 8/1/2019:

- A total of 4076 restorations were completed, 585 of those restorations were amalgam (14%)
- Considering posterior teeth only: A total of 3408 restorations were completed, 578 were amalgam (17%).

2. Bonded or unbonded?

We only recommend the use of Amalgabond in case of need of auxiliary retention in amalgam core build ups. Amalgam bonding amalgam is a more complex technique. It can perform well if properly done, but we believe it doesn't replace the need of mechanical retention.

vi. Air abrasion?

Not taught as a restorative choice.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes, although we are milling primarily at lab

i. Has it replaced gold in your clinic? No

d. Who performs molar endo?

Pre-doc students %, Endo Residents %, Endo Faculty %

219 molar endo were completed between 8/1/2018 – 8/1/2019. Of those:

- 32 were completed by faculty (14.6%)
- 67 were completed by residents (30.6%)
- 120 were completed by students (54.8%)

e. Do you utilize bond strength testing exercises? No

i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? In the clinic?

Electric in simulation, both available in clinic. In general, air driven is the default in the clinic. Students can request the electric handpieces that are available in the dispensary.

i. If no, why not?

ii. If Yes, what system? W&H

IV. Student Assessment

a. Does your institution have an international dental program? Yes

i. If yes, does your school utilize a bench test? Please describe.

Yes, Class II preparation, Full crown preparation, waxing exercise

ii. If yes, how many students are enrolled?

40, a two-year program

a. Do you evaluate students using OSCE's?

Yes, in some classes, Implant Pros, Oral Surgery, Dental Anatomy are a few.

c. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

Canvas testing with Proctorio for test security. Some course directors used exam soft for a while, but currently merging to Proctorio. Scantron sheets are still used, but administration is encouraging to merge all exams to Proctorio.

ii. Pros/cons to the one you are primarily using?

Canvas – pros, immediate grading, tabulation, multiple questions styles. Cons – test security, scoring algorithm is not changeable.

Proctorio- pros, is secure, allows to track IP address and suspicious behavior, immediate test results and statistics. Cons – Web traffic can result in submission problems.

iii. Are you investigating other methods?

So far Proctorio has been the recommended choice.

1. If yes, which one(s)?

V. Administration

a. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

Attendance is mandatory for all course activities.

Students are expected to be present for all aspects of the curriculum including attendance at all didactic, laboratory and clinical courses/sessions. Attendance implies arriving promptly at the start of the course session and remaining until its conclusion. Unavoidable situations, such as illness, accident, or personal circumstance including religious holidays, approved accommodations from the Office of Disability Resources, and Title IX accommodations might influence a student's attendance and delay timely exit from an academic program. Students must make every effort to be in attendance as scheduled. Failure of students to meet attendance requirements may result in an F grade.

ii. Who is responsible for tracking attendance?

In the syllabus, the course director(s) must define the attendance requirements consistent with both the Student Professional Code of Conduct and CUSDM Academic Policy and any consequences for violating the policy. The course director(s) have the autonomy to determine how attendance is taken in his/her course. Four of five types of approved leave are tracked by the Office of Academic Affairs- Sick Leave, Bereavement Leave, Military or Jury Duty, and Professional Leave.

100% attendance to all assigned clinical sessions is required. If no patient is scheduled or a patient fails to present for an appointment, the student must be available to see patients, such as emergency patients, or assist another student. Clinical attendance is tracked by Clinic Director, Team and Practice leader through AxiUm forms that must be filled out by students and get proper approval.

iii. How effective is your policy?

The clinical attendance is very effective. Didactic courses attendance is according to the discretion of course directors.

b. What is your policy with student complaints about grades?

According to the CUSDM Academic Policy, a student may appeal a final course grade by providing a written statement explaining the reason for the appeal. The written statement must be submitted to the course director within 5 school days of receiving notification of the grade. If the issue is not addressed by the course director to his/her satisfaction, the student may escalate the grievance to a higher level in this order: the division/department chair, then to the Executive Leadership Team of the Student Performance Committee who will render a decision about the grade appeal. The student may choose to appeal this decision with the Dean, who has 10 working days to make the final decision.

c. What is your policy on student absences?

Students are required to take all exams as scheduled. If a student is going to miss an assessment, s/he must notify the course director prior to the start of the exam. Documentation must be provided to the Office of Academic Affairs on the first day that the student returns for approval.

d. Regional licensure exam

i. What exam(s) does your school host?

ADEX, WREB, each twice due to ISP program December graduation.

ii. What's the general consensus towards the benefits of the exam?

WREB more time friendly, ADEX more states (particular states)

iii. What's the general consensus on the elimination of the exam?

In favor of eliminating patient based, single encounter exam

iv. What are the alternatives?

DLOSCE, Portfolio if some portability developed

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

f. Discuss and describe suggestions for improving CODE.

Consider having the National CODE meeting in a more convenient time. A suggestion would be the day before AOD or ADEA meeting. It would be nice to spend more time together and hear what schools across the country are doing on a single topic. Discuss methods on how to improve operative dentistry teaching.

Consider having some improvements on CODE website. Having a more user-friendly website, that is easier to read and search. Build some collaborative library to share educational materials and resources accessible to CODE member only.

2019 National Agenda: University of Iowa

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

The University of Iowa College of Dentistry, Office for Education convened and manages work groups to review curriculum design and assess current level of biomedical/clinical integration. Multiple work group members represent contributions across departments with anchor members from the Curriculum Committee. The Associate Dean for Education and Director Education Development work together to ensure the direction will provide gaps analysis and curriculum data for continuous curriculum improvement. Continuous curriculum improvement is on-going regardless of changes in national testing.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

If a course is failed, typically students are allowed to take the course. If a course is failed twice the student is typically asked to leave the dental program. To take a course a third time there is usually a large amount of remediation attempted prior to taking the course a third time.

In the Dental Anatomy course for Freshmen, if the student get a score below 70% or had a critical error, will need to retake the exam, if passed the retake will get the minimum passing score. Students have 3 attempts to remediate throughout the course if they fail more than 3 times they fail the course.

For the Operative I course for freshmen: There is no remediation for didactic exams. They get two chances at attempting practical exams. But the maximum grade that they can get is lower each time they re-attempt it. Remediation for the course is developed based on individual student performance as needed in consultation with the course director and the Office for Student Affairs.

In D2 operative course students cannot remediate the didactic exams. Clinics are pass or fail. If students fail three clinic days then they have to remediate during summer.

In the D3 operative clerkship students are required to pass (70%) a multiple choice pre-test. If failed once they retake another multiple choice exam. If they fail twice they must sit for an oral exam. In the clinic there are expected to complete 2 PASS exams (AKA. Competency), a class II and III or IV. If a student fails 3 PASS exams they receive a failing grade for the course and must retake the course.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? Yes, faculty rotates among students' weekly during the course. We often have a faculty that is floating on the floor in addition to the assigned pod instructors. We have faculty calibration session for each of the practical exam exercises during the course.

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? YES, mainly to operative dentistry

i. If not, what do you contribute your success to?
ii. If so, please describe the issues

There are about 10-12 patients that receive comprehensive exam and treatment planning per day. But these are not sufficient to fill all the chairs in the junior and sophomore operative clinics. The other clinics get patient referrals from outside the college but not Operative Dentistry.

In the D-3 clerkship we have a lack of patients, so often our students will treat an emergency patient if they do not have a typical colligate patient scheduled. We are considering working with FQHC's to treat patients that they have to turn away. These patients could enter the operative clinic without going through the normal admissions/oral diagnosis process.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

We do not have minimal essential experiences. The most difficult procedure to acquire is an initial caries lesion that is a Class III or IV.

i. What types of experiences are the most difficult to find in your patient pool?

Although they are not requirements we have very few patients treatment planned for gold and CAD/CAM onlays, and believe it or not, but amalgams.

f. Describe your screening/patient admissions process?

Patients are first seen in the ADMISSIONS clinic where they are screened and radiographs are ordered. This clinic also takes care of patients that have emergency treatment needs. Admissions then routes the patients to Oral Diagnosis clinic (D-3 clerkship system) or Family dentistry clinic (D-4 clinic) for Comprehensive exam and Treatment panning. Some of the more difficult cases are directly sent to the Resident clinics.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? NO

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? NA

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

iii. Would your institution be willing to provide this instruction?

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

According to International Caries Classification and Management System (ICCMS). We use; active and Inactive initial, moderate and extensive.

b. How does your school calibrate its faculty for caries diagnosis?

In-service once a year for presenting and discussing of clinical cases.

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Freshmen class have an introduction to cariology course and then it is integrated throughout operative courses in freshmen, sophomore and junior year. Terminology is integrated throughout the pre-doctoral teaching in preventive dentistry, operative dentistry, pediatric dentistry, oral diagnosis and family dentistry.

III. Materials and Techniques

f. What does your school teach in terms of cusp replacement in composite resin?

Our school does not teach cusp replacement with direct resin composite as definitive restoration. We teach cuspal coverage direct restoration with amalgam and indirect restoration with resin composite, ceramic and metal.

g. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Yes, class V restorations with resin composite have been taught in pre-clinical and clinical courses and are frequently done in clinics. Material selection is mainly based on adequate field isolation, cavity preparation design, caries risk and esthetics. Total-etch technique using Optibond FL and Filtek Supreme

ii. Sandwich technique?

Yes, open and closed sandwich techniques are taught in preclinical and clinical courses. Closed sandwich technique is indicated for deep class II cavities when caries and preparation are deep and extend close to the pulp. Open sandwich technique is indicated for deep class II cavities with margins in cementum or in dentin, mainly for root caries and high caries risk patients. Fuji IX and Fuji II LC are options of materials available for the sandwich techniques. Closed sandwich technique is more frequently performed than open sandwich technique.

iii. Bulk fill technique?

Bulk-fill resin composite is taught as thicker (4mm) increment composite in pre-clinical lectures and used in clinics. Indications are for class I and class II restorations. Filtek One Bulk-Fill Restorative (3M) is currently available.

iv. Resin Modified Glass Ionomers (RMGI)?

RMGI are taught in preclinical and clinical courses. Although they have excellent adhesion and fluoride release/recharging ability, they are limited in usage by their relatively poor bulk mechanical properties, esthetics and durability. Indications are for high caries risk sites and patients, for provisional restorations, as a sealant in erupting teeth, for crown margin repair and restoration of root caries, and when performing open sandwich technique. Fuji II LC capsules (GC) is available in pre-clinics and clinics and is frequently used.

v. Amalgam?

Yes, amalgam restoration are indicated for large posterior restorations (3 or more surfaces), as a foundation for crowns, for the restoration of compromised posterior teeth when modifying factors preclude indirect cuspal coverage restorations, and/or for high caries risk patients. In term of materials, Dispersalloy (admixed, slower setting) and Megalloy (spherical, fast setting) EZ (Dentsply Caulk) are available in pre-clinic and clinics.

1. % of direct restorations?

Approximately, 30-40% of direct restorations are done with amalgam

2. Bonded or unbonded?

Only unbonded amalgam

vi. Air abrasion?

Yes. Air abrasion is taught for intraoral repair of resin composite, amalgam and indirect restorations as well as for additional retention when performing adhesive cementation of crowns, partial crowns and veneers.

h. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes, milled partial coverage restoration are frequently done using CAD/CAM.

i. Has it replaced gold in your clinic?

No, it has not replaced gold restoration in our clinic.

i. Who performs molar endo?

i. **Pre-doc students %, Endo Residents %, Endo Faculty %**

Endodontic treatment of molar teeth are performed by pre-doctoral students and by residents and faculty from the Department of Endodontics. Each pre-doctoral

student has to perform endo treatment of at least 1 molar. In general, molar endo corresponds to 20-30% of all cases performed by pre-doctoral students and 70-50% of all cases performed by residents in Endodontics.

j. Do you utilize bond strength testing exercises?

i. Who supervises?

Yes, a shear bond strength exercise is included in the pre-clinical course. Each student bonds two teeth with the adhesive system used in the pre-clinics and clinics. Samples are tested in a shear test machine by residents. The exercise is supervised by faculty and residents.

k. Do you use electric hand pieces in the simulation laboratory? In the clinic?

i. If no, why not?

ii. If Yes, what system?

Yes, electric hand pieces have been used in simulation clinic and clinics since 2018. The system used is from Bien Air Dental Classic CA 1:5L Micro-Series. It includes a friction grip contra-angle 1:5, a latch contra-angle 1:1 and a straight attachment.

III. Student Assessment

a. Does your institution have an international dental program? **YES**

i. If yes, does your school utilize a bench test? Please describe. **YES**

Applicants are required to amalgam and resin composite preparations and restorations, crown prep and provisional during one afternoon. RPD design on a different morning.

ii. If yes, how many students are enrolled? **4/year**

b. Do you evaluate students using OSCE's? **YES. Towards the end of the first year, students take an OSCE for instrument identification. The exam consists on 40 instruments for each student. Each student sits randomly and has a sheet where they need to identify and write the instrument's name before they move to another seat. Each instrument is identified by the sequence number where the student is sitting at. Forty seconds are allowed for each instrument identification. Normally, the time for the test is one hour considered that an explanation about the sequence of the test needs to be reinforced on that day. Pediatric dentistry is also doing OSCE for juniors.**

c. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

We are mainly using Scan Tron sheets. Online quizzes through ICON were attempted but didn't find them helpful, especially if included as part of grading.

ii. Pros/cons to the one you are primarily using? **Scan Tron sheets are easier to use.**

iii. Are you investigating other methods? **NO**

1. If yes, which one(s)?

IV. Administration

a. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

Following attendance requirements as set forth by a course director and attending all scheduled classes, lectures, clinics, seminars and laboratories; attending all scheduled clinic sessions regardless of whether or not a patient is assigned or all course requirements have already been fulfilled by the student

Dental students are expected to attend all classes and clinics. There is a prescribed absence policy for D3s and D4s below. As a matter of general policy, all students should notify the following people if they are to be absent from class or clinic:
(1) Instructor and/or clinic clerk (***where student is assigned***) please advise if patients have been notified or not **and**

(2) The Office for Student Affairs

(3) Seniors should call the Family Dentistry Office as well as the clinic clerk

The D1/D2 Excused Absence Form for **non-clinic courses** can be found on the College of Dentistry Intradent or in the Registrar's office (N312).
D2 **clinical** courses and all D3 and D4 **clinical** absences are managed through AxiUm, instructions are on the Intradent. D3 non-clnical absences are managed with the course director.

D3 CLERKSHIP ATTENDANCE POLICY
D3 students are required to attend all classes, seminars and clinic sessions as scheduled for each clinical clerkship unless an absence has been approved in advance. Successful skill acquisition and knowledge development are dependent on consistently attending and actively participating in all clinical and didactic sessions.
Designated university holidays and collegiate vacation days include Labor Day, Thanksgiving Break, Christmas Break, Martin Luther King's Day, Spring Break, Memorial Day, and Summer Break.
To provide you with some flexibility in scheduling, each student is permitted up to four full-day or eight half-days of excused absences that can be used with prior approval from the Clerkship Director(s) whose clinic course is impacted. These days include sick time requests.
Time must be taken as a single clinic session or entire day (not hour by hour). Absences must conform to the following guidelines:
Cannot exceed:
- One full day during a 5 week clerkship {OD/RAD/Path; Oral Surgery}
- One full day from each of the clerkships in a 10 week block {Operative/Pediatrics)
- Two full days during "superblock" (Prosthodontics/Endodontics/Periodontics)

Excused absences **cannot be used to extend** University holidays or designated breaks
Excused absences **cannot be saved** until the end of the academic calendar year
Attendance at a state, regional or national meeting for Continuing Education credit will count against excused absences. 57

Absences will be tracked and you may not take more time off than the allotted four days without special permission from the Associate Dean for Student Affairs in consultation with the course director(s).
Advance planning is recommended whenever possible. Upon your absence request, the clerkship director may provide counseling about your individual academic progress and make recommendations based on academic status. It is at the clerkship director's discretion to determine if additional experiences are required in lieu of the absence(s). Individual clerkships may have a maximum number of student absences allowed for a clinic session, which may affect your request.

With pre-approval from the respective clerkship director(s), D3 students in good academic standing are allowed time to present at scientific conferences or attend as a leader in a national organization. In this instance, the absence will not count against the number of excused absences. You are still required to submit the appropriate documentation through AxiUm and designate the 'Type of Absence' as **Professional**.
Steps for requesting time away from D3 Clinic for personal or professional reasons:
1. Complete the "absence request" form in AxiUm.
• designate Type of Absence as:
• Personal, or
• Professional (indicate name of the meeting and purpose, e.g. presenter, leader)
2. Use the "running man" to forward the request to your clinic clerk.
3. The clinic clerk will review your schedule and approve your request if appropriate.
4. The clinic clerk will forward your request to the Clerkship Director using the "running man".
5. The clerkship director will approve your request if appropriate.
6. The clerkship director will forward your request to the Associate Dean of Student Affairs and back to the Clinic Clerk so all parties know the request has been approved.
7. The Associate Dean of Student Affairs will forward the approved or denied request to the D3 student. 8. Until you receive the completed form with all approvals, do not assume your absence has been approved.

ii. Who is responsible for tracking attendance?
D1, D2—initial request/approval by course director, final approval by Dean for Students and tracked in their office database
D3 -- D1, D2—initial request/approval by clerkship director, final approval by Dean for Students
FAMD —initial request/approval by group leader, final approval by Family dentistry department

iii. How effective is your policy?
Pretty well maintained

b. What is your policy with student complaints about grades?
If a student has a concern about the action of a faculty, instructor or staff member, students are encouraged to first approach him or her to discuss the problem. If the issue is not or cannot be resolved in this manner, or you are hesitant about speaking to your instructor, talk with the faculty member's department head. You may also go to the Associate Dean for Student Affairs or other deans of the college.

c. What is your policy on student absences? **(see above)**

d. Regional licensure exam
i. What exam(s) does your school host? **CRDTS**
ii. What's the general consensus towards the benefits of the exam?
FEW IF ANY, prefer as stated from CMDL below
iii. What's the general consensus on the elimination of the exam? **YES**
iv. What are the alternatives?
OSCE, PORTFOLIO, The ADA, ADEA and ASDA are collaborating to create two exams, the DLOSCE (Dental Licensure OSCE) and a written exam (Compendium of Clinical Competency Assessment) See https://www.dentallicensure.org/en

"The Coalition for Modernizing Dental Licensure (CMDL) was founded in October 2018 by the American Dental Association, the American Dental Education Association and the American Student Dental Association. These three founding organizations have been working for many years to improve the dental licensure process, have joined together to author the Report of the Task Force on Assessment of Readiness to Practice (TARP), and now have established the Coalition. This Coalition will advocate for licensure reform and is committed to two key goals: Eliminating the single encounter, procedure-based patient examinations, replacing them with clinical assessments that have stronger validity and reliability evidence and Increasing initial licensure portability to allow for professional mobility and improve access to care"

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not? **No opinion**

f. Discuss and describe suggestions for improving CODE.

Suggest developing targeted goals and timeline for achievement, eg. loan forgiveness program for operative dentistry educators; common understanding/definition of operative dentistry as a discipline/specialty and dissemination to all interested parties; advanced educational program curriculum; ….

2019 National Agenda: University of Minnesota

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

Individual courses are moving towards more integrated content with coordination of content between basic science and clinical courses as well as case-based teaching and OSCE exams. These changes, however, are not centrally controlled.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

Terminology. We reserve the term "remediate" for the formal plan drawn up when a student fails a course. For a failed exam or clinical procedure, we talk about *retaking* a written or clinical exam.

Failing an exam. Course directors develop individual policies regarding when retaking an exam is allowed—however, it must be clearly detailed in the course syllabus. Courses generally do not allow retakes of exams for the purpose of getting a better grade. Retake policies usually focus on exams missed because of absence.

Failing a clinical procedure. There is technically no such thing as a "failing grade" for a clinical procedure. Students are given scores for preparation and restoration quality as well as for the overall set of treatment skills. Here is the 5-level grading scale:

5 = exceptional and worthy of recognition

4 = excellent and high quality

3 = clinically acceptable quality

2 = clinically questionable quality

1 = clinically unacceptable result that will need correction if possible OR some fundamental knowledge or skill was not demonstrated

Although a restoration may be scored as "clinically unacceptable," and the student required to make changes to make the restoration acceptable, this suboptimal result is not called "failure" in the course syllabus. The goal of formative assessment is to monitor student learning to provide ongoing feedback that can be used by instructors to improve their teaching and by students to improve their learning. Formative assessment helps students identify their strengths & weaknesses and target areas that they need to work on. It also helps faculty recognize where students are struggling & address problems in a timely manner. To keep formative assessments valid, it is important to record the score before instructor intervention.

Summative assessment, by contrast, refers to *evaluating student learning* at the end of an instructional unit by comparing it against a standard. In Operative Dentistry clinic, this is the *high stakes* skills assessment (previously known as "competency exam"). Students must pass these exams in order to graduate. If any feature in the cavity preparation or restoration is scored as clinically unacceptable, the skill assessment is considered a "failure." A failure in a skills assessment requires that the exam be taken again on another occasion. For multiple failures at skill assessments, we have the following policy (from the course syllabus):

> *"Failure on two attempts at the same type of competency examination or failure on three competency examinations of different types will require mandatory remediation, additional clinical experience, and evidence of improvement prior to allowing another competency examination to be taken. After an additional failure, the course director along with divisional faculty will determine the specific plan and criteria for remediation. A student may be dismissed from clinic and be required to repeat preclinical operative courses or exercises successfully prior to resuming patient care. Intentionally scheduling and taking a competency examination prior to becoming eligible or evidence of unethical conduct associated with the examination will result in a failure being recorded for the examination."*

An additional statement in the clinic course syllabus clarifies the replacement of restorations scored as clinically unacceptable:

> *"Clinically unacceptable restorations (e.g., restorations with open contacts, broken marginal ridges, overhangs, etc.) will need to be replaced by the student operator. Credit will only be given once for the procedure."*

Failing a course. School-wide remediation policy statement from student handbook:

> *"The Scholastic Standing Committee will decide the availability of re-examinations for failed courses after reviewing the student's academic record. If a student fails a course, the maximum grade attainable after successful re-examination is a C. If the student does not successfully complete re-examination, the Scholastic Standing Committee will determine the student's options."*

Remediation policy from preclinical course syllabus:

"Failure to complete the required minimal expectations will result in an "I" grade. In the event of an "I" grade, the student must make arrangements with course director before start of Summer term.

"A failing grade in the Lecture course will require re-registration, remedial course work and re-examination during the Summer term. A failing grade in the Laboratory course will require repeating the course the following year with permission of the course director and the Scholastic Standing Committee. All student failures are reviewed by the Preclinical/Didactic Progression Subcommittee and the ultimate decision for remediation for students in academic difficulty lies with that committee. If a remediation process is recommended and successfully completed, the highest grade that can be earned in the course is C-."

Remediation policy from clinic course syllabus:

"Failure to complete the competency examinations by the end of the senior year will result in an "I" grade. "I" grades must be remediated in the next full semester. Failure to resolve the "I" grade in the next full semester may result in conversion of the "I" to an "F" grade. Failing grades ("F") in clinical courses will need to be repeated. All student failures are reviewed by the Clinical Progression Subcommittee and the ultimate decision for remediation for students in academic difficulty lies with that committee. If a remediation process is recommended and successfully completed, the highest grade that can be earned in the course is a C-.

"Significant deficiencies identified in areas of organization, preparedness, communication skills, clinical judgment, clinical skills, or patient mismanagement or abuse will result in a warning and if not corrected will result in suspension of clinical patient care, remediation pre-clinically, or dismissal from school until evidence of improvement or correction has been presented. Unprofessional or unethical behavior, dishonesty, or forgery will result in suspension of clinical patient care privileges, failure of the course, and negating prior work completed, or dismissal from the School of Dentistry. Remediation or sanctions imposed will be directed by the divisional faculty and Clinical Progression Subcommittee on an individual basis."

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Faculty bench assignments are changed at the beginning and in the middle of each course (i.e., semester).

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

i. If not, what do you ~~contribute~~ attribute your success to?

ii. If so, please describe the issues

We seem currently to be able to satisfy the teaching objectives of the clinical courses, although we would like to have even more. Adequacy of clinical revenue is another matter, and fiscal concerns are always pressing for more efficient clinical operations. During the economic downturn a decade ago, we did have issues with a decrease in patient supply. This was addressed largely

through more aggressive advertising and improvements in phone answering. Also the difference between predoctoral clinic fees and the usual-&-customary fees in practice has a great effect on patient demand for service. Clinical fees have been tweaked over the years to try and increase revenue without diminishing patient flow. A couple of new initiatives designed to increase patient demand, are bundling the endodontic and crown fees—a reduced fee for patients that would otherwise select extraction, paired with an in-house crown and undergraduate endodontic treatment. Also, setting the cost of an implant equal to that of a three-unit bridge.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? Yes

i. What types of experiences are the most difficult to find in your patient pool? Removable Prosthodontics and Uncomplicated Endodontics cases

f. Describe your screening/patient admissions process?

There is no initial screening or Admissions Clinic. Patients first contact with the School of Dentistry is in the Color Groups (i.e., Comprehensive Care Clinics). This initial contact involves either addressing the patient's chief complaint (Emergency Visit) or providing a comprehensive oral exam and radiographic survey (Treatment Planning).

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? No.

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? We call them Dental Therapists.

i. If your state MLP's, who is responsible for the education? Please describe?

There are two programs in the state of Minnesota. First, is the University of Minnesota School of Dentistry. This program recently evolved into Bachelor of Science in Dental Hygiene/Master of Dental Therapy (BSDH/MDT) dual degree program. The program is 3-years long. To apply students must have completed at least 8 essential prerequisite college courses. Second, is Metropolitan State University and Normandale Community College – Masters of Science Advanced in Dental Therapy (MSADT) program. The program is 16-months long. To apply to the program you must first have a baccalaureate degree and be a licensed dental hygienist.

ii. Do the students, faculty, and local dental community embrace the concept? Some do and some do not. It is a polarizing issue.

iii. Would your institution be willing to provide this instruction? We do.

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

Generally, caries lesions are operationally defined as incipient (needing no surgical intervention) or cavitated (needing restoration). Proximal caries on bitewing radiographs may be designated as E1 (confined to the outer half of the enamel), E2 (advanced to the inner half of the enamel), D1 (confined to the outer third of the dentin), D2 (advanced to the middle third of the dentin), or D3 (advanced to the inner third of the dentin), based on apparent depth. Root surface caries is defined by the Billings Root Caries Severity Index: Grade 1 (incipient), Grade 2 (shallow), Grade 3 (cavitated), or Grade 4 (pulpal). Lesions may also be diagnosed as "active" or "inactive" (or arrested). We teach that incipient caries in pits and fissures is not clinically diagnosable. We do not use ICDAS—a more complex system with debatable improvement in clinical practice.

b. How does your school calibrate its faculty for caries diagnosis?

In-service training is provided by the Division of Operative Dentistry. Surgical thresholds are defined in written form in the Operative Dentistry I manual. Preclinical instructors are standardized before each laboratory session, and this topic is periodically included. Skill assessments in clinic involve two or more instructors, giving them time to share and discuss treatment.

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

The cariology curriculum is integrated into the Operative Dentistry pre-clinical courses—largely in the first course. Topics include: Pathophysiology of Dental Caries, Natural History of Dental Caries, Clinical Presentation of Dental Caries, Caries Risk Assessment, Diet & Dental Caries, Caries Control Measures, Surgical Thresholds, Root Caries, Attrition-Abrasion-Erosion Comorbidities, Carious Tissue Removal.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

We teach that this is not a good option for a definitive restoration because of limitations in the strength and wear characteristics of the material. However, we do teach that composite core build ups are acceptable, assuming crown fabrication is imminent.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Students are taught that when isolation, access and visibility are optimum, and most of the cavosurface margins are on enamel, composite resin is the material of choice. However, when isolation, access and visibility are optimum, and there is little enamel on the cavosurface margins (e.g., root surface and crown margins), resin modified glass ionomer is a better choice. If isolation, access and visibility are difficult, then dental amalgam should be considered. The composite resin used is Filtek Z250. The Class V composite resin is a common restoration type in clinic.

ii. Sandwich technique?

To be clear, we define the sandwich technique as the replacement of dentin with resin-modified glass ionomer, and enamel with composite resin. This technique is valuable in esthetic areas with broad lesions—such as is sometimes seen with erosion-abrasion lesions. Students are taught the technique and its indications in

lecture. In the simulation clinic they do layered composite restorations, but not a true "sandwich." It is occasionally employed in the clinic.

iii. Bulk fill technique? Not used due to concerns about the material's durability.
iv. Resin Modified Glass Ionomers (RMGI)? Used extensively for restoring root surfaces and crown margins (see i & ii, above). Material used is Fuji II LC.
v. Amalgam?
    1. % of direct restorations? 21%.
    2. Bonded or unbonded? Bonding amalgam is no longer taught.
vi. Air abrasion? Not taught in Operative Dentistry.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability? Yes. Students are taught digital impressioning in Prosthodontic preclinic. A majority of students take a CAD/CAM elective course in their senior year. Although increasing in prevalence, partial coverage (onlay) porcelain still accounts for a small fraction of direct restorations placed.

i. Has it replaced gold in your clinic?

Gold restorations are uncommon. In a one-year period, there were 2 gold inlays, 10 gold onlays, two ¾-gold-crowns, and 236 full gold crowns placed out of 13,141 restorations placed through Operative Dentistry (i.e., not counting Pediatric Dentistry or Prosthodontics). That means partial coverage gold amounted to 0.1% of the restorations placed. Full gold crowns amounted to 1.8%.

d. Who performs molar endo?

i. Pre-doc students % about 5 cases/year, Endo Residents % almost all, Endo Faculty % none.

e. Do you utilize bond strength testing exercises? No.

i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? In the clinic? No.

i. If no, why not? Total cost is preventing immediate conversion. We have investigated and had a company (Bien-Air) out to demonstrate.
ii. If Yes, what system?

IV. Student Assessment

a. Does your institution have an international dental program? Yes. The Program for Advanced Standing Students (PASS).

i. If yes, does your school utilize a bench test? Please describe. Beginning 2019, typodont crown preparation required..
ii. If yes, how many students are enrolled? 16/yr.

b. Do you evaluate students using OSCE's? Only one in Operative Dentistry, a timed hands-on instrument identification exam. OSCE's are used widely in other courses, including: Prosthodontics and Pediatric Dentistry.

c. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) ScanTron
ii. Pros/cons to the one you are primarily using? University has an efficient system (Office of Measurement Services) to scan tests and produce

detailed reports.

iii. Are you investigating other methods?
    1. If yes, which one(s)?

The Associate Dean for Academic Affairs has been investigating online exam systems, most notably ExamSoft. Downside is the need for IT support in the room during exams.

V. Administration

a. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

ii. Who is responsible for tracking attendance? Course Directors and Color Group Leaders.

iii. How effective is your policy? It is continuously evolving to keep up with student behavior.

Doctor of Dental Surgery Attendance Policy (posted SOD Intranet)

School Policy Statement: "The School of Dentistry has the responsibility of preparing its students both academically and clinically for the practice of dentistry. Successful skill and knowledge-based development requires continuous attendance in all classes and clinical sessions as designated by curriculum and clinic schedules. School of Dentistry students are expected to demonstrate professional behavior by attending classes and clinics as indicated on School of Dentistry course schedules and the School of Dentistry academic calendar.

"Students may be approved for time off from class or clinic for the following reasons. 1. Excused Absences, 2. Family Leave, 3. Personal Sessions (Personal sessions apply only to DDS3 and DDS4 students during clinical sessions.

"**Excused Absences**: Student absences from class or clinic may be excused for the following reasons: 1. Physical or mental illness of a student or a student's dependent, including medical conditions related to pregnancy [a. Students are required to submit a doctor's note to be excused from class or clinic and make-up any graded course component (exams, quizzes, practicals, etc.); b. The Boynton Self-Reporting Form for Illness or Boynton confirmation of contact letter will not be accepted to excuse an absence the day of an exam or practical. Only one Boynton Self-Reporting Form will be accepted each semester to excuse absences on days exams or practicals are not scheduled; c. Students experiencing challenges scheduling appointments with providers for physical or mental illness due to course and clinic scheduling should consult with the Assistant Dean of Student and Resident Affairs to make arrangements for an excused absence]; 2. Subpoenas; 3. Jury Duty; 4. Military Service 5. Recognized Religious Observances [Recognized religious observances as determined by the Office of Equal Opportunity and Affirmative Action]; 6. Emergency [Unavoidable or legitimate circumstances preventing attendance as determined by the Office of Student and Resident Affairs (e.g., medical emergency of a family member)]; 7. Bereavement, including travel for bereavement; 8. National Board Dental Examinations (DDS4 only); 9. Official School Business

"Students who plan to be absent due to circumstances described above must submit a planned absence request at least ten days in advance or a same day

absence request to the Office of Student and Resident Affairs, following procedures outlined in the School of Dentistry Student Handbook.

"Faculty and administration reserve the right to request documentation for any student absence.

"Instructors may not penalize students with excused absences and must provide reasonable and timely accommodations to make up exams or other course requirements if the student: 1. Was absent due to circumstances identified as excused in the reasons above or through family leave; 2. Has complied with notification requirements; and 3. Has provided any requested documentation.

"**Unexcused Absences – Didactic & Preclinical Courses**: Students are expected to be in class as designated by School of Dentistry course schedules and the School of Dentistry academic calendar. Attendance may be included as a mandatory, graded component of a course. Instructors are not required to offer make-up work to students who do not attend pre-clinical and didactic courses and do not have excused absences.

"**Clinic Attendance**: Students must be present in clinic a minimum of 90% of available sessions each academic year to ensure competency at the time of graduation. Students who present in clinic less than 90% of available sessions must meet with the Associate Dean for Academic Affairs to discuss their academic status and impact on their progress toward graduation. The Associate Dean for Academic Affairs may approve the student's additional absences or refer the student's situation to the appropriate progression sub-committee for further discussion. The sub-committee will have the authority to suggest a remediation plan and/or a program extension. The number of sessions required to fulfill the 90% requirement will be determined by the Offices of Academic and Clinical Affairs.

"Clinical Personal Sessions: Personal sessions approve students to be absent from clinic; they do not approve or excuse student absences in didactic or preclinical courses. Students will be granted 14 clinical personal sessions each academic year. Personal sessions should be used for job interviews, doctor's appointments, daycare changes, etc. Students requesting personal sessions must follow notification procedures or be subject to denial of the absence and/or a referral to the School of Dentistry Code of Conduct Officer. Students in clinic may not earn more than ten additional personal sessions by volunteering in clinic during breaks and may not roll over more than ten personal sessions from the DDS3 to DDS4 year. Personal sessions are not allowed when scheduled on outreach.

"Students who are not present in clinic and do not have an approved absence will be charged a personal session and reported to the School of Dentistry Code of Conduct Officer. Students will remain enrolled in the School of Dentistry if they have a negative personal session balance at the time of graduation until their balance is zero, unless there is an approved exemption from the Associate Dean for Academic Affairs.

"**DDS Clinic Same Day Absences**: Students are expected to be in clinic when scheduled as absences significantly impact patient care. However, the School understands that some excused absences cannot be planned in advance such as

illness, emergency and bereavement. Students may use same day absences for these situations. Students are allowed three days (i.e., six sessions) of same day absences each academic year for the reasons listed above (e.g., illness of self or dependent, bereavement, emergency). Students need to report these absences but do not need to submit any supporting documentation.

"Students will be required to make up same day absences if they exceed three total days. Same day absences can be made up by using personal days or being scheduled in clinic over break, during senior week or after graduation. Students exceeding more than three days of same day absences may be required to meet with the Assistant Dean of Student and Resident Affairs. The Assistant Dean of Student and Resident Affairs, in consultation with the Associate Deans for Academic and Clinic Affairs, may grant students permission to be excused for more than three days of same day absences without making-up clinic time if a student is experiencing extenuating circumstances and can provide any requested documentation. Students are responsible for contacting the Assistant Dean of Student and Resident Affairs within fourteen days of a same day absence to request an exemption from the three day limit. No exemptions will be granted fourteen days after an absence and students may not be excused for more than ten days of same day absences.

b. What is your policy with student complaints about grades?

Academic Due Process Policy (from Student Handbook)

Informal Resolution

"Student and/or class complaints about course organization, procedures, or grades should be first brought to the course director for informal resolution. If the student is not satisfied with the proposed resolution, then the student may next appeal to the Division Director. If the complaint cannot be satisfactorily resolved with the Division Director, then the student may next appeal to the Department Chairperson. If a mutually agreeable solution cannot be reached, the student may appeal to the Associate Dean for Academic Affairs. This is however the final level for appeal. Grievances involving an instructor's judgment in assigning a grade based on academic performance may be resolved only through the informal resolution described above.

"Student appeals, in writing, about adverse promotion decisions (such as suspension, repeat of a year or the dismissal from the School of Dentistry for academic reasons) shall be made to the Core Student Scholastic Standing Committee. The student has ten (10) working days in which to file an appeal. The Core Student Scholastic Standing Committee shall then meet and begin its review of the student appeal preferably within ten (10) working days from the time it was filed. The student may request in writing that the appeal hearing be delayed in order for the student to adequately prepare. Please see "Specific Procedures for Appealing Adverse Decisions" section later in this handbook.

Formal Process

"The student has a right to file an academic grievance either before or after complaints described earlier in this academic due process policy. Academic grievances

are complaints brought by students regarding the provision of educational and academic services affecting their role as students. Academic grievances must be based on a claimed violation of a University rule, policy, or established practice. This policy does not limit the University's right to change rules, policies, or practices.

"A formal process of resolution is available for academic grievances. The student must submit a formal complaint in writing to the Academic Complaint Officer of the School, identifying the student grievant, the respondent individual(s) involved, the incident, the rule/policy/established practice claimed to be violated, and a brief statement of the redress sought. Additional steps of the formal process of academic grievance are described fully in the Conflict Resolution Process for Student Academic Complaints.

c. What is your policy on student absences? See response to (a).

d. Regional licensure exam

i. What exam(s) does your school host?

DDS: ADEX (CDCA) and Canadian (NDEB); DH & DT: ADEX (CDCA clinical & written). ADEX involves manikin Endodontics & Prosthodontics), patient-based (Operative & Periodontics), and written (Diagnostics). NDEB is the Canadian licensing exam (written & OSCE), accepted by the MN Board of Dentistry.

ii. What's the general consensus towards the benefits of the exam? The University of Minnesota School of Dentistry faculty voted to stop hosting live-patient licensure exams because they considered the practice unethical.

iii. What's the general consensus on the elimination of the exam? In an effort to find alternative avenues to licensure, the school pursued two different options. One was the Canadian OSCE, an exam used for Canadian dental licensure—the MN Board of Dentistry now accepts this exam for licensure. Second was the Curriculum Integrated Format (Buffalo Model)— a cooperative exam between the University of Minnesota and CRDTS offered several times during the year whereby a treatment-planned patient-of-record could be used to satisfy both "competency examination" for the school and "licensure examination" for CRDTS. This second options only lasted for two years and was discontinue.

iv. What are the alternatives? See (iii).

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

f. Discuss and describe suggestions for improving CODE.

2019 National Agenda: A.T. Still – Missouri School of Dentistry & Oral Health

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

We now have seven umbrella-like courses instead of numerous courses that we had before. We have also increased the PBL and CBL sessions in our courses.
Block exams have been incorporated, as well.
One of our pre-clinical faculty spear-headed a faculty-wide initiative to each write 5 case-based questions modeled off of the new Integrated Board box format. The goal is to create a bank of ____ questions.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

Written Exam: typically one attempt, no retake opportunity.
Preclinical Practical Exam: one attempt, one retake opportunity.
Didactic Course: upon failure, remediation with approval of the Academic Progress Committee
Clinical Procedure: for competency, one attempt and one remediation opportunity.

- *Failure of a Competency Examination requires remediation. The CCU Director and/or specialty faculty involved will determine the readiness of remediation prior to retaking the Competency Exam. A student will be referred to the Academic Progress Committee by the course director, CCU director, SCU director or other faculty member if they fail the remediation.*
- *69% and below of daily essential experiences are scored as an "A" or an "I" in the Procedure Log -More than one critical errors in a semester -< 90% attendance - > 2 failed competency exams in any one discipline or 4 total failed competency exams - Did not successfully complete at least two ICSP rotations or did not submit all required reports/ assessments - Did not complete Exit Survey within time limit - One or more graduation requirements are not successfully completed on time and prior to graduation.*
- *Student will earn a Fail – F if he/she meets one or more criteria for failure and must meet ALL listed criteria to obtain the corresponding letter grade. Course grades shall be recorded as raw scores with corresponding letter scores. No grades will be rounded.*

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Daily

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
No

i. If not, what do you contribute your success to? *Our partnership with Affinia Healthcare lends us the patient population of a Federally-Qualified Community Health Center. We offer both a sliding-scale fee schedule in our Urgent Care clinic, and a reduced-fee schedule for our Comprehensive Care clinic.*
ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? *The large volume of our patient population affords MOSDOH students adequate numbers of patients to obtain essential experiences on separate patients without sharing for most Operative, Fixed/Removal Prosthodontics, Periodontics, and Oral Surgery essential experiences.*

i. What types of experiences are the most difficult to find in your patient pool?

The most difficult essential experiences include:

FPDs
Implant
Molar Endo

f. Describe your screening/patient admissions process? *To become a patient at the St. Louis Dental Center for a MOSDOH student, patients are directed to a Call Center number and scheduled in the Oral Diagnosis & Wellness Clinic. At the initial appointment, a limited exam with panoramic radiograph, head and neck exam checked by an Oral Pathologist, and triaging of dental treatment needs are performed upon verification that the patient is a good fit for the dental school clinic. The patient is then assigned to the student performing the OD&W exam for a comprehensive/treatment planning examination.*

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? *Not at this time.*

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? *Not at this time.*

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept? *Mixed opinions – but overall, we believe the Missouri Dental Association currently does not support MLP's.*

iii. Would your institution be willing to provide this instruction?

II. Cariology

a. What terminology does your school use to define and categorize dental caries? *GV Black terminology with introduction to ICDAS.*

b. How does your school calibrate its faculty for caries diagnosis? *There is no formal calibration on caries diagnosis. Based on the diversity of our faculty body, caries diagnosis is more anecdotal by design.*

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

We have a separate Cariology module that is part of an Operative Course.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

Multi-factorial – if elimination of a cusp occurs during cavity preparation, then onlay or full-coverage restorations are taught as ideal treatment. Based on our patient population, financial limitations are a significant factor in hindering ideal treatment, and large complex

resins/amalgams are performed clinically when full-coverage restoration is not feasible for the patient. Pins are still being utilized in the clinic, but primarily among certain faculty. Ultimately, I would surmise that pins are being phased out at the St. Louis Dental Center.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

Composite Resin: Filtek Supreme (packable) Filtek Supreme Ultra (flowable)
Glass Ionomer: Fuji II LC, Fuji IX, Equia Forte
Amalgam: Ionosphere, Henry Schein

i. Class V composite resin? *Composite is material of choice; however, if subgingival and/or unable to achieve control of environment, glass ionomer or amalgam used.*
ii. Sandwich technique? *Resin and glass ionomer used in deep restorations, such as Class II with subgingival or root-surface gingival extensions.*
iii. Bulk fill technique? *Not practiced in the SIM Clinic or Clinic*
iv. Resin Modified Glass Ionomers (RMGI)? *Subgingival or root-surface restorations, inability to achieve environment control, high caries incidence/risk, etc.*
v. Amalgam?
    1. % of direct restorations? *~35%*
    2. Bonded or unbonded? *Unbonded*
vi. Air abrasion? *Available for clinical use for*

c. Are you doing more milled partial coverage as a result of the scanning and milling capability? *Preclinical: students mill 1 onlay restoration. Clinical:*
i. Has it replaced gold in your clinic? *Gold crowns have a higher fee associated relative to all-ceramic/zirconia. Primary crown material treatment planned for full-coverage restorations include zirconia or E-max. Gold crowns are primarily by request of the patient and desire/ability to pay the higher fee.*

d. Who performs molar endo?
i. Pre-doc students %, Endo Residents %, Endo Faculty %
Pre-doc students: 85% Endo Residents: 15% Endo Faculty: 0%

e. Do you utilize bond strength testing exercises? *No*
i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? *Y e s* In the clinic? *Yes*
i. If no, why not?
ii. If Yes, what system? *KaVo*

IV. Student Assessment

a. Does your institution have an international dental program? *No*
i. If yes, does your school utilize a bench test? Please describe.
ii. If yes, how many students are enrolled?

b. Do you evaluate students using OSCE's? *Yes*

c. Describe your primary didactic testing methodology
i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
Primarily multiple-choice questions via ExamSoft
ii. Pros/cons to the one you are primarily using? *Not explored.*
iii. Are you investigating other methods? *Not at this time.*
    1. If yes, which one(s)?

V. Administration

a. What is your policy on attendance?

Please provide the actual attendance policy statement. "*It is imperative for students to follow the guidelines and expectations for attendance and excused absences. As a professional school, MOSDOH requires attendance and active participation in all components of the curriculum, which includes but not limited to lectures, laboratories, seminars, clinics, rotations and other course/clinic activities to obtain a passing grade. As a reminder, some classes may only be one or two days in length. Should a student miss a required learning activity, they are responsible for the material, any consequences, and for arranging make-up, if available.*

*An excused absence is **a request f**or a period of administratively approved absence from any required learning activities or clinic participation, without penalty. Excused absences may not be possible for required learning/laboratories or clinical activities that cannot be made up or for which the student's attendance is required for group work. Students seeking an excused absence should review the policy and processes below before seeking approval."*

Who is responsible for tracking attendance? *Administrative staff*

i. How effective is your policy? *Seems to be very effective.*

b. What is your policy with student complaints about grades? *Individual grade concerns/complaints are between the student and faculty/course director.*

c. What is your policy on student absences? *A student may request an excused absence from required learning activities for research opportunities, other school related activities, personal, professional, health-related, or emergency **reasons. All requests for an excused absence by students must be initiated in writing or via their ATSU email account, (phone or text message will not be accepted) 30 days prior to the requested date, regardless of holiday/summer/school breaks, etc. except in cases of verifiable health-related or emergency situations. Request associated with Health-related or emergency reasons must be submitted within 24 hours, or one business day**. Verification of the reason for the excused absence may be required. Excused absences are only issued for a short duration. Requests for excused absence will not be considered retroactively except in cases of verifiable emergency situations. Absences greater than **five academic days re**quire that a student request a personal withdrawal by notifying the MOSDOH Office of Academic Affairs*

Students must first obtain the "Request for an Excused Absence" form that is located on the MOSDOH Student Portal. After filling out the form, the student is required to obtain the appropriate signatures prior to submitting the form for review and approval to the Director, Student Success (D1 & D2)//Senior Administrative Assistant (D3 & D4).

*For all didactic and preclinical courses students must first obtain a signature from the Course Director (D1 & D2)/Course Director or Vice Dean, Clinical Education, Operations and Community Partnerships (D3 & D4). D3 and 14 students requesting an absence during clinic sessions must submit their form to the Senior Administrative Assistant. **Talking to the Course Director (D1-D4) or Course Director/Vice Dean, Clinical Education, Operations and Community Partnerships (D3 & D4) or any other MOSDOH faculty or staff member in person is not a substitute for an email notification.** If a student fails to email the Director, Student Success and Course Director (D1 & D2) or the Course Director and Senior Administrative Assistant within this timeframe, the absence will be unexcused. Course Directors and/or the Vice Dean, Clinical Education, Operations and Community Partnerships (D3 & D4) are responsible for notifying the Instructor of the student's absence and working with the instructor to determine arrangements for*

missed work. Students with an excused absence from an assessment activity are required to take the missed assessment within 2 to 3 days following the excused absence or per prior arrangements with the Course Director. Students who do not follow this protocol will not receive credit for the assessment. Disagreements between a student and a Course Director and/or Instructor regarding the resolution of an excused absence must be submitted in writing to the Vice Dean, Academic Affairs/Vice Dean, Clinical Education, Operations and Community Partnerships.

For D3 & D4 students, if the excused absence request involves a date of a scheduled assessment quizzes, examinations, clinical examinations etc., the student must also obtain a second signature from the Vice Dean, Clinical Education, Operations and Community Partnerships. If the excused absence involves an external rotation, the student must first obtain a signature from the Director, DIC/ICSP and then submit the signed form to the Senior Administrative Assistant (D4) for review. If a student requests off during an internal rotation day, it is the student's responsibility to find a replacement. The student must email, the Senior Administrative Assistant (D3 & D4) who helps manage the rotation schedule and the replacement student. The excused absence request form is then submitted to the Senior Administrative Assistant (D3 & D4) for schedule ***changes.***
Upon final approval, faculty and students are expected to make reasonable accommodations for make-up of any missed exams, assignments, or learning activities. If the reason for an excused absence is such that it appears the student may need additional support (e.g., financial, emotional, learning), the student may also be referred to the office of Student Affairs

d. Regional licensure exam
   i. What exam(s) does your school host? *WREB*
   ii. What's the general consensus towards the benefits of the exam?
   iii. What's the general consensus on the elimination of the exam?
   iv. What are the alternatives? *Licensure by residency.*

e. Discuss opinions on realigning the CODE regions.
   i. Are there schools you feel should be in your region that are not?

<u>Discuss and describe suggestions for improving CODE.</u>

<u>2019 National Agenda: UMKC</u>

1. Curriculum
   a. Incorporating more faculty training and encouragement to use case-based questions in similar format to INBDE. Additionally, there have been faculty development workshops on developing questions.
      i. UMKC has also been working on integrating curriculum (biomaterials spread among several classes rather than being its own class, biochemistry is now "applied biochemistry" and has clinical concepts (such as cariology) in the course.
   b. Remediate exam: none for lecture, can remediate practical two times- go down a letter grade each time, no penalty for remediating a clinical procedure- just have to make it right. One opportunity to remediate courses- didactic and clinical. There is an opportunity to give a student no credit in clinic (so if faculty ended up doing majority of the work, student wouldn't get time units.)
   c. Faculty is assigned a lab bench that they primarily work with throughout the semester. Bench assignments are changed each semester. In some courses, faculty rotates which section they grade. In other courses, faculty grade their own bench.

d. UMKC is having difficulty getting enough patients to our clinic
    i. n/a
    ii. While most students get their requirements completed with little-no problem, there is difficulty attracting patients who need and can afford RPDs, scaling and root planing, esthetic cases, as well as pediatric patients.
e. This is getting more difficult.
    i. RPD, SRP, pediatric patients. Not much of an issue with operative procedures.
f. A faculty is assigned to screen am and pm most days of the week. They briefly review the patient's cc and med hx and assign their needs based on that (radiographs are usually taken after the screening). A clerk assigns the patients to a student based on student needs requested.
g. There are many things being considered, but not yet implemented at this time.
h. Not at this time
    i. n/a
    ii. the local and state organizations are strongly opposed
    iii. If the local and state organizations agreed to it, UMKC most likely would provide this program

II. Cariology

a. Initial, moderate, advanced (just changed these in axiom to reflect ADA's caries classifications)
b. Various lunch and learns/morning messages/department meetings
c. Integrated into several courses (Operative I and II, biochemistry, intro to patient care, possibly others)

III. Materials and Techniques

a. Reduce occlusion, recommend crown/onlay
b. For the following:
    i. Class V- composite or compomer (geristore) or GI (equia forte) depending on location and extent
    ii. Sandwich technique- taught didactically and clinically depending on faculty (not practiced in lab)
    iii. Briefly covered in lecture, not encouraged as bulk fill (possibly as liner)
    iv. RMGI- as liner (vitrebond), as "heroic" dentistry option with extensive restorations.
    v. Amalgam
        1. 25%
        2. Not bonding- do not teach that at UMKC, we do teach pins (though not a requirement)
c. Yes
    a. We still use gold for full coverage crowns, but very rarely for onlay/inlays
d. Predoc students are required to perform at least one molar endo procedure- it must be a first molar
    a. Advanced does all second molars and "difficult" cases
e. N/a
f. We do use electric handpieces (Bien Air) in lab and clinic. We still have pneumatic high speeds, but are phasing out slow speeds to only use electric

IV. Student Assessment

a. UMKC has an international dental program
    i. Bench test?
    ii. Last summer- 3 students, 2 progressed
b. Yes- summer of D4 is comprehensive, there is also an ortho OSCE and implant OSCE
c. Didactic testing
    i. Examsoft primarily
    ii. Pros- get statistics easily, Cons- Learning curve to use properly
    iii. Not at this time

V. Administration

a. Attendance is required, but enforced by individual course directors differently

(Syllabus) ATTENDANCE POLICY: Students are expected to be present for each lecture period. Refer to official UMKC attendance policy in Student Handbook.

- (UMKC Student Handbook) Students are expected to attend and participate in classes.
- In order to comply with federal regulations associated with eligibility rules for federal financial aid, students not attending a course during the first three weeks of the term will be administratively dropped from the specific course.
- Advance notice of attendance policies of academic units and individual instructors should be given, and such notice should be in writing.
- Students should notify instructors of excused absences in advance, where possible.
- Students who have an excused absence are expected to make arrangements with instructors for alternative or make-up work. Such arrangements should be made in advance of the absence, where possible.
- Instructors should accommodate excused absences to the extent that an accommodation can be made that does not unreasonably interfere with the learning objectives of the course or unduly burden the instructor.
- Attendance policies shall be applied in a non-discriminatory manner.
- Enrollment as a student is required to attend any class unless otherwise pre-approved by the instructor.
- Instructors are responsible for verifying the class roster in Pathway throughout the term.

Each academic unit and instructor may adopt an attendance policy appropriate to that unit, a particular field of study, or for a specific course. Such policy or policies must be consistent with the general principles, and must give students advance notice in writing. In the case of an academic unit, notice may be given in the appropriate section of the General Catalog, or in other materials provided to students for the purpose of informing them of the rules and regulations of the academic unit. In the case of an individual instructor, notice of an attendance policy should be given in the course syllabus.

If neither the academic unit nor the instructor has adopted an attendance policy, or if proper advance notice of the attendance policy was not given, the UMKC general attendance policy will govern. The general attendance policy is that students shall not be penalized for excused absences. "Excused absences" include absences due to illness of the student, illness of an immediate family member for whom the student must care, death of an immediate family member, religious observance (where the nature of the observance prevents the student from being present during class), representation of UMKC in an official capacity, and other compelling circumstances beyond the student's control. Students seeking an excused absence must provide documentation upon request to substantiate the excuse. Students with excused absences shall undertake appropriate make-up or alternative work to be provided by instructors of the courses in which excused absences were incurred.

Complaints concerning the application of an attendance policy or an instructor's attendance policy should be raised with the Department Chair of the instructor or with the Dean if there is no Department Chair or the instructor is the Department Chair. If the student or instructor is not satisfied with the resolution of the complaint, the matter may be appealed to the Dean and to the Division of Academic Affairs. Complaints concerning the adoption or modification of an attendance policy by an academic unit should be raised with the Division of Academic Affairs. Complaints are to be promptly addressed at each level of review.

This policy was approved July, 2002 and effective Fall, 2002; Revised Fall 2012; Revised Fall 2016

b. Dependant on course director- should be addressed with them first

c. Dependant on course director- more strictly enforced with labs, will occasionally take attendance with tophat

d. Regional licensure

i. WREB

ii. generally think patient based exams don't tell you much about a student (excellent clinicians have failed, not excellent clinicians have passed)

iii in favor of eliminating patient- based licensure exams

iv OSCE (one faculty is on ADA committee for this), portfolio (UMKC has an extensive portfolio system in place.

e I think our region is excellent, though it's mostly personal. It is interesting that the other Illinois schools are not in our region but SIU is.

f CODE is an excellent meeting- one of the most educational and fun meetings I attend. It has a lot of real world feedback and solutions and the other faculty members are extremely generous. I guess it would be nice if it weren't on Thursday because UMKC has operative lab on Thursday afternoons!

2019 National Agenda: University of Nebraska Medical Center
I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

Ours is not changing at this time. We want to see how the integrated board works to see if changes are needed.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

Generally there are no second attempts for exams. However this would be up to the course director.

I'm not how to respond to remediating a clinical procedure. Each procedure has to end in a clinically acceptable result.

Course remediation is up to the course director. In some cases the course is too big to remediate, so the student must retake the course the next year. If there is to be remediation, the course director will design a remediation based on the student's needs.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Generally yes. In my Operative I course we rotate 4 times during the semester. Other preclinical courses may rotate more frequently. In dental materials this semester we only have 2 faculty so we float during the laboratory sessions.

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Not in general. Students would like more patients, but have a sufficient supply to complete requirements.

i. If not, what do you contribute your success to?

We have done some TV ads and were sponsor for "Moms Every Day" on a local TV station. We have had stories about some of our outreach projects on local TV, which gives us some free exposure. We also depend on word of mouth and referrals from local offices.

ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Generally. There is some sharing of patients, but we try to keep it to a minimum.

i. What types of experiences are the most difficult to find in your patient pool?

Pediatric in the Lincoln facility and endodontic therapy. Our students rotate through the pediatric graduate clinic in Omaha and do get experience there. The endodontic faculty take students to Bluestem Health which a facility

f. Describe your screening/patient admissions process?

First the appointment clerks determine if the patient is in pain. If so the patient is appointed for a focused exam to determine what can be done to eliminate the pain.

If the patient is not in pain the person is appointed for a comprehensive exam. The student, under the supervision of the Group Leader, will take a full mouth series of radiographs and possibly a panoramic radiograph, complete a medical history, note existing conditions and

restorations, do periodontal probing and complete an intraoral and extraoral hard and soft tissue exam.

The Group Leader at any time may reject patient if the patient is too complicated or compromised for an undergraduate student.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

Not at this time.

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

No. We have just introduced expanded duties for hygienists and dental assistants. At this time the board is still reviewing the situation and determining what education will be needed.

i. If your state MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?

No.

iii. Would your institution be willing to provide this instruction?

Yes our college become involved if MLPs were developed in Nebraska.

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

In the cariology course, caries is classified as E-1 (just into enamel), E-2 (to the DEJ), D-1 (just into dentin), D-2 (half way to the pulp), and D-3 (approaching the pulp).

b. How does your school calibrate its faculty for caries diagnosis?

Annual session with our department including part-time faculty. Pictures and radiographs of carious lesions are viewed by the full-time faculty to reach a consensus. These are then viewed and scored by all faculty at the annual session and compared to the consensus.

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

There is a separate didactic course (ARD 556) 1 credit D-2 year. Bulletin listing of the course: "This course combines lecture/seminar online, CD-ROM, and laboratory aspects that present dental caries as an infectious and controllable disease. The relationship between basic science and clinical application will be a central focus in preparing the student to be able to develop patient-specific strategies for the management of dental caries."

Clinically the D-2 students need to do a caries and diet evaluation and treatment plan for two patients. D-4 year they need to complete one case that is graded as a competency.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

Officially we do not recommend them, but we do a MODB composite in Operative I and there is at least one cusp replacement project in Operative II.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

If enamel margins are present or in some cases esthetic demands.

Material: we are switching to Mosaic

ii. Sandwich technique?

Yes we use the sandwich technique. We will use that technique in Class II proximal boxes if the gingival margin has little or no enamel. It may also be used in anterior restorations that have a subgingival margin where a composite would not create a long term bond.

In some rare cases where it is difficult to place a matrix band due to a very deep gingival margin, we have placed a couple mm of glass ionomer to create an "artificial root" to facilitate the placement of a matrix. We have restored these with either composite resin or amalgam.

Material: Fuji 2 LC or Fuji 9

iii. Bulk fill technique?

Do not use.

iv. Resin Modified Glass Ionomers (RMGI)?

Material: Fuji 2 LC.

v. Amalgam?

1. % of direct restorations?

About 20%

2. Bonded or unbonded?

Most are unbonded, occasionally we will bond one.

vi. Air abrasion?

No.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Yes, but the majority of our full or partial coverage units are done in a commercial lab.

i. Has it replaced gold in your clinic?

No, but Zirconia has.

d. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

Pre-doc complete 10% of the cases and Graduate Residents 90%.

Faculty only supervise the students.

e. Do you utilize bond strength testing exercises?

No.

i. Who supervises?

NA

f. Do you use electric handpieces in the simulation laboratory? In the clinic?

We will have them available in our new preclinical lab which opens in a few weeks.

i. If no, why not?

ii. If Yes, what system?

I'm not sure if the decision has been made. We are evaluating several brands.

IV. Student Assessment

a. Does your institution have an international dental program?

We are starting one that will begin next fall. There will be an 8 week "boot camp" this spring for the incoming international students. Following completion of that, they will enter the clinical and didactic courses as D-3 students.

i. If yes, does your school utilize a bench test? Please describe.

Yes, the prospective students will have to do a MOD preparation and restoration and a zirconia prep for a complete crown.

ii. If yes, how many students are enrolled?

4 this year, 6 after that.

b. Do you evaluate students using OSCE's?

No.

c. Describe your primary didactic testing methodology

True/false, multiple choice, fill-in the blank, short answer

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ExamSoft

ii. Pros/cons to the one you are primarily using?

Ease and accuracy of grading, useful reports of the students' results and useful analysis of test questions. It has the ability to scramble the order of questions and the answers within each question. We have had very few problems with the software.

iii. Are you investigating other methods?

Not at this time.

1. If yes, which one(s)?

V. Administration

a. What is your policy on attendance?

For my courses:

Attendance is mandatory for all sessions. Should a student present an **excused** absence (e.g. a note from a physician stating illness) **which has been cleared through the Associate Dean for Education's office**, it will be the student's responsibility to make up the assigned work. Instances of prolonged excused absence will be reviewed on a case-by-case basis, and at the discretion of the course director, course repetition may be required. For laboratory sessions, each unexcused absence constitutes a failure for the missed session, and the student still must complete each missed laboratory assignment in order to pass the course. All laboratory makeups will occur during regularly scheduled laboratory sessions only, and a laboratory report is still required.

In order to successfully complete ARD 531 with a passing grade, it is necessary to pass **both** laboratory and lecture portions of the course. In order to pass the laboratory portion, the student must be present, complete all assignments with an overall passing grade (a minimum score of 60%) and submit all laboratory reports by the assigned due date. If all reports are not received by the final due date (December 2, 2019), the student will fail the course and be required to repeat it when it is next offered.

Absences from examinations generally are not allowed, but if the student can document an unavoidable absence (pre-approved by the course director), a make-up exam will be given. The make-up exam will be different from the regular exam, and will consist of **both oral and written** components.

There are **no** make-ups for missed quizzes, and a score of zero will be assigned.

i. Please provide the actual attendance policy statement.

No student may be admitted later than 10 days after the opening of an academic session except by special permission of the Dean.

No credit is granted to any student for matriculation or attendance where such attendance is less than one semester in duration. Moreover, each student must remain in continual attendance during each semester for which credit is sought. If, for any reason, a student leaves the program and subsequently returns to the University, the student must satisfy all requirements for graduation as exists at the time of the continuation of his/her studies.

Attendance at all regularly scheduled classes is expected and attendance at scheduled clinical sessions is required. Attendance in class and clinic will be monitored. Each course director determines the method of monitoring attendance for his/her course. Failure to attend class or clinic could result in failure of a course.

Planned absences should be worked out in consultation with course directors, appropriate clinical staff and patients as necessary.

For situations involving unplanned absence from class or clinic, appropriate arrangements are made directly by the student with any patients scheduled and the College is to be called at 402-472-1301 to report the absence. The clinic receptionist will notify the registrar's office and the clinical clerks of the absence. Students are responsible for all course requirements regardless of the reason for the absence, so it is important that instructors are informed and that students maintain a clear understanding of what must be done to meet course requirements.

For unusual circumstances, a temporary leave of absence may be recommended by the Academic Affairs Committee or the Associate Dean for Education, who shall determine the granting of such status. Such leave does not excuse a student from meeting all course

requirements. In case of illness, a student will usually need a written statement from the University Health Center or a private physician. Neither absence nor an excuse relieves anyone from meeting all course requirements. Excessive absences may result in a lowered or failing grade in the course.

ii. Who is responsible for tracking attendance?

Course Directors for lab and didactic courses.

Group coordinators for the clinical groups.

iii. How effective is your policy?

Very effective in the clinics. Probably not that effective in didactic courses.

b. What is your policy with student complaints about grades?

As provided by the Bylaws of the Board of Regents of the University of Nebraska, students enrolled in the College of Dentistry have the right to challenge any evaluation of their academic progress or dismissal decision which they feel has been "prejudiced or capricious". The College of Dentistry follows the appeal process as described in the University of Nebraska Medical Center Student Policies Wiki document entitled "Appeals of Academic Evaluations". https://www.unmc.edu/studentservices/_documents/appeals-academic-evaluations.pdf A student may initiate the appeal process by first discussing the matter with the instructor involved. If a satisfactoryagreement cannot be met, the instructor shall inform the student of the appropriate appeal procedures, as defined
in the Student Policies Wiki

Student grade appeals within the College of Dentistry shall fall under the jurisdiction of the committee on Grade Appeals. The University of Nebraska Medical Center College of Dentistry policy regarding student file information is in compliance with provisions of the Buckely Amendment. A full statement of policy is on file in the Registrar's Office and may be examined at any time during business hours…

c. What is your policy on student absences?

Pre-clinical arrangements have to be made through the Dean for Education's office before the absence occurs except for reasons of illness.

Clinically the students are allowed 12 half days per year.

d. Regional licensure exam

i. What exam(s) does your school host?

CRDTS

ii. What's the general consensus towards the benefits of the exam?

iii. What's the general consensus on the elimination of the exam?

We have not had any formal discussions about elimination of boards. I think most would be in favor of going to an all manikin board.

iv. What are the alternatives?

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

f. Discuss and describe suggestions for improving CODE.

Regional Meeting Report Form

Region:
Host University, Address, and Dates of the **2019 Regional Meeting**:

Host University	Address	Dates of Meeting
A.T. Still University **Missouri School of Dentistry** **And Oral Health**	**St. Louis Dental Center** **1500 Park Avenue** **St. Louis, MO 63104**	**September 19-20, 2019**

Consortium of Operative Dentistry Educators (CODE)

Chairperson and Contact Information for the **2019 Regional Meeting**:

Chairperson	University/Address	Phone/email
Brandon Crivello	A.T. Still University **1500 Park Avenue** **St. Louis, MO 63104**	618-977-0592 **brandoncrivello@atsu.edu**

List of Attendees: (Please complete the CODE Regional Meeting Attendees Form on the following page)

Contact Person, Host University, and Dates of the **2020 Regional Meeting**:

Contact Name Phone/email	Host University/Address	Dates of Meeting
Patrick Longo	**Marquette University** School of Dentistry 1801 West Wisconsin Ave. Milwaukee, WI 53233	**September 17-18, 2020**

Consortium of Operative Dentistry Educators (CODE)

Regional Meeting Attendee's Form

Name	University	Phone	email
Christa Hopp	Southern Illinois University	618-799-9358	chopp@siue.edu
Gary Hildebrandt	University of Minnesota	612-625-5130	hilde014@umn.edu
Aditi Jain	University of Iowa	319-610-3240	aditi-jain@uiowa.edu
Asmaa Haimeur	University of Manitoba	204-789-3286	asmaa.haimeur@umanitoba.ca
Scott Shaddy	Creighton University	402-7148-3852	shaddyr@creighton.edu
Bill Johnson	University of Nebraska	402-472-9406	wwjohnson@unmc.edu
Melynda Meredith	University of Missouri Kansas City	816-679-7186	meredithmm@unkc.edu
Karine Barizon	University of Colorado	303-810-8839	Karine.barizon@cuanschutz.edu
Ammar Musawi	A.T. Still University Missouri School of Dentistry and Oral Health	660-216-5330	amusawi@atsu.edu
Brandon Crivello	A.T. Still University Missouri School of Dentistry and Oral Health	618-977-0592	brandoncrivello@atsu.edu

Consortium of Operative Dentistry Educators (CODE)

Suggested Questions for 2020 National Agenda

1. How many hours does each region allow for the discussion of the CODE agenda?
2. What is the format of the meeting?
3. Can the time slot for the national annual CODE meeting be changed from the end of the last day during the Operative meeting to an earlier time?
4. What material do you use for rampant caries treatment, i.e. silver diamine fluoride, GI, etc?
5. What are the failure rates of your composites, i.e. replacement occurring within a 2 year period?
6. What is your protocol for repair versus replacement of a restoration?
7. What are your student to instructor ratios?
8. Do you teach on polymerization shrinkage?
9. What new products are you using and what has been the outcome?
10. Should students be allowed to work on each other?

2019 National Agenda – University of Manitoba

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

N/A

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

Didactic exam: one attempt at end of year if GPA>2

Clinical procedure: Students will have to perform the procedure on dentoform until satisfactory before being allowed to execute the procedure in clinic.

Failed course: no remediation, student has to repeat the year if possible.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Not in preclinical operative dentistry.

d. Are you having difficulties attracting patients to any of your pre-doctoral teaching programs?

i. If not, what do you contribute your success to?

ii. If so, please describe the issues

- Bridges and dentures (partial and complete)
- Issue: finances, time commitment, suitability.

- Actions taken to solve the problem: news paper advertising, request for referral sent to private practices, freeze crown prices, Using Alumni funds to support the need of eligible patients (emergency treatments, specific procedure needed for students requirement).

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

We do have enough patients to supply our students with all the experiences needed to graduate. We also believe that getting students to share patients is also a great teamwork experience and can replicate private practice situation.

i. What types of experiences are the most difficult to find in your patient pool? Bridges, complete dentures, implants

f. Describe your screening/patient admissions process?

In 2018-2019 academic year:

- 2.5 days screening /week (~30 patients/day), August to June
- 2 days Mass screening by faculty: 90 patients/day
- 2 days mass screening by senior students supervised by faculty (60 patients/day)

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? i. If so, please describe?

-This year we are planning to do one mass screening/ month:

- 1 day,
- August to April
- Senior students supervised by faculty

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? No

i. If your state MLP's, who is responsible for the education? Please describe?N/A

ii. Do the students, faculty, and local dental community embrace the concept? N/A

iii. Would your institution be willing to provide this instruction? N/A

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

We teach the new ADA Caries Classification System. It takes into account ICDAS too.

b. How does your school calibrate its faculty for caries diagnosis?

We do calibration once a year for full time and part time faculty but not specific to caries

diagnosis.

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe. Cariology is its own course at the UofM. It is a separate curriculum taught in second year.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

When a cusp is missing, patient is advised that a full coverage is needed in the near future and that cusp replacement by composite is not considered a definitive restoration.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc...

i. Class V composite resin?

Indications: class V in esthetic areas,

Material used: TPH spectra LV, Esthet X hd or Filtek Supreme Ultra

ii. Sandwich technique?

Open sandwich (class V or class II in cementum)

Fuji II LC and composite cited in i.

iii. Bulk fill technique? Not taught

iv. Resin Modified Glass Ionomers (RMGI)?

Indications: Class V, endo access, temporary restoration, indirect pulp capping.

Material: Fuji II, LC

v. Amalgam?

1. % of direct restorations? 50%

2. Bonded or unbonded? Bonded when pinned amalgam only

vi. Air abrasion? Not used

c. Are you doing more milled partial coverage as a result of the scanning and milling capability? N/A

i. Has it replaced gold in your clinic? n/a

d. Who performs molar endo?

i. Pre-doc students 100%, Endo Residents %: N/A, Endo Faculty %: N/A

e. Do you utilize bond strength testing exercises? N/A

i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? In the clinic? No.

i. If no, why not? Cost and weight

ii. If Yes, what system?

IV. Student Assessment

a. Does your institution have an international dental program?

i. If yes, does your school utilize a bench test?

Yes. 2 days manikin: amalgam, composite prep and resto, endo access, and crown prep/provisional.

ii. If yes, how many students are enrolled? 6-7

b. Do you evaluate students using OSCE's? Yes.

- Operative D1 and D2: (1) preparation, restoration evaluation, (2) material placement (RD, matrix), (3) instruments identification
- Fixed and partial denture
- D4 (mock OSCE to prepare for licensure OSCE): multidisciplinary cases

All multiple choice questions using bubble sheets.

c. Describe your primary didactic testing methodology

i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other...) : pen/paper-hand graded, ScanTron sheets, digital assessment program using D2L (some courses)

ii. Pros/cons to the one you are primarily using?

Pros: no learning curve for faculty, cost, not dependable on technology,

Cons: Time consuming, hard-to-read handwriting,

iii. Are you investigating other methods? No.

1. If yes, which one(s)?

V. Administration

a. What is your policy on attendance?

Please provide the actual attendance policy statement. **Attendance:**

Consistent with the College Policy on Student Attendance, students are required to attend all scheduled educational experiences (classes, labs, and clinics), and can be disbarred from the course and examinations should attendance fall below 85%. In this course, academic penalties will be applied if attendance drops below 95% of scheduled classes/labs/clinics, as detailed below:

Note: select the appropriate table below to match the number of course Credit Hours. Delete this note and the remaining tables.

Consortium of Operative Dentistry Educators (CODE)

Attendance Description One Credit Hour Course	# missed class/lab/clinic sessions	Academic Penalty
Attendance meets expectations (>95% attendance)	2 or fewer missed classes/labs/clinics	No penalty
Attendance below expectations (>85% but <95%)	3 missed classes/labs/clinics	4% penalty
	4 missed classes/labs/clinics	10% penalty
Unacceptable attendance <85% attendance	≥5 missed classes/labs/clinics	Warning - disbarment possible

Attendance Description Two Credit Hour Course	# missed class/lab/clinic sessions	Academic Penalty
Attendance meets expectations (>95% attendance)	2 or fewer missed classes/labs/clinics	No penalty
Attendance below expectations (>85% but <95%)	3 missed classes/labs/clinics	1% penalty
	4 missed classes/labs/clinics	3% penalty
	5 missed classes/labs/clinics	6% penalty
	6 missed classes/labs/clinics	10% penalty
Unacceptable attendance <85% attendance	≥7 missed classes/labs/clinics	Warning - disbarment possible

Attendance Description Three Credit Hour Course	# missed class/lab/clinic sessions	Academic Penalty
Attendance meets expectations (>95% attendance)	3 or fewer missed classes/labs/clinics	No penalty
Attendance below expectations (>85% but <95%)	4 missed classes/labs/clinics	1% penalty
	5 missed classes/labs/clinics	3% penalty
	6 missed classes/labs/clinics	6% penalty
	7 missed classes/labs/clinics	10% penalty
Unacceptable attendance <85% attendance	≥8 missed classes/labs/clinics	Warning - disbarment possible

Attendance Description Four or Five Credit Hour Course	# missed class/lab/clinic sessions	Academic Penalty
Attendance meets expectations (>95% attendance)	5 or fewer missed classes/labs/clinics	No penalty
Attendance below expectations (>85% but <95%)	6 missed classes/labs/clinics	1% penalty
	7 missed classes/labs/clinics	3% penalty
	8 missed classes/labs/clinics	6% penalty
	9 missed classes/labs/clinics	10% penalty
Unacceptable attendance <85% attendance	≥10 missed classes/labs/clinics	Warning - disbarment possible

Attendance Description Ten Credit Hour Course	# missed class/lab/clinic sessions	Academic Penalty
Attendance meets expectations (>95% attendance)	9 or fewer missed classes/labs/clinics	No penalty
Attendance below expectations (>85% but <95%)	10-20 missed classes/labs/clinics	0.5% penalty each additional miss
	21 missed classes/labs/clinics	10% penalty
Unacceptable attendance <85% attendance	≥22 missed classes/labs/clinics	Warning - disbarment possible

Students are expected to write examinations on the scheduled dates. Students with unexcused examination absences will be given a mark of zero ('0') for the exam. To obtain a deferral for an examination, students must:

a) give notice of the absence prior to the start of the examination; and,
b) submit acceptable documentation (i.e., physician's certificate) of the illness.

ii. Who is responsible for tracking attendance? Course director, clinic team leader.

iii. How effective is your policy? Very effective. We have a strong correlation between attendance and grades.

b. What is your policy with student complaints about grades? Complain handling procedure flowchart : instructor/course director => department head=> associate dean=> appeal committee

c. What is your policy on student absences?

Refer to attendance policy question a)

d. Regional licensure exam

i. What exam(s) does your school host? We rent our space for Licensure exam for our graduating students (Writing and OSCE).

ii. What's the general consensus towards the benefits of the exam? N/A iii. What's the general consensus on the elimination of the exam? N/A iv. What are the alternatives? N/A

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?
Discuss and describe suggestions for improving CODE.

Regional Nominee for Presenting at the 2020 CODE Annual Meeting which in conjunction with the Academy of Operative Dentistry's Annual Meeting (Please Include Topic)

Name	Topic	Contact Info
none		

Consortium of Operative Dentistry Educators (CODE)

Please return all completed enclosures to:

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director

Senior Associate Dean for Academic Affairs
Oregon Health & Science University
School of Dentistry
2730 SW Moody Ave
Portland, OR 97201

staffoga@ohsu.edu

Deadline for return: 30 days post-meeting

Please send the requested documents via email with attachments

2019 National Agenda

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

LSUSD

A faculty member has been on the ADEA/ADA OSCE/INBDE task force and has provided information regarding the OSCE clinical based testing format. We have had 2 "trial" OSCE's at the end of the D3 year. All clinical disciplines provided 3 OSCE based questions/clinical scenarios.

University of Mississippi

The curriculum committee has instituted a new item to their course curriculum review in which they assess that a minimum of 10% of the assessments in each course be presented/tested in the INDBE format (patient box scenarios). So, this year each course is required to present 10% for their test questions in INBDE format.
A Comprehensive General Dentistry Assessment (CGDA) has been implemented for each of the four years. The purpose of these assessments is to keep information the students have learned in front of them so they can learn to apply and retain this information. This is due to the fact that the INBDE is going to be taken later in the students' academic career so we wanted to find ways to encourage the students to hold on to important concepts/information. The idea is to create more global assessments which will better reflect what the students might see in the INBDE and clinical practice.

CGDA 1 (taken at the end of the first year) – this is a multiple-choice assessment, formatted in the INBDE style. Content will include information from all first-year courses.

CGDA 2 (taken at the end of the second year) – this will be an oral assessment of a patient case and an OSCE assessing clinical decision making. Content will include information from all previous courses held in the first and second years.

CGDA 3 (taken at the end of the third year) – this will be an OSCE built around patient cases assessing clinical judgement of the student. The idea of this exam is to bring all aspects and course materials the students have learned into patient scenarios.

CGDA 4 (taken during the fourth year) – this will include a treatment planning assessment and an oral examination of a case the students have themselves treated during their clinical years.

The Curriculum Committee is also encouraging faculty to look for ways to have active learning exercises in their courses to help the students retain course information and show its relevance and its importance in dental practice.

The school created a new position and hired an instructional designer to help faculty develop active learning in their courses.

University of Oklahoma

There have not been any changes made related to the new exam at this time. The curriculum is currently going through a review process, and that will be taken into consideration during that process.

University of Tennessee

We have increased time allotted to Biomedical Clinical Conference Courses which run concurrently with clinical and basic Science courses. This course attempts to integrate basic and clinical sciences. We changed these courses to graded courses with Exams. Exams are to be care-based and questions are to integrate both basic and clinical sciences.
The Exam Committee has passed a mandate that 10% of all course exam questions be case-based. Even a higher percentage is encouraged.
At least one discipline has gone to a case-based method of teaching. Others are encouraged.
There is a strong push for Faculty Development in the areas of Teaching and Learning beyond the "Sage on the Stage" teaching and learning formats.
The Exam Committee is currently deliberating about the development of a Mock Integrated Board Exam that must be passed prior to allowing our students to sit for the real integrated National Board.

UT Health Houston

Currently, the curriculum is integrated across the first year of the curriculum within the Basic Science courses, such that the traditional biochemistry, microbiology, physiology, anatomy, etc. courses have been integrated into two primary courses: Oral Biology and Human Biology. At the same time a new course was created, Clinical Applications, that takes the material being taught in the two previously mentioned courses and reinforces that material in a small group, clinically relevant, problem based format.
Going forward, the goal is to continue the integration effort by reinforcing the basic science material in traditional clinical science courses. This will be through using basic science correlates that reinforce a basic science principal as it relates to the clinical material being taught. Also, the thought is to create Clinical Application courses in the second and third year. We will start using the INBDE testing format of the Patient Box style questions in our courses so that students become familiar with this style of testing.

Grand Round style sessions will be held with our D3/D4 students that will include expectations of students having an understanding of underlying biological principals that relate to the care of their patient. Also, an understanding of the biomedical science principals that relate to the patient will be a part of the daily grade in clinic.

UT Health San Antonio

The curriculum that has been in place at the school for the last three years has combined basic science courses together in an attempt to integrate course materials and to make them relevant to the clinic practice. Questions are more case-based than in previous years.

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

LSUSD

This is a Course Director decision for exams, and clinical procedures. A student can receive a passing grade, an "I", or "F". If a student receives an "I", he or she has to complete the course per the course outline before a date set by the LSUHSC registrar. There is no remediation of a course if a student receives a "F" …only an appeal to the Dean and Academic Performance Committee.

University of Mississippi

Dr. Kirk – Examinations: Didactic examinations are offered typically on ExamSoft one time. Each syllabus states the policy for the course. Most of the courses do not allow for a didactic remediation within the course however, cumulative grades may offset a failing grade at the end.

A clinical procedure: In operative division once the student declares a competency, it must be taken. If the student fails, he or she may retake the competency at another date. The highest grade on retake is 70. Students must successfully pass all 4 operative competencies to pass the operative dentistry clinical course.

Course: Once the SEPC (Student Evaluations and Promotions Committee) meets and evaluates the status of each student that had one or more course failures, it is recommended either to remediate by a certain date, or if there are multiple courses in which improvement is needed, it may be that the student repeats the year. The ultimate decision is made by the dean and then course coordinators follow through with the plan.

Dr. Rubel – In DENT 616 3A & 3B (Indirect gold and zirconia restorations: crowns, inlays, onlays)

5 Preparation exams and provisionals are given (50% of LAB grade). If a student fails an exam there is a make-up exam within the course for each exam that on a second attempt, if passed (with a 70 or above), will result in a grade of not more than 70 (passing). In the case of failing the final LAB practical exam, a make-up exam is given

within the course; if passed (with a 70 or above), accounts for a grade of 70 (50% of LAB grade).
Three lecture (LEC) exams are given, equally weighted, and averaged throughout the course requiring a combined average pass of 70 or above.

In DENT 618 3A & 3B (Removable Partial Denture Prosthodontics): Lecture (LEC) grade is based on the average of 10 – 12 pop quizzes requiring a grade average of 70 or above to be averaged with the final exam grade which must be 70 or above. Note: If a student misses a quiz it counts as a zero averaged into the overall quiz grade. LAB preparatory exercises must receive a pass for each of the projects in order to pass the LAB part of the course. They can redo any project until they get an acceptable pass grade within the timeframe parameters given within the course. In addition to the projects, students must pass with a 70 or above: 1) A Design practical examination and 2) A Rest Preparation Practical in which four rest seat preparations must be successfully done with a grade of 70 or above for each preparation to pass the entirety (based on preparation rubrics) in order to be averaged together for a final LAB grade.

Note: If a student misses any exam due to illness, attending school related events as described in the student handbook, make-up exam(s), project due dates, etc. are accommodated with the course(s).

Drs. Lott & Boteler – In my courses the students only have one attempt at each examination. Clinical procedures would be broken down into two groups. Clinical exercise and Practical. For the Clinical exercises the students are allowed to do as many attempts as needed to successfully complete the assignment. For practicals the students only get one attempt. As far as the course goes, if the student is unsuccessful in passing a course they are reported to our Student Evaluation and Promotions Committee who looks at the student's overall performance of that semester, and academic past and makes a recommendation to the Dean. I do not know of a student being able to remediate a course more than once.

Dr. Magee – The policy is not clear to me.

<u>University of Oklahoma</u>
This depends on the course and the course director.
Our first operative preclinic course (Spring of first year) has six skills exams. The grade from their initial attempt is their recorded grade for that exam. However, we require all students to remediate the failing grade for that exam prior to the date for the next skills exam.
Our second preclinical course (Summer/Fall of second year) does not allow on-going remediation during the course. If the student receives a D or F, the course director can suggest remediation of failed grade if it is considered feasible in regard to the amount of material needed to remediate and the time available to remediate.

Our DS3 clinic course requires students to remediate failed clinical skills exams during the year long course.

University of Tennessee

Course Remediation: Any student doctor with a final grade of "F" will be required to remediate the course. Specific course, remediation requirements, will be at the discretion of the course director, but could include the following written essay/long answer, and comprehensive final examination. The remediated final grade can be no higher than a "D".

UT Health Houston

Exams: Depends on the course/syllabus

Clinical Procedure: the student is required to remediate until they can demonstrate the ability to perform at a competent level. Only at that point are they allowed to attempt the clinical competency again on the patient.

For students who fail a clinical competency, the *type* of remediation that is completed is determined by the attending faculty that worked with the student in conjunction with the course director and/or the director of clinical education. If a student failed the competency because they were not prepared, were not able to troubleshoot when a problem arose, etc.- the remediation may consist of extensive discussion with the student with different scenarios presented etc. Once it's evident the student understands where he/she fell short, the faculty will then allow them to attempt the competency again.

If the student failed because of a **critical error** (defined in all clinical course syllabi)- then they are taken out of clinic, required to complete pre-determined manikin based exercises prior to treating a patient again. Once the student has successfully completed the manikin exercises, then the student may attempt treatment (not the clinical competency) on a patient again. Once that has been successfully completed, then the student may attempt the clinical competency on the patient.

Course: Depends on the E&P and/or Appeals Committee recommendations, may have to repeat the year.

UT Health San Antonio

We have established a "remediate in place" strategy that takes into account that students do not advance at the same rate. We have 2 Skill Assessments (SA) in the DS1 year and 6 more in the DS2 year of our operative dentistry modules. Students who fail a SA are offered tutoring by advanced students. The tutors are paid from a grant made to the school. Students who score less than 2.5 are required to repeat the SA with a passing score. The score on the second SA will be averaged with the failing score and students must achieve an average of 2.5 to pass the laboratory module. Students may repeat as many as 3 SAs. Students who have failed 4 SAs will

receive a failing grade in the module and are referred to the Academic Performance Committee. Students who fail more than three are treated on a case-by-case basis based on demonstrated improvement over time. Under the new system we have not had to remediate a student who failed one module of the course.

Students who fail a clinical examination (DS3s) must remediate before they challenge another examination.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

LSUSD
Yes

University of Mississippi
Within the preclinical courses faculty engage students during lecture and laboratory sessions with respect to the different topic areas discussed and with respect to the different projects undertaken according to specific dates, meeting times, and hours spent on each area. Self-assessments, grading and feedback with respect to critical thinking are given at each session as designated in the syllabi.

University of Oklahoma
Yes, we have always rotated the faculty. We try to make the change at break where a new skill or procedure is being introduced. We attempt to have every instructor work with all of the students during the course.

University of Tennessee
Yes, every 2 weeks.

UT Health Houston
Rotate by project.

UT Health San Antonio
We normally rotate after each Skill Assessment.

d. Are you having difficulty attracting new patients to any of your pre-doctoral teaching programs?

i. If not, what do you contribute your success to?

ii. If so, please describe the issues.

LSUSD

YES!!! Especially Pediatric Dentistry patients.
Simply a lack of quality patients who have the time and funds to complete treatment, or, patients who are too complex for undergraduate care. There are patients who also do not want comprehensive care treatment and are dismissed because of appointment failures.

University of Mississippi

Yes
Student fees/cost of care for Phase II (esthetics, crown/bridge, periodontal procedures)
Lack of advertising
Availability of students for dental screening
Patient perceptions of speed/efficiency of receiving dental care in an education (student) program.

University of Oklahoma

Yes.
It has become more difficult to supply appropriate patients for the various levels of student experience, and for certain specific procedures. Examples are: simple operative cases for second year students; simple crown procedures for beginning third year students; and acceptable endodontic cases for third and fourth year students. Our Pedo division also complains that they are having trouble finding enough patients for their clinical courses.

University of Tennessee

Our patient population, in general, is of a lower socio-economic group than some schools. Even though our fees are 33-50% lower than private practice, many of our patients still have difficulty paying for services. Our recent fee increases (especially extractions) have further decreased the ability of patients to have treatment completed, or in many cases, even started.

UT Health Houston

Specific types of patients, yes.
Implants
Crowns
Dentures
Perio

Plus, some problems with financial arrangements
There is a huge patient base available.
The problem is finding appropriate cases in the discipline needed.

UT Health San Antonio

We have plenty of patients requesting screening appointments, but students complain that they have trouble attracting the "right kind of patients" that need, and can pay for, treatment that matches their need for experience. They feel that it is left up to them to find patients.

The electronic website for screening applications has received over 80,000 requests and continues to draw about 7,000 patients per year. We have earned strong community support as a source of affordable quality dentistry.

Many patients who are appointed for screening will report tooth ache pain. This frustrates the students, faculty, and patients.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

i. What types of experiences are the most difficult to find in your patient pool?

LSUSD

For the most part
Pedo, Endo, certain Perio classifications

University of Mississippi

Full coronal coverage, periodontal scale/root planning comprehensive care (both invasive care and mandatory follow-up), endodontics.

University of Oklahoma

No. Prior to converting to our recent Vertical Team clinical group practice model, we did not allow sharing of patients accept for a very few specific situations. The Vertical Team system is based on the premise that the team of students will share their assigned patients between the students in the team, based on the student's abilities and needs for certain types of clinical experiences.

Examples are: simple operative cases for second year students; simple crown procedures for beginning third year students; and acceptable endodontic cases for third and fourth year students. Our Pedo division also complains that they are having trouble finding enough patients for their clinical courses.

University of Tennessee

For the most part. There are always students who are literally "unlucky: with having the patients who need specific treatment to satisfy the needed experiences for graduation. Most students are very good about helping their fellow classmates by sharing a few patients for some specific needs but generally students are able to provide patients with comprehensive care on their own.

Class III lesions and complete over complete dentures are the most difficulty. We have very few patients come through screening who are already edentulous. 90+ percent of them have existing teeth and the fee for the extractions often exceed the fee for the denture.

UT Health Houston

Students tend to share.
Endo
Perio
Prosthodontics (Implants, Crowns – due to cost)

UT Health San Antonio

We have had some trouble in the past with sharing of patients who qualify for operative skill assessment cases. We have discouraged sharing of patients and have established a few rules to prevent patient abuse including the rule that SA patient who operator has received a failing grade may not be shared with another student.

Finding full denture patients is particularly challenging and students feel that some groups have more than enough patients and some groups have none. The treatment coordinators get a big share of the credit or blame. Removable or Fixed Partial Denture patients are hard to find due to the patient preference for implants.

f. Describe your screening/patient admissions progress?

LSUSD

From our website: In the LSUSD predoctoral student clinics, dental students provide the care under the supervision of LSUSD faculty. Dental care is not provided free of charge, but fees in student clinics are significantly reduced from the cost of private dental care.

To become a patient at the LSUSD student clinic, please call (504) 619-8770 or (504) 619-8700 Monday through Friday (8:00 a.m. to 4:30 p.m.) to schedule a screening appointment. The dental school offers handicap accessibility and parking.

First Appointment:
At your first appointment, you will view a brief presentation outlining the rules and regulations for new patients. Your first appointment then consists of an oral health assessment which includes an oral exam and possibly x-rays. An LSUSD faculty member will then review your patient record to determine if students are able to provide the oral health care required and/or if the treatment offers students the appropriate learning opportunities. Please remember that because the School of Dentistry's primary mission is education, you may not be an appropriate candidate for care at the dental school.

If you are accepted into the program, the fee for the initial appointment is $125.00, which will be applied to future visits. You can pay the fee by case, personal check, VISA, MasterCard, or Discover. No dental treatment is provided during this examination.

The following information is required on the first appointment:

- physician's name, phone number and address;
- social Security number
- list of any medications the patient is taking

Following Appointments:
Patient assignments are based on dental students' educational requirements. Students are limited in the number of patients that they may treat; therefore, it is not always possible to advise patients how soon treatment will begin. After assignment, appointments are scheduled directly with the student dentist.

As faculty members supervise and evaluate the oral health care provided by the students, services will take longer than in a private dental office. However, while actual treatment time may take longer, fees are significantly less than those in private practice.

Appointments last three to four hours, and patients must be available for treatment at least twice a month.

If this schedule is difficult, patients should seek care for a community private dentist or with a faculty member through the LSUSD Faculty Practice. Patients who fail to keep or make regularly scheduled appointments will be discontinued form the program and their treatment will be terminated.

Some medical conditions may interfere with the provision of safe dental treatment and a physician consult may be required to ensure the patient's good health prior to dental treatment. If the patient has a medical condition that requires a consult from a physician, the patient is responsible for securing the completed form from the

physician and returning it to the LSUSD Clinic. No dental treatment will be allowed until the completed consult form has been returned.

Many of our advanced education departments accept patients for screening only if they have been referred from a dentist or physician and not all screened patients are accepted into a program. Only patients with cases that meet the educational needs of the residents will be accepted. Consult the specific program web page for more information.

University of Mississippi

Screening begins with a call to the Dental School Call Center.
The call center takes the patient information and sends that to an administrative assistant for the Manager of Ambulatory Operations. She places the patient's information on a waiting list. As screening appointments become available, the information is sent to the appointment schedulers who call the patient and schedule them for a screening appointment. The patient is told the screening cost is $29.00.
The patient arrives at the school for screening at the front desk where they are "arrived" on the computer system. They are directed to the screening clinic where they pay the $29.00 and complete a brief health history and consent forms.
The student assigned to screening, or a volunteer student, will seat the patient, review health history, take vitals and evaluate the patient according to screening guidelines discussed during screening orientation and posted in the operatory. The student assesses the patient to determine if the case is too difficult, medically complex, insufficient needs or inability to pay.

After the assessment, the student makes a determination if the patient should be accepted based on the criteria. The student will provide a "ball-park" estimate to ensure that the patient understands that the program is not "free" and a general figure they will have to pay. The patient is informed that this is a gross estimate and may vary or change based on the comprehensive workup at admissions. The covering faculty are consulted and evaluate the patient and make the final determination of whether the patient can be treated in the student program.
If the patient is not accepted, we try to make appropriate referrals based on the patient needs. They are generally to the graduate program (medically compromised patients), hygiene program if the needs are insufficient to warrant full admissions. Our undergraduate program works with the hygiene program to place single restorations as the need arises, so those patients not accepted for insufficient needs may go through the hygiene program and be referred back to the undergraduate student program for limited needs. More complex prosthetic cases are referred to experience or prosthodontic dentist.

If the patient is accepted, they are told how much the radiographs will be and the student makes an attempt to obtain necessary radiographs the day of screening. If

they cannot obtain the radiographs due to time or money, they are taken at the beginning of the first admission appointment. Before leaving the screening appointment, the patient is told that the school will be in contact to schedule an appointment. The information is forwarded back to the office of Ambulatory Operations. The manager of Ambulatory Operations will assign the patient based on the information obtained in the screening process and the request forms that are completed by the students when they are looking for specific procedures. Assignments are made on first in request, seniors having priority. Once the assignment is made by the Manager of Ambulatory Operations, the administrative assistant emails the student with the patient information. The student is responsible for calling the patient for an introduction and working out a mutually available time for an appointment to begin the admission process. The student takes the information to their appointment scheduler and the staffer schedules the appointment in the computer system (if there is availability in the clinic).

Patient Flow: Admissions
Admissions appointment, radiographs are taken if not done so at screening, all basic data is collected.
Periodontal clinic for workup/care presentation.
Consults with faculty in each discipline and work out initial plans for each problem with options.
Assimilate integrated plans (with faculty help as needed).
Records review with faculty to ensure that all reasonable options have been considered and the students is ready to present the case to the patient.
Case presentation: Perio or treatment clinic, same day is recommended.

University of Oklahoma

Applicants complete and submit a prospective patient form online through mail.
Applicants are placed in a database of potential patients.
A representative from the OU College of Dentistry Communications Center calls when an assessment appointment becomes available.
3rd & 4th year students on assigned rotations will provide an assessment exam and preliminary x-rays are taken.
If a prospective patient meets the educational needs of the students, the applicant will be accepted into the program.
The educational needs of the students will determine the number of patients assessed.
If the applicant is not accepted into the program, he/she is provided a summary of dental needs, and copies of x-rays.
If the applicant becomes a patient record, he/she is assigned to a student who will manage his/her oral health care.

University of Tennessee

We receive requests for screening appointments through various means. There is a phone line patients are able to call in and leave their information for a call back to be made a screening appointment, an email address where they can make a request, and then the students can make an appointment for a patient to be screened. At the screening appointment the patient has a pan radiograph made with no fee. The faculty member informs the patient they are not receiving a dental exam but simply an evaluation as to their suitability to be an undergraduate patient. The patient is also informed, that even though they are accepted into the program, not every patient will be selected by a student. They are advised to seek treatment elsewhere if they have not heard from a student within 30 – 45 days.

The faculty member evaluates the patient utilizing the pan and a mirror visual screening. Notations are made on a spreadsheet (in OneDrive) indicating to a student that the patient may have the need for operative, perio, fixed or removable pros. Patients who have obvious occlusal plane issues, extreme loss of VDO, or the need for a full mouth reconstruction are not accepted for the undergrad students and are referred to the grad pros clinic. Patients who appear to have no obvious treatment needs are also rejected (unless a specific student has requested the patient) and are referred to several different "lower fee" facilities in the area for an exam and radiographs.

Once a week patients (who were not specifically requested by a student) are randomly and equally assigned to one of our student group practices. Dentures are sorted out of the general list and also randomly and equally assigned to a group practice via the program OneDrive. Only students in the particular group have access to the list of patients in their group. They are able to select patients to be assigned and one of their group leaders make an assignment request in Axium. The patient's name is then removed from the OneDrive list.

Once a week each group's existing patient list is evaluated by the Director of Patient Intake as to the length of time they have been assigned to a particular group without selection by a student. Once a patient has been in a group greater than three weeks these patients are removed from that group and placed in a separate group that is available to all D3 and D4 students in OneDrive. This allows every student in the entire clinic to have access to a patient instead of one group.

UT Health Houston

We have assessment clinic that helps identify patient distribution to different clinics across the school. Patient coordinator with help of practice leaders will assign patient to undergraduate students depending on need and level.

UT Health San Antonio

Screening is done by the faculty in where a problem list is developed then screening forms are distributed to General Practice Groups (GPGs) for distribution. In addition, one student on each GPG will also screen 3 – 4 patients per session. Those patients are examined by a faculty member from the group and admitted or referred to a specialty clinic where their needs can be met.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

i. If your state MLP's, who is responsible for the education? Please describe?

LSUSD

Not at this time.

University of Mississippi

We are in the process now of changing some aspects of the screening process.
Concerns:
Patient coming to admissions thinking the program is free even after they have been given a ball park estimate at screening.
Patients not showing up for screening appointments.
A proposal is being finalized now to bring to our committee to make the following changes:
Re-evaluate the complexity of contacts for screening a patient
Inform patients when making the screening appointment that the fee for admission is "X" amount. This will cover the screening fee if any, radiographs and the diagnostic data collection appointments. This amount will have to be paid at screening before the first admissions (data collection) appointment can be scheduled.
Proposals are being made for the amount to charge for the radiographs and admission appointments. Billboards around town have $79 Exam, BWX's and cleaning.

University of Oklahoma

We have been considering having all patients screened in the predoctoral clinical by the students in the group practices.

University of Tennessee

Not at this time.

UT Health Houston

Yes
We changed the protocol, so the students involved in initial assessment will have first choice in providing comprehensive care to these patients. It also combined DDS and DH assessment.

UT Health San Antonio
Yes

I am developing a system that will gather data on the number of patients who report for screening with an urgent need for care. The goal is to decrease the frustration to the patient, faculty, and student. Data may be used to assess the community needs for urgent care and to seek funding for an urgent care clinic.

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?
   i. If your state MLP's, who is responsible for the education? Please describe?
   ii. Do the students, faculty, and local dental community embrace the concept?
   iii. Would your institution be willing to provide this instruction?

LSUSD
No
N/A
No
No

University of Mississippi
No
Mississippi is against the use of mid-level providers in this state. The primary organization of the state, Mississippi Dental Association is adamantly against MLP's. The subject of course comes up, but is has not been embraced by a particular group. The areas of advantage would be Mississippi's underserved areas.

University of Oklahoma
No, our state does not have MLP's
We have not seen any information as far as surveys regarding this topic.
Our institution participated in a pilot program for these types of providers on a two year grant several years back. We have not heard anything more regarding that program in our state.

University of Tennessee
N/A

UT Health Houston
Texas does not participate in a mid-level provider or expanded hygiene programs.
N/A
No
If financially lucrative, yes.

UT Health San Antonio
No
N/A
N/A
N/A

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

LSUSD
ADA Caries Classification System

University of Mississippi
Anatomic
- Pit & fissure
- Smooth surfaces

Location
- Primary/secondary caries
- Pit & fissure, smooth surface caries
- Residual caries
- Root surface caries

GV Black – C1 I – C1 VI
C1 I – pit & fissures, occlusal surfaces, buccal/lingual occlusal 2/3 or posteriors, lingual of anteriors
C1 II – proximal surfaces of posteriors, smooth surface between contact points
C1 III – proximal surfaces of anteriors, not involving incisal edge
C1 IV – proximal surfaces of anteriors involving incisal angle
C1 V – gingival third of buccal or lingual of all teeth (not pit/fissures)
C1 VI – incisal edge of anteriors, occlusal cusp heights or posteriors

Extent
- Incipient
- Cavitated
- Rate: acute or chronic
- Affected or infected

Walls
- Internal, external, floor/seat, enamel & dentinal walls
    - Internal: axial & pulpal
        - Axial: internal wall parallel to long axis of tooth
        - Pulpal: internal wall perpendicular to long axis of tooth
    - External: extends to external surface eg buccal, lingual, mesial, etc.
    - Floor/seat: perpendicular to occlusal forces

- Enamel wall: external wall consisting of enamel
- Dentinal wall: external wall consists of dentin +/- retentive features

Angles

- Point, line and cavosurface angles
  - Point angles: formed by junction of three walls at a common point
  - Line angles: formed by junction of two walls along a line
  - Cavosurface angle/margin: formed by junction of wall of cavity preparation with surface of tooth

University of Oklahoma

G.V. Black's classification and definitions to categorize dental caries. To address the depth of the caries: E1/E2/D1/D2/D3, or one of the 150 different descriptive codes for caries available in our Axium software package.

University of Tennessee

"Active enamel white spot caries has a chalky, dull appearance and is porous in texture. It is indicative of active surface caries and does raise the assessment of risk. White spots, with a more shiny look and hard texture are an indication of remineralized surface caries or some other form of enamel pigmentation. This inactive white spot should not be used to raise the risk level (Descriptive Footnote from the Ad Hoc Committee Caries Risk Assessment, Prevention, and Management, July 2009)."

The RCMP Committee will meet to review the current literature regarding terminology and update of the existing protocol.

UT Health Houston

ICDAS and CaMBRA

UT Health San Antonio

We use the American Dental Association's caries classification system, which is very similar to the International Caries Detection and Assessment System (ICDAS).

b. How does your school calibrate its faculty for caries diagnosis?

LSUSD

No calibration throughout all departments. Departments of Pediatric Dentistry, Diagnostic Science, and Comprehensive Dentistry (Operative) have calibration sessions.

University of Mississippi

Standardized rubric grading criteria for each exercise & practical exam
Lunch & Learn events for faculty
Department meetings
Training part-time faculty to standardize with full-time faculty
All faculty spend time in caries courses to familiarize with protocols

School of Dentistry
The University of Mississippi Medical Center

Student Name/Number: _____

Faculty Evaluator: _____ Date: March 8, 2019

Class III Preparation – Tooth #9 ML
Practical 14 FINAL

	EVALUATION CRITERIA					
	Excellent	Good / Average	Minimally Acceptable	Not Acceptable	* CRITICAL ERRORS	Score
	4	3	2	1	0	
OUTLINE AND EXTENSION	Smooth and properly prepared for tooth a. Incisogingival inc. bevel 2.25mm (+/- .25) b. Incisal wall 1.50 c. Gingival wall 1.25	Outline form not smooth a. Incisogingival inc. bevel 2-2.5mm b. Incisal wall 1.50 (+/- .25) c. Gingival wall 1.25 (+/- .25) d. Outline dev 0.5mm:I/G	Outline is .5 mm too large or too small a. Incisogingival b. Gingival wall c. Incisal wall	* Outline excessive in any dimension * Outline is rough	**Outline form misplaced greater by 0.5 mm**	
CAVOSURFACE MARGINS	* All walls except facial wall form a 90° angle with external tooth surface prior to beveling * Contact is very slightly broken at the facial margin and margin is smooth; visible and tactile with explorer tip	Cavosurface angle 90° + or – 5°; Cavosurface angle not smooth in one area a. Facial margin open up to 1 mm b. Facial margin is not smooth in one area c. Facial margin visible from facial; not tactile with explorer	Cavosurface angle 90° + or – 10°; Cavosurface angle is not smooth in multiple areas a. Facial margin open >1mm b. Facial margin is not smooth in more than one area of wall	* Cavosurface angle 90° + or – 15° * Facial margin is still in point contact	*** Cavosurface margins are <75° or >115°** *** Facial margin is completely in contact or open >2mm**	
INTERNAL SURFACE	* Axial wall is curved or parallel following external contour of the tooth * Smooth	* Axial wall is straight * One rough area on an internal wall	Axial wall is concave and rough in several areas	Axial wall is ill defined	**No axial wall**	
SECONDARY RETENTION	* Grooves bisect the gingivoaxial line angles if axial depth is appropriately prepped * Groove is .2mm deep * Cove placement in the inciso facial wall junction and of correct size and orientation	* Groove or cove: Correct location but depth not uniform or slightly larger than .2mm * Location slightly off * Not retentive-shallow, short	* Groove or cove: Incorrect placement: too far axial/too near margin/too facial * Not retentive-but visible shallow, short * Too excessive-wide, long, deep	* Groove or cove; grossly excessive-wide, long deep * Groove or cove is in incorrect orientation compromising a wall or axial pulpal area	*** Groove or cove has broken a wall** *** Wrong direction. No attempt to place**	
BEVEL	* Margins are beveled appropriately 0.25-0.5mm	* Bevel is not smooth and continuous * Margins are beveled appropriately 0.25-0.75mm	* Bevel is .75-1.25 or less than .25 in any area * Interproximal/facial margin beveled	* Bevel is excessive >1.5 at an area * No bevel present or not detectable	**Bevel has compromised integrity of tooth**	
OTHER	* No damage to adjacent tooth * Dentoform is free of water and debris	* Damage to adjacent tooth can be polished. Requires instructor to clean prior to grading	* Prep or dentoform has significant water or debris	* Damage to same tooth or adjacent tooth which requires recontouring	*** Wrong tooth or surface** *** Damage to adjacent tooth requires restoring**	

*** Critical errors will result in grade not higher than 65.**

Department of CPRS Revised 3/22/2017

University of Oklahoma

Presentations from the operative division faculty.

University of Tennessee

The Department of General Dentistry is in the process of extending calibration from assessment of restorative care to caries diagnosis.

The Caries Diagnosis Calibration Committee will be formed to include the Departments of Diagnostic Sciences, Periodontology, General Dentistry, and Endodontics.

UT Health Houston

Yes, twice a year, June and December as part of faculty calibration program, by providing lecture series, debriefing and pre and post-sessions assessments.

UT Health San Antonio

Through a group effort, faculty who have worked in Operative Dentistry have developed flowcharts for detection and assessment of caries lesions along with decision trees on when intervention is necessary. The flowcharts are available at WikiClinic to students and faculty. We also conduct training sessions with the general faculty as well as the faculty who work in the preclinical labs annually. (I will demonstrate the site as time allows).

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

LSUSD

Integrated into Microbiology for D1 students, Treatment Planning Course and Pediatric Dentistry Course for D2 students.

University of Mississippi

Caries Courses: approximately 300 hours
First Year:
Caries I 616-1A, 616-1B: amalgam, composite restorations & biomaterials
Caries II: esthetics of restorations
Methods I 622-1: Introduction to CAMBRA protocol, caries risk assessment
Second Year:
Caries III: indirect restorations
Clinics for Operative Procedures involve Caries Risk assessment, caries diagnosis & managing caries.
Periodontics Department:
In the Periodontics Department, the first class 610-1 has lectures on caries, oral hygiene and use of fluoride in home care and during clinical treatments.
The second year class 610-2 stresses importance of caries risk management as part of ALL periodontal treatment plans.
The third year course also stresses importance of caries risk management during case treatment and maintenance.
Our competency exams always evaluate management of caries risk.

University of Oklahoma

Yes. A course called "Cariology and Fluorides" is offered by the Dental Services Administration division in the first semester of the students' first year. This course focuses mainly on basic intro to caries process and preventive care options. This basic material is integrated and expanded on in the operative curriculum through lectures on diagnosis and treatment planning.

University of Tennessee
Sequence: "…The current courses PERI 103, PDCH 203, [OPER 101B], PDCH 403, and BIDX 409 serve well in their position to provide instruction on caries prevention, assessment, and management."

Location: "…The current courses PERI 103, PDCH 203, [OPER 101B], PDCH 403, and BIDX 409 serve well in their position to provide instruction on caries prevention, assessment, and management. In examining clinical courses, the committee finds that OPER 306, OPER 406, BIDX 402, PERI 302, and PERI 402 can serve as application venues of didactic Elements of the revised management protocol [Ad Hoc Committee Caries Risk Assessment, Prevention, and Management, July 2009].

UT Health Houston
Integrated in Operative and Public Health curriculum.

UT Health San Antonio
Cariology is taught as a separate course but is emphasized in the Operative Dentistry curriculum.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

LSUSD
It's done as a direct build-up restoration for an indirect restoration.

University of Mississippi
UMC SOD supports the use of composite resin in cusp replacement. This is typically done with a microhybrid composite, bulk fill, or core build up resin. Pins are typically not used although we have a couple of faculty that still prefer to have students use a pin with composite resin. If there is heavy occlusion on the cusp to be replaced, we may consider change of materials.

University of Oklahoma
We do not generally teach cusp replacement with a direct resin composite as a final restoration. Some faculty may use it in core foundational restorations for crowns or fixed partial denture abutments.

University of Tennessee
We do not replace cusps with composite in clinic.

In preclinical courses like RESD 206/205 Complex Course, the students are taught that cusp replacement using composite resin is highly achievable and is utilized more due

to the advances in bonding systems and composite strength. The number of cusps to be replaced along with the integrity of the tooth in question will determine whether or not the composite resin cuspal replacement restoration will be utilized as a final restoration or as a "core-buildup" for preparation of a full coverage permanent crown to be placed. Emphasis for cuspal coverage is recommended when the facial-lingual extension exceeds 2/3 the distance between the facial and lingual cusp tips. In most cases, reduction of the cusp tip is indicated for adequate resistance and mechanical retention form. Using available sound tooth structure, together w/modern bonding adhesive resins) procedures to provide retention & resistance form, is key to a successful restoration of complex dental preparations. All cuspal replacement composite restorations are restored back to normal anatomic form and function.

UT Health Houston
Either direct or indirect restorations.

UT Health San Antonio
It is typically discouraged but allowed on a case-by-case basis. But, when one is done, the restoration is not allowed to remain in laterotrusive contact.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

- **i. Class V composite resin?**
- **ii. Sandwich technique?**
- **iii. Bulk fill technique?**
- **iv. Resin Modified Glass Ionomers (RMGI)?**
- **v. Amalgam –**
    1. **Estimate of direct restorations?**
    2. **Bonded or unbonded?**
- **vi. Air abrasion?**

LSUSD
Class V composite resin:
3m Filtek Supreme and Fuji II LC

Sandwich technique:
Fuji II LC and 3m Filtek Supreme

Bulk fill technique:
Not at the time

Resin Modified Glass Ionomers (RMGI):
Fuji II LC

Amalgam:
Dispersalloy

Estimate of 15% of Direct restorations

Bonded or unbonded:
Unbonded

Air abrasion:
No

University of Mississippi

Class V composite resin:

1. Taught: We use composite in a class V for abfraction, erosion, and carious lesions.
2. Indications – caries, erosion, occlusion
3. Materials – this is our typical desired restorative material if isolation is not an issue for Class V.

Frequency – I would assume this is used 70% of the time.

Sandwich Technique:

1. Taught – yes, in the clinic on a case-by-case basis
2. Indications – deep Class I or Class II/rough floor with irregularity
3. Materials – typically a flowable composite
4. Frequency of use – 30% of Class I and Class II composites

Bulk fill Technique:

1. This is introduced in the preclinical Caries I course in materials
2. Indications – we discuss this as a restorative option in posterior composites
3. Kerr sonic fill and others
4. We have not yet used in our clinics and are using in faculty practice

Resin Modified Glass Ionomers (RMGI:

1. Taught – introduced in Caries I in first year of dental school
2. Restorative: Deep Class V/sometimes root decay Class III's/primary teeth Class I or Class II
   Liner – Vitrebond
   Cement - Fujicem/Fujiplus/Relyx
3. Materials above
4. Frequency of use – 20% of clinical restorations/80% of cementations

Amalgam:
17% of direct restorations – data from EPIC from 8/6/2018

Procedures		
Code-Procedure	RVUs	Procs
D2140 - PR AMALGAM ONE SURFACE PERMANEN	461.55	181
D2150 - PR AMALGAM TWO SURFACES PERMANE	498.30	151
D2160 - PR AMALGAM THREE SURFACES PERMA	171.57	43
D2161 - PR AMALGAM 4 OR > SURFACES PERM	58.32	12
D2330 - PR RESIN ONE SURFACE-ANTERIOR	661.50	210
D2331 - PR RESIN TWO SURFACES-ANTERIOR	1,487.40	370
D2332 - PR RESIN THREE SURFACES-ANTERIO	403.44	82
D2335 - PR RESIN 4/> SURF OR W INCIS AN	873.00	150
D2390 - PR ANT RESIN-BASED CMPST CROWN	70.95	11
D2391 - PR POST 1 SRFC RESINBASED CMPST	2,044.26	554
D2392 - PR POST 2 SRFC RESINBASED CMPST	1,782.27	369
D2393 - PR POST 3 SRFC RESINBASED CMPST	696.00	116
D2394 - PR POST >=4SRFC RESINBASE CMPST	191.10	26
Total	**9,399.66**	**2,275**

Selection Status:	
Service Date	>=08/06/2018<=08/06/2019
Procedure Code	13 of 569
Service Provider Type	Dental Student

Bonding or unbonded:
Bonded if it is a cusp replacement or large Class II, otherwise for average sized restorations it is amalgam only.

Air Abrasion:
Only taught in didactic

University of Oklahoma
Class V composite resin:
Class V cavity preparations are usually restored with resin composite, resin modified glass ionomer, a combination (sandwich technique), and in some cases they are restored with amalgam. We restore carious cervical lesions if there is obvious cavitation in the decalcified enamel, otherwise we might try to remineralize the decalcified enamel. For non-caries cervical lesions, we restore the lesions based on the following factors:

- Sensitivity that cannot be ameliorated with desensitizing treatment.
- Depth of lesion in regard to the strength of the tooth structure
- Esthetic considerations
- Evidence of periodontal pathology due to food collection at gingival margin of lesion

Sandwich Technique:
We often utilize the sandwich technique when the cervical caries lesion has its gingival margin in cementum, and the restoration will be in an area where esthetics is a concern. We place resin modified glass ionomer at the gingival margin and partially up onto the axial wall of the preparation, and then veneer the entire cavity preparation with a microhybrid resin.

Bulk fill Technique:
We are not currently teaching the use of bulk filled resin. Some of our fourth year Comprehensive Care Division instructors may use them in the predoctoral clinics.

Resin modified glass ionomer:
We utilize Resin Modified Glass Ionomers in Class V restorations, and as a liner for the sandwich techniques in Class II, III, and V cavity preparation that have gingival walls located in the cementum. We may also use these in Class III cavity restorations for patients with rampant caries and/or with continuously extremely high caries risk assessments.

Amalgam:
We utilize amalgam to restore very large restorations, especially in molars and foundational core restorations that require replacement of cusps. Many of our faculty also prefer to use amalgam in patients with rampant caries, or those who show and inability to provide adequate preventive home care needs for themselves. It is considered a good option when it is impossible to be sure of adequate isolation of the cavity preparation.

Air Abrasion:
We do not teach the use of air-abrasion for cavity preparation.

University of Tennessee
Class V composite resin:
We use 40% phosphoric acid etch, Opti Bond bonding agent TPH Spectra and Flowable, Fuji liner if deep prep.

Sandwich Technique:
Not done very often. Will use Fuji liner and composite or RMGI.

The sandwich technique involves a glass ionomer (Gi) cement, dental adhesive and composite resin. It is an effective technique that optimally combines the desirable properties of the restorative materials. The sandwich technique is recommended when an extensive amount of carious dentin has been removed from the tooth and pulpal protection is necessary. Many deep Class I and II cavity preps and Class V cavity preps have shown to demonstrate the use of this sandwich technique. The sandwich

technique can be open or closed. The open technique is when the (Gi) at the gingival margin is exposed to the oral cavity. The closed technique is completely covered with composite resin to enhance esthetic and polishability and increase abrasion resistance of the restoration. The application of the closed technique is emphasized and recommended in the Complex Course and is a part of the student's daily lab project assignments for restoring Complex Preparations. GC Fuji Lining LC Paste is fluoride releasing and is the chosen dental material for Glass Ionomer used in the Complex Lab Course.

Bulk fill Technique:
Do not use Bulk Fill technique because we don't have the correct materials.

Resin modified glass ionomer:
Do place RMGI's (Fuji IX), especially in hard to access Class V cavities and on root surfaces.

RMGI is emphasized in the lecture component of the Complex Course but is not used as a part of the dental materials for daily lab project assignments. Some uses for RMGI are the following: (1) bases under deep composite restorations to reduce postoperative sensitivity, (2) Class V restorations that require better appearance, (3) for short-term temporaries, and (4) as cements for final restorations. 3M ESPE Rely X Luting Cement, 3M ESPE Vitrebond, GC Fuji Cem, and GC Fuji II are the resin modified glass ionomers that are incorporated within the lecture component of the Complex Course.

Amalgam:
Still place amalgam, especially in areas of heavy loading.

Probably less than 20% of restorations placed.

Bonding or unbonded:
We do not use bonding agents for amalgam, except to seal tubules prior to placement.

Air Abrasion:
No air abrasion.

UT Health Houston

Class V composite resin:
NCCL, can be restored with flowable (Permaflo, Ultradent) or nanohybrid (Harmonize, Kerr) composites according to lesion size. Universal hybrid composite (Z250) is phasing out.

Sandwich Technique:
It is taught in preclinic to use Fuji IX (GI) or Fuji II LC (RMGI) with composites. In clinic, it is dependent on assigned faculty and clinical scenario.

Bulk fill Technique:
Yes, we are using SDR Flow+ (Dentsply) and Filtek One Bulk Fill (3M). Recommended to fill the preparation up to 1mm away from margins and finish with a nanohybrid (Harmonize) or hybrid (Z250).

Resin modified glass ionomer:
Liner – Vitrebond (3M), used for pulpal protection, block undercuts and seal gutta percha in RCT.
Base – Fuji II LC (GC America), used for temporary restorations, block undercuts, and final restorations (i.e.: root caries).

Amalgam:

Procedure	AY 2019	AY 2018	Notes:
Amalgam (Total)	84	119	~2% of total posterior restorations
Amalgam (3-4 surface)	15	20	Only -1- Amalgam 4 surf. placed last year
Posterior Resins (Total)	4,782	4,974	
Posterior Resins (3-4 s.)	642	641	~13% of all posterior resins are 3-4 surfaces
Posterior Resins (1 surface)	2,011	2,197	Just thought it would be interesting to see our ratios, assuming these are primarily occlusal resins.
Sealants (Total)	1,836	1,739	
PRRs (Total)	556	648	

Bonding or unbonded:
Unbonded

Air Abrasion:
Only for microabrasion of intaglio surfaces of indirect restorations. Not used intra-orally.

UT Health San Antonio
Class V composite resin:
We teach composite restorations for Class V restorations when esthetics is a primary concern and caries risk is minimal. We have Heliomolar and Filtek Supreme Ultra available in the clinic. We suggest RMGI if the Class V is the result to caries in a higher risk patient.

Sandwich Technique:
We teach a sandwich technique combining either glass ionomer or Surefill SDR topped with Filtek Supreme Ultra for Class II restorations. We teach the glass ionomer technique for its fluoride release and the Surefill technique for its excellent adaptation to the box floor.

Bulk fill Technique:
We don't believe in climate change, or that light cured composite can be cured at depths more than 2 mm. This here is Texas dammit! Seriously, we haven't pushed the concept of bulk curing even though we have a bulk cure flowable available in clinic.

Resin modified glass ionomer:
We cannot separate out the data for RMGI from resin composite but it is not used nearly as frequently as resin composite. We only pull it out in the case of Class V's or in the box floor of Class II's for sandwich technique in high caries risk patients.

Amalgam:
Amalgams made up 11% of our direct restorations for academic year 2018-2019 for the DS3 class when sealants were subtracted from the totals. The other 89% was either Resin composite or RMGI.

Bonded or unbonded:
Data distinguishing the two cannot be pulled as we do not code them differently.

Air Abrasion:
None

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?
   i. Has it replaced gold in your clinic?

LSUSD
Yes
No

University of Mississippi
No, we did one milled porcelain only and one cast metal onlay in the past year.
No, all metal cast restorations accounted for on 4.3% of all fixed units including single, fixed partial dentures, and implant restorations. PFM restorations were ~52% and all-ceramic ~43%.

University of Oklahoma
We are using more milled restorations than in the past. This is certainly utilized much more than gold for partial coverage indirect restoration.

University of Tennessee
We are placing more CEREC onlays, but not many inlays. Inlays are very technique sensitive.

The ceramic onlays are replacing gold primarily because they are cheaper. However, once students try gold onlays and crowns, they are usually very impressed with the marginal adaptation and ease of cementation and want to do more of them.

UT Health Houston
Not yet. Dr. Frey is still building composite inlays and onlays traditionally. He will be out of business soon. ☺
Pretty much for partial coverage

UT Health San Antonio
All of our milled restorations are full coverage.
No. We were not doing mush gold in the clinic prior to our milling capacity and it remains unchanged.

d. Who performs molar endo? In Under graduate and Post-Graduate Clinics:

LSUSD
Pre-doc students 5%
Endo Residents 94%
Endo Faculty 1%

University of Mississippi
Pre-doc students - 100%
Endo Residents – 0%
Endo Faculty – 0%
18% of root canals done by students, last year were molars

University of Oklahoma
If the patient is in our student clinics, the students perform all molar endo with the help and oversight of the Endo faculty.

University of Tennessee
Predoc students, Endo Residents, Endo Faculty

The predocs do about 15-20% of the molar Endo. This is up in the last year. Probably 75% of the molars are done by the Endo Residents. The faculty probably do 10% for the students.

UT Health Houston

Procedure	AY 2019 Predoc	AY 2019 Grad Endo	AY 2018 Predoc	AY 2018 Grad Endo
Total RCTs	600	1,020	523	783
Molar Endo	192	648	201	497
Molar Endo (% of total)	32.0%	63.5%	38.4%	63.5%
Percent of Molars Combined (Predoc+Grad)	23%	77%	29%	71%
Note: I do not have these specific reports available for UT Dentists and they do not share pts w/ the school.				

UT Health San Antonio
Seniors in the Molar Endo Selective.
Don't have access to this data.

e. Do you utilize bond strength testing exercises?
i. Who supervises?

LSUSD
Not with students. We do have a couple of faculty members.
Biomaterials Research Faculty

University of Mississippi
Yes
Biomaterials faculty and clinical faculty in Caries classes

University of Oklahoma
We do not utilize an Instron device to measure bond strength. We have a lab exercise that has students apply cylindrical resin composite specimens on extracted natural teeth under various protocols and conditions (enamel with no etch/no bond resin, enamel with bond resin only, enamel with etch and bond, dentin bonding, dentin bonding introducing common errors made in protocol such as saliva, over-etching, over-drying etc.). We then let them break them off by hand with a lab knife.

University of Tennessee
N/A

UT Health Houston
Not hands-on, but didactically is covered in Biomaterials courses.
N/A

UT Health San Antonio
No
N/A

f. Do you use electric hand pieces in the simulation laboratory? In the clinic?
i. If no, why not?
ii. If yes, what system?

LSUSD
No, not in the lab or clinic
Initial cost and maintenance at this time.

University of Mississippi
2018 first-year students were given electric handpieces to use preclinically.
2019 first and second year students will use electrics in preclinical classes.
Beginning in 2020 third year students will being using electric handpieces in clinics
2021 our air turbine handpieces will be phased out.

Bein Air MX2 Motor and attachments

University of Oklahoma
Yes
Our students purchase an electric hand piece. We utilize the Bien Air MX2 motor with two MicroSeries attachments, a high (0-200,00 RPM) friction grip attachment, and a low speed (0-40,000 RPM) latch attachment.

University of Tennessee
Yes, in the lab and clinic.

UT Health Houston
Only slow speed in both sim and clinic
Adec

UT Health San Antonio
No
We are looking into adding electric handpieces and will a decision will be made on October 29.
If it is added the system will be Bien Air.

IV. Student Assessment

a. Does your institution have an international dental program?

i. If yes, does your school utilize a bench test? Please describe.

ii. If yes, how many students are enrolled?

LSUSD
We will
Maximum of 5 is the plan

University of Mississippi
No

University of Oklahoma
Yes
We select a certain number of applicants to come in for interviews. At the time of the interviews we have the student complete a full coverage crown preparation and a Class II cavity preparation.
Our last international class was comprised of ten students. We have recently added five additional simulation stations in our preclinic lab, so it will increase to 12 students for the nest class.

University of Tennessee
No

UT Health Houston
Not yet, but one is in the works.
In the past when we have had the opportunity to take an advanced standing student, we did administer a bench exam. It consisted of a crown prep, a composite prep and fill, and provisional crown.
So far the most we have taken in a year has been two.

UT Health San Antonio
Yes
Dr. Rita Parma has been the Director of the International Dental Education Program (IDEP) for the last 7 years. She has developed an outstanding method of evaluation of applicants and pre-matriculation training. The program continues to attract a large number of qualified applicants who must demonstrate hand skills that would be appropriate to a student at the start of the DS3 year. We use the same criteria as our DS2 operative dentistry modules. We also have extensive pre-matriculation training that will prepare students for the clinic.
We have 8 this year but have admitted as many as 12.

b. Do you evaluate students using OSCE's?

LSUSD
Yes

University of Mississippi
Yes, OSCEs are used to access students in individual courses and in our year-end global assessments (CGDAs).

University of Oklahoma
We do not. We do have some lab projects that involve simulated patients where students must look at radiographs, review health histories, and dental complaints. They must identify problem and decide on treatment needed. They then prepare an ideal cavity reparation in a typodont tooth with simulated caries in the dentin. After the ideal prep is evaluated, they suggest additional modifications needed for the cavity preparation. When prep and caries removal are completed, they must recommend and place an appropriate pulp protection for the tooth, and then place the final restoration.

University of Tennessee

UT Health Houston
Yes, we have an OSCE in the middle of the 2nd year (before entering clinic in the spring semester) and one at the end of the 3rd year is being considered.

UT Health San Antonio
Yes

c. Describe your primary didactic testing methodology:
- **i. Which methods? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)**
- **ii. Pros/cons to the one you are primarily using?**
- **iii. Are you investigating other methods?**
  1. **If yes, which one(s)?**

LSUSD
Pen/paper-hand graded, ScanTron sheets, digital assessment program through Moodle.
Most faculty use Moodle.
Pros:
Immediate grading and grading data.
Cons:
IT/network/student computer glitches, and, takes time to enter questions
No

University of Mississippi

ExamSoft and OSCE

Pros:

ExamSoft – does the grading for you

OSCE – it appears to most closely mimic clinical decision making that are required in the dental profession; gives us a truer picture of our students understanding and misconceptions.

Cons:

ExamSoft - takes a while to develop and enter questions, INBDE style questions require more steps since there is no INBDE template in ExamSoft.

OSCE – very time consuming to develop and grade.

Dr. Boteler:

D1 course at UMMC

DENT 622 – 1 Methods in Problem-Oriented Dentistry 1—Oral Diagnosis

Dr. James Lott and Mr. Jesse Emling (the UMMC instructional designer) presented a two-hour lecture/exercise to train the D1 students on how to construct a question following the INDBE format.

The students have then been asked to construct a twenty question quiz from most lectures following the INDBE format. Those twenty questions that the students chose are submitted to the lecturer for editing. The lecturer returns those edited questions to the course director who administers the quiz about a week after the lecture was given. The mid-term and final examination questions are selected from the quizzes that the students have taken during the course. For the Methods 1 course, nearly 100% of the questions are using the INDBE format.

No

University of Oklahoma

We utilize a computer based exam using a system called *Desire to Learn (D2L)*

Pros:

a. We think that it cuts down on the students' ability to cheat on exams.
b. We like the automatic evaluation of the exam.
c. It is fairly simple to add or change questions on the exams.
d. It provides quick and easy statistics on test items.

Cons:

Initially, Wi-Fi router would sometime drop students during the exam so they had to log in again on the D2L site. This was corrected when we required them to bring in Ethernet cables to plug into internet directly at each lab station.

Not at this time.

University of Tennessee
We use ExamSoft for all didactic testing in the CoD

Pros:
Generally reliable software
Can handle many kinds of question types
Provides students and faculty with many reporting options
Has mechanisms to discourage academic dishonesty
Does not rely on continual network connection
Good options for exam security.

Cons:
Can be occasionally slow when Examsoft servers are overloaded
May not always work well on older devices.

No other methods being investigated.

UT Health Houston
ExamSoft
Pro:
Easy to administer
Cons:
Have to have a question pool
Create every exam
Post it
Make available, etc.

No other methods being investigated.

UT Health San Antonio
Our operative dentistry, fixed prosthodontic, and TMD courses have been combined and are now called Modules in Dental Fundamentals of Restorative Dentistry (DFRD). Each module of DFRD counts as one third of the total grade. Fifteen points of the score for each module is for daily quizzes. Students must score at least 70% in each module to pass the course.
We use ExamSoft for quizzes and didactic examinations.
Pros:
Cons:
Calculations of grades is complicated and a bad score in one module may result in a lower grade for a huge course.

We have not been allowed to institute changes in the testing for didactic courses.

V. Administration

a. What is your policy on attendance?

i. Please provide the actual attendance policy statement.

ii. Who is responsible for tracking attendance?

iii. How effective is your policy?

LSUSD

CLINIC: The LSU School of Dentistry attendance policies for didactic, pre-clinical and clinical courses are included in the LSUSD STUDENT HANDBOOK OF POLICIES AND PROCEDURES. It states: Dental students are required to attend all scheduled clinic sessions as a requirement of each specific clinical course. The only exception is approved absence by the Dean or the Associate Dean for Academic Affairs. Both may grant a petition for a short approved absence in the case of illness, participation at a professional meeting, or any emergency, with the explicit understanding that the student will arrange with the faculty involved to satisfactorily complete all course expectations.

Didactic Courses: Attendance is mandatory, for all courses in the dental, dental hygiene and dental laboratory technology programs at LSU School of Dentistry. The LSU School of Dentistry attendance policies for didactic, pre-clinical and clinical courses are included in the LSUSD STUDENT HANDBOOK OF POLICIES AND PROCEDDURES. (20% rule in handbook).

Responsible for tracking attendance:
Course directors and faculty in some courses.

Effectiveness of policy:
…meh

University of Mississippi

We no longer have an attendance policy for clinic, but utilize clinical utilization percentages. We ask each course director (didactic, pre-clinic and clinic) to place the attendance policy and expectations for his/her course within the course syllabus.

Responsible for tracking attendance:
Course director, as applicable for his/her course syllabus. Clinic tracks the individual student's:
a) clinical utilizations
b) quantity/quality of select procedures
c) RVU production

Effectiveness of policy:
Unknown

University of Oklahoma

The following I sour attendance policy statement:
"POLICY TITLE: 307 GENERAL ATTENDANCE POLICY
POLICY GROUP: ACADEMICS
POLICY SUB GROUP: Student Affairs
DATE OF LAST REVIEW: 06/01/2018
REVIEW FREQUENCY: ANNUAL
RESPONSBILE COMMITTEE RESPONSIBLE MANAGER
BACKGROUND:
College of Dentistry students pursuing the Doctor of Dental Surgery degree are aspiring to a profession in which full participation in the learning environment is an essential component of lifelong learning and aligns with accreditation and licensing standards. Professional development dictates that students are expected to make their education program their highest priority. Attendance and participation are expected in all educational activities, and are required for all other sessions specified by the Course Directors.

Definitions: an absence is any instance when a student is not physical present at an activity. Students should not assume they are allowed any absences at their discretion or for their personal convenience.

A limited number of reasons justify being absent. These include, but are not limited to:

1. An illness, personal emergency or family tragedy
2. Presentation or representation in a leadership capacity at regional or national professional meetings
3. Residency Interviews. Students are strongly encouraged to schedule interviews during vacation periods to avoid conflict with scheduled activities
4. Access to health services and counseling. Students may be excused to attend necessary health care and counseling appointments. Students are strongly encouraged to make all such appointments during non-required activities, if possible.
5. Jury Duty
6. Other reasons for an excused absence will be considered on a case-by-case basis.

POLICY –

1. Attendance is mandatory for all class and clinic activities, unless specifically advised otherwise by the course/clinic director.
2. Students are expected to arrive on time for all class and clinic activities.
3. Requests for excused absences that are anticipated must be made in writing to the appropriate individuals as specified below.

a) the Student Affairs Specialist in the Office of the Dean for Student Affairs, and
b) the Course/Clinic Director for the courses and/or clinics to be missed.

4. Unanticipated absences (i.e. illness, injury, etc…) are to be reported to the Office of the Dean as soon as possible. If patient care is to be delivered that day, then the clinic course director and/or GPD, and the student's assigned PSC is to be notified."

Responsible for tracking attendance:
Preclinic: course directors
Clinic: GPD report attendance to admin assistant

Effectiveness of policy:
No issues

University of Tennessee
University of Tennessee Health Center College of Dentistry
Excused Absences Policy, April, 2018
Excused absence requests must be submitted on-line at the following link:
https://uthsc.co1.qualtrics.com/jfe/form/SV_8CitMyVmB5Wz8yh
Students may attach documentation (pdf, photo, document) when submitted the on-line form.

An absence is NOT officially excused until the student is notified by the College of Dentistry (CoD) administration (Dean or designee: Associate or Assistant Deans). No other CoD personnel (Course Directors, Chairs, Group Leaders, etc. may grant an excused absence.)
Students in the D-3 and D-4 years are allowed 6 half-days per semester for personal business.
The following days away from CoD clinics are NOT included: rotations at any official CoD extramural rotation. (Excused absence NOT required). D-3 and D-4 students are allowed a maximum total of two weeks (10 business days) for CoD extramural/off-site rotations.
Sick days without a doctor's excuse count toward the 6 half-day total.
Personal days may be carried over from the Fall to the Spring semester, subject to adequate academic and clinical progress, as defined by students' group leaders and the Office of Academic Affairs.
Personal days may NOT be carried over to the next academic year. *The use of a personal day must NOT compromise patient care of continuity of care.
*Beginning with Class of 2020:
For clinical excused absences, the student must call and let their PCC and any scheduled patients know of their unavailability to keep the appointment. Excused absences allow students to miss class and/or clinic without penalty.
Events/situations that are usually excused:
Formal residency interviews (but not private practice interviews).

Formal, academic invited externships AND in good academic standing (No probation and sufficient progress in clinic).
Illness with note from treating clinic or doctor's appointment.
Childbirth (student and spouse/partner only).
National Boards (day of exam only and one travel day, if >100 miles from Memphis), ADAT or GRE. If at all possible students should AVOID taking exams when class/clinic is in session.
Death or sudden, serious illness of immediate family member (spouse/partner, child, parent, grandparent).
Representing the college/university in an official capacity AND in good academic standing. (No probation and sufficient progress in clinic).
Hinman regional/national meetings (primary officers only) AND in good academic standing. (No probation and sufficient progress in clinic).

Responsible for tracking attendance:
Basically mandatory attendance with some circumstances for excused absences, with Associate Dean for Institutional Affairs approving excused absences.

Effectiveness of policy:
Moderately effective. Don't receive a lot of complaints about the policy.

UT Health Houston
Attendance

The Office of Student Affairs must validate all requests for excused absences. If the student misses an exam and is granted an excused absence, the course director will administer a make-up examination. If a student has an unexcused absence for an examination or quiz, a grade of zero (0) will be recorded. The student should refer to the current *Student Guide to Academic Studies* for general policies concerning attendance.

Excessive Absences

Excused absences are permitted only if the student does not miss more than 25% of the total number of class meetings, preclinical lab sessions, or the contact-hour equivalent (not including the final examination period) for the specific course or courses in which the student is enrolled at the beginning of the semester.

- Missing more than 25% of scheduled course sessions at one time will require the student to take a leave of absence from the program.
- Any student missing more than 25% of scheduled preclinical laboratory sessions will be at risk of having grade deductions or potentially failing the course, ***whether or not the absences are considered excused.***

Responsible for tracking attendance:
Course directors are responsible for tracking attendance.

Effectiveness of policy:
It is not an effective policy.

UT Health San Antonio
The school catalog has a defined policy for attendance, but Course Directors have some latitude in enforcing policies that are contained in their syllabi. Attendance in DFRD is mandatory. Students who miss more than 3 lectures must submit written answers to learning objectives to the lectures that they missed. (Only one student in the last 15 years has received a failing grade for attendance and she missed 12 sessions). Attendance is recorded by a 2 question ExamSoft quiz that is done at each didactic lecture. The password is provided at 8:00 and must be submitted by 8:05.

Class Attendance
Students are expected to attend and actively participate in all regularly scheduled classes, laboratories, and clinical periods. The policy regarding attendance and the consequences for failure to comply is the prerogative of the course director and the department responsible for that portion of the curriculum, and will be provided in the course syllabus at the beginning of each course. It is the responsibility of the student to arrange with the faculty for making up any work that is missed.

DFRD 6005 Syllabus
Attendance Policy
Attendance is required for the entire duration of all DFRD 6005 sessions. Students are expected to be present, attentive, and actively engaged for the entire length of all scheduled course sessions. The consequences of absenteeism are set by the Module Director. Excessive absenteeism may result in a lowered course grade, or may result in course failure.

DFRD 6006 Syllabus
Attendance Policy
Attendance is required for the entire duration of all DFRD 6006 sessions. Students are expected to be present, attentive, and actively engaged for the entire length of all scheduled course sessions. The consequences of absenteeism are set by the Course Director. Excessive absenteeism may result in a lowered course grade, or may result in course failure.

DFRD 6006 Module Specific Information:
Attendance is mandatory. Each Operative Dentistry session begins promptly at 8:00 a.m. and will end at 11:50 a.m. Attendance will be taken at the beginning of each class through a short quiz (Ticket in). To receive credit for the laboratory session you

must have your faculty evaluate your work and sign your grade sheet. You are responsible for placing the criteria and grade sheets into the folder and project teeth into the collection box at the end of the laboratory (Ticket Out).

It is your responsibility to seek out the Course Module Directors as soon as you return to school, after an absence, to bring projects up-to-date.

As a part of the Professionalism evaluation, students are expected to arrive on time and to remain in the laboratory. Lab sessions are to be used for working on the assigned exercises, unless excused by the individual Laboratory Director. You are also expected to do the assigned readings and to complete homework within the defined time frames.

Attendance is considered one aspect of professional behavior. Failure to display the appropriate degree of professionalism in either DFRD 6005 or 6006 will be reflected in the course grade and depending on its severity, may be grounds for failure of the entire course. See Course Syllabus.

Responsible for tracking attendance:
Attendance is recorded in ExamSoft for quizzes and didactic courses. Ms. Pat Dimas, Academic Programs Coordinator records attendance and emails students who have missed multiple sessions.

Effectiveness of policy:
Attendance at these lecture is consistently more than 95%.

b. What is your policy with student complaints about grades?

LSUSD
Listen…explain…patience…appeal process (referral to appropriate Department Chair, then Dean, then to Academic Performance Committee from Dean, then APC makes a decision that can be appealed to the Dean one more time for final decision.

University of Mississippi
Students first discuss with the course director if there is a dispute regarding a particular graded project/assignment. If resolution cannot occur, the student next discusses with either the department chair and/or appropriate dean (academic affairs and/or clinical affairs). If resolution cannot occur, the students have an anonymous (or they may self-identify themselves) email system with the student dean who can review, as needed, on a case-by-case basis. Students have an ethics and civility council which could also review if grading concerns deal with issues in this regard.

University of Oklahoma
We listen to their complaint to analyze whether it is valid, and then take the appropriate action, if indicated. If there is an unresolvable disagreement concerning the grade, the student can ask for a review by the college's Academic Appeals Board.

University of Tennessee
Complaints about grades: CoD respects the academic freedom of course directors so most grade disputes are handled by student discussions with course directors. If a student feels they have been treated unfairly, they may discuss with Department Chair, Associate Dean for Student Affairs, or Academic Affairs (pretty much in that order).

UT Health Houston
It will be considered by course directors on a case-by-case basis.

UT Health San Antonio
When Skill Assessments grades are handed out the grader will answer any questions on how grades were assigned. Students place their seat number on a sign-up sheet and the grader will go to the student and explain the grade that was given to the project.

c. What is your policy on student absences?

LSUSD
Can be reported by course director to the Academic Performance Committee to review.

University of Mississippi
We do not have excused absences, except for school-related activities. See answer 5a.

University of Oklahoma
1. An unexcused absence or failure to report an absence as described above is considered unprofessional behavior and may be dealt with under appropriate College of Dentistry's professionalism policy (COD 3.15).
2. Absences on any course that exceed three days are a matter that required consultation with the Dean for Student Affairs.
3. Student unexcused absences are considered potentially excessive will trigger an automatic review by the Dean for Student Affairs and the College of Dentistry Professional Development Advisory Committee.

University of Tennessee

UT Health Houston
Ideally, if excused, they can make up anything, if unexcused, they get a 0 for the day.

UT Health San Antonio
Reporting Absenteeism/Tracking Attendance
When a student must be absent from the School of Dentistry, he/she must report their absence online (https://fmcgi.uthscsa.edu/absence/). Students who will be absent from any examination must notify their Course Director by e-mail and complete an online student absence report. It is the responsibility of the student to meet with the Course Director to identify and make-up any work that is missed due to an absence from any course activity.

Students may be granted Leave of Absence (LOA) for a period of time on a case-by-case basis and return to school at a level that is consistent with their term of absence. Students must demonstrate appropriate clinical skills by assessments designed and conducted by course directors.

d. Regional licensure exam
- **i. What exam(s) does your school host?**
- **ii. What's the general consensus towards the benefits of the exam?**
- **iii. What's the general consensus on the elimination of the exam?**
- **iv. What are the alternatives?**

LSUSD
CITA/ADEX
Outdated. Live Patient Exam does not disprove/prove is ready/qualified to be a licensed Dentist.
Should be done.
Unfortunately, none at this moment. OSCE based examination process is a possibility.

University of Mississippi
CDCA/ADEX
It provides the student the ability to obtain a license in Mississippi or 46 other states. Students do not like the exam, no surprise, but the State Licensing Board wants assurances that they are granting a license to a minimally competent dentist and the CDCA exam in their opinion is an independent measure of their knowledge and psychomotor skills.

None, at this time based on communications with the Mississippi State Board of Dental Examiners. Currently, I feel the opinion of those who issue licenses in our State is that the live patient portion of the exam, which is most controversial, is the best

way to independently evaluate the student's ability to recognize, diagnosis and evaluate removal of caries and the ability to use psychomotor skills to place a minimally acceptable restoration.

As previously discussed through ADEA/ASDA: No outside board exams, portfolio assessment, mandatory PGY1 years, OSCEs, mannequin examinations.

University of Oklahoma
Western Regional Examination Board (WREB)
No board exam is going to be a good reflection of a student's abilities.
We have heard of no plans to eliminate the exam.
Oklahoma now accepts CRDTS we do not currently host this exam.

University of Tennessee
SRTA & CITA (ADEX)
Minimal benefit
Students would like to eliminate the patient based exams and personally I totally agree. Demonstration of hand skills on a manikin directly relate to the ability of a student to provide the same procedure on a patient.
SRTA and CDCA are currently developing and CDCA is actually beta testing a patient less exam. A company has developed manikin teeth that are very similar to natural teeth in that they have an enamel and dentin layer as well as "caries" that exhibits tug back with an explore. The teeth are also polishable when a restoration is finished.

UT Health Houston
Western Regional Examination Board (WREB)
It allows our students to practice.
There are conversations, but nothing concrete.
Letting the individual school determine if someone is ready to graduate and be licensed, who should know better?

UT Health San Antonio
Western Regional Examination Board (WREB)
We have had a high pass rate for the last several years and the policy of allowing students to retake a failed section as part of the exam has suppressed the general discontent that has been expressed in the past.
Not a strong movement at the school.
Certification by each school, or bench tests.

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

LSUSD
We like the size as it is now considering our agenda is based on a 1.5-day schedule.
University of Mississippi
No opinion; request to discuss the pros/cons of potential realignment first.
No

University of Oklahoma
Does Hawaii have a dental school yet?

University of Tennessee

UT Health Houston
I personally like our region.

UT Health San Antonio
I don't have a problem with how that are organized now.
No

f. Discuss and describe suggestions for improving CODE.

LSUSD

University of Mississippi

University of Oklahoma

University of Tennessee

UT Health Houston
It would be nice for regional members to be involved and invited to national CODE meetings. In addition, to get summary reports from all the regions.

UT Health San Antonio
Spend less time answering the items on the agenda and more time on initiatives, problems, and discussion of issues in dental education at the schools. Each school should answer the question, "What is the one thing that you would change at your school that would improve Operative Dentistry education?"

The purpose of this section is to identify best practices in operative dentistry education.

1. **As a part of this year's CODE meeting we would like for participants to share innovations, challenges, or opportunities in restorative dentistry training at your school. Please list below, in bullet form, topics that you would like to present or discuss. We will allow time in the schedule to discuss the issues that you identify.**

   LSUSD

   University of Mississippi

   University of Oklahoma
   - Do you feel that your electronic grading software is accurate? How do you verify that it is?
   - How do you calibrate all of your clinical faculty (full & part-time) in regard to clinic grading?

   University of Tennessee

   UT Health Houston

   UT Health San Antonio

2. **In the past, we have requested a catalog of Kilgore teeth but have been told that there is none available. I am asking that schools bring the Kilgore teeth that they are using so that we can all see what other schools are using. We would also be interested in looking at teeth that are manufactured with simulated dentinal caries. We have a small sim lab in the building that can be used if individuals would like to see how the teeth are cut.**

   Further questions concerning teeth are:

   a. **Are Kilgore teeth a separate order or covered under student loans?**

   LSUSD
   It is covered under student loans as part of their "kit".

   University of Mississippi

   University of Oklahoma
   The students pay for typodonts and teeth as part of an Operative preclinic instrument and equipment fee.

University of Tennessee
Yes

UT Health Houston
Part of their student kits they are required to buy. They even get a Bookstore "Gift Card: so they can buy more teeth and burs.

UT Health San Antonio

b. Is artificial caries used in pre-prepared teeth to simulate caries removal and, if so, what materials and technique are used in placement?

LSUSD
No

University of Mississippi

University of Oklahoma
We have been using dentin blanks that Kilgore sends us to remove dentin that we want caries injected into. We send that back to Kilgore and they manufacture the tooth by filling the area where dentin was removed and then fusing an enamel outer cap over the dentin. (We have brought samples of the specific teeth that we use). We are changing typodonts in the spring to the acadental modu-pro. We still are working out the caries teeth problem for the Acadental teeth.

University of Tennessee

UT Health Houston
Yes, we buy them premade.

UT Health San Antonio

c. How do students get extra teeth?

LSUSD
Purchased from bookstore as needed.

University of Mississippi

University of Oklahoma
Students purchase them at our student store.

University of Tennessee
Henry Schein store on campus

UT Health Houston
They buy them.

UT Health San Antonio

d. Are practice teeth purchased at the beginning of the year, one at a time through the bookstore, or purchased by the class?

LSUSD
Supplied at beginning of the school year. Can be purchased one at a time through the bookstore.

University of Mississippi

University of Oklahoma
Replacement teeth are purchased as needed from the student store.

University of Tennessee
Initially purchased by the class and then can be bought separately as well.

UT Health Houston
They have a supply in their kit and then buy them individually when the need them.

UT Health San Antonio

e. How many teeth are given for each exercise?

LSUSD
4 to 6

University of Mississippi

University of Oklahoma
One tooth is provided per project.

University of Tennessee
Two

UT Health Houston
As many as needed to get a clinically acceptable prep.

UT Health San Antonio

f. Do students get a grade for each project?

LSUSD
Yes, (lab exam and practical exam for each project).

University of Mississippi

University of Oklahoma
Yes, the majority of the time the students receive a grade for each project.

University of Tennessee
Yes

UT Health Houston
Yes

UT Health San Antonio

g. Would you be willing to share grading criteria that you provide to students?

LSUSD
6.43 Quality Point System for Grading

Once the procedure is completed and graded by the instructor, the score will be recorded and credit given for the restoration. Each grading step will be evaluated in 1 to 4 whole numbers (any fractions or decimal numbers will be truncated) as follows:

Score Definition

1 Clinical Unacceptable/Irreversible:

(i) Critical errors make this part of the procedure (prep or fill) unacceptable and, even when treated further, will result in poor quality service for the patient,

(ii) the student fails to diagnose obvious dental disease which results in irreversible harm/potential harm to the patient's dental health or the student shows disregard for the patient's systemic health conditions resulting in harm/serious potential harm to patient,

(iii) The student exhibits carelessness and very poor clinical judgment in this part of the procedure.

Some examples of critical errors:

Prepping wrong Tooth/surface	Remaining caries
Gross adjacent tooth damage	Untreated pulp exposure
Gross soft tissue damage	Mechanical Exposure
Debonded/movable restoration	Unrecognized exposure

Others **as discussed by Attending Faculty**

IMPORTANT:

A score of **one** will be applied to any step a student fails to have all 3 steps checked or graded by the clinic instructor(s).

2 Clinical Unacceptable/Correctable restorations without replacement:

(i) This part of the procedure has a major error or errors, but may be corrected or redone with no permanent damage or it is the instructor's judgment that, if the student continues with the prep or fill procedure, the result will be clinically unacceptable or require a major correction.

(ii) The student demonstrates lack of clinical judgments in the fundamental concepts of diagnosis or treatment.

(iii) The student repeatedly asks a faculty member's advice in rendering clinical judgments that should be well within the student's understanding and judgment for this stage in the student's career.

(iv) The student demonstrates severe lack of confidence in his/her own ability to make clinical decisions.

3 Very Good/Clinically Acceptable:

(i) This part of the procedure (prep or fill) meets the minimum criteria to be clinically acceptable. However, minor changes may be necessary to improve the quality of the final product.

(ii) The student failed to recognize clinical errors needing correction.

(ii) The student demonstrates an acceptable level of clinical decision-making ability. (iii) Student still appears to be somewhat unsure when making some treatment decisions and requires moderate faculty input to meet minimum prep or fill criteria.

(iv) Student may make minor errors in diagnosis, treatment, and clinical decision-making.

4 Clinically Superior:

(i) This part of the procedure (prep or fill) exceeds all criteria and needs no further refinements.

(ii) The student accomplished this part of the procedure by demonstrating comprehensive theoretical knowledge and exceptional clinical ability and judgment.

(iii) The student is able to handle difficult clinical situations with skill and produce acceptable clinical results.

(iv) The student accomplished this part of the procedure without the need of any faculty input. However, when the student feels the need for faculty input, the student is able to articulate reasonable approaches to complex clinical situations with minimal faculty input to meet superior prep or fill criteria.

(v) The student demonstrates superior clinical judgment in the areas of diagnosis and clinical treatment.

(vi) The student demonstrates a high level of confidence in his/her decision-making ability, while knowing his/her own limits and sensing when consultation from a specialist is indicated.

(vii) Student demonstrates superior judgment in evaluating the total patient and assessing treatment needs.

(viii) When the student requires faculty input and is able to articulate reasonable approaches to complex clinical situations, minimal faculty input is allowed.

IMPORTANT:

1. Any restorative procedure on which a 1 or 2 is earned in ANY of the GRADING STEPS **will not qualify** as a Clinical Restorative experience, or one that is needed to challenge a competency exam, or as one of the required Miscellaneous restorations. However, the Quality Points earned will be counted toward your grade point average. ALSO, the clinical procedure **must also be corrected or repeated** to the satisfaction of the clinical instructor. If a student neglects to replace or repair a defectively placed restoration that they originally placed they will receive an **F for Professionalism** and will be reported to APAC for patient abandonment.
2. **A restoration that needs to be redone by the same student** that placed the original restoration **will not count a second time for quality points or as a miscellaneous restoration** unless the restoration is being redone due to tooth fracture.
3. Marginal or poor performance as shown by repeated low grades indicating deficiency in knowledge or clinical skill may result in removing the student from

clinic at the discretion of the Department Head until satisfactory remediation is obtained. Deadline dates still apply to students removed from clinic.

University of Mississippi

University of Oklahoma
Yes

University of Tennessee

UT Health Houston
Yes

UT Health San Antonio

h. How many skill assessments are used?

LSUSD
D3 Clinical Operative:
The **minimum formative skills assessment** per Clinical Experience Category that must be earned is as follows:
Class 2 complex amalgam restoration Category: minimum of **21 QP's** (approximately 3 restorations) before summative/competency evaluation.
Class 2 complex composite resin restoration Category: minimum of **28 QP's** (approximately 4 restorations) before summative/competency evaluation.
Class 3 or Class 4 complex composite resin restorations Category: minimum of **28 QP's** (approximately 4 restorations) before summative/competency evaluation.
Miscellaneous restoration Category: minimum of **12** qualified restorations.
Required **Summative/competency evaluations:**
1 Class 2 complex amalgam restoration
1 Class 2 complex composite resin restoration
1 Class 3 or Class 4 complex composite resin restoration

D2 Clinical Operative:
The **minimum formative skills assessment** per Clinical Experience Category that must be earned is as follows:
2 Class 1 amalgam restorations
2 Class 1 composite restorations
3 Class III composite restorations
3 Class 5 restorations (choice of composite, RMGI, or amalgam)
5 Miscellaneous Class 1, 2, 3, or 5 restorations using any type of appropriate restorative material

D4 Comprehensive Care Clinic Course:
In the Operative Restorative Dentistry part of the Course (9.46% of final grade), 35 Miscellaneous Class 1, 2, 3, 4, 5, or 6 restorations using any type of appropriate restorative material will earn a "C", 40 will earn a "B", 45 will earn an "A".

University of Mississippi

University of Oklahoma
Six skills assessments per preclinical course

University of Tennessee

UT Health Houston
The skills assessment is done in two parts:
PART ONE:
Students will prep a Class II on Kilgore situation tooth #30. Make the ideal MO preparation and write on their grading sheet the modification request to finish caries removal.
PART TWO:
Students will finish caries removal on the Kilgore situation tooth #30. Show to instructor to check the final preparation before restoring with composite.

UT Health San Antonio

i. **How are they graded?**

LSUSD
4(A) – 3(B) – 2(C) – 1(F) of the (i) Preparation and (ii) Restoration. The average of the 2 grades is then recorded.

University of Mississippi

University of Oklahoma
They are graded anonymously by multiple full-time instructors. The grades are averaged. If the individual instructor's grades fall outside of a 10-point range, the faculty review the typodont as a group to identify why the grading was outside our acceptable range. This is one method that we use to standardize our grading efforts.

University of Tennessee

UT Health Houston
Group graded

UT Health San Antonio

3. **Are there minimum requirements for types of restorations, numbers of procedures, Axium points or other criteria that will determine clinical operative grades?**
    a. **Are students allowed to trade patients to meet requirements?**
    b. **Is there a system in place that matches patient need for treatment with students need for experience?**

LSUSD
Yes
Yes, although it's more of an "outsourcing" than a "trade".
It is possible through our Patient Care Coordinator/mini clinic system.

University of Mississippi

University of Oklahoma
Our third year clinical course does not have a minimum number of required procedures as part of the grading criteria for the course.
Yes, we now utilize a "vertical team" clinic model that allows members of the same team to treat any of the patients in their team (with the permission of their Group Practice Director).
The Group Practice Director is responsible for assuring that the students in their group receive the patients that are appropriate for their specific needs.

University of Tennessee

UT Health Houston
Yes
Unfortunately, (or fortunately, depends on who is looking) yes.
PCC, GPD, and FA

UT Health San Antonio

4. **How does your school manage struggling students?**
    a. **Is paid tutoring available to students?**
    b. **How many students are allowed accommodation for examinations?**
    c. **Are mental health services available/used at your school?**

LSUSD
Course director referral to the APAC committee and the Associate Dean for Academic Affairs.
No

A very small number (1-3) per year for didactic courses only. They are approved by an Associate Dean for Academic Affairs.
Yes, and for faculty and staff too.

University of Mississippi

University of Oklahoma
We try to identify them by having instructors file Skills Progress Reports for students who are struggling in clinical or preclinical courses. These are collected and retained in the Dean of Clinical and Preclinical education. These reports identify the weaknesses of the student, and must also identify what specific steps are being taken to attempt to help the student improve.
Yes, in some instances a student can receive paid tutoring.
As many as are approved for it. We have rarely had more than one or two in a class.
Yes/I don't know how often they are used (HIPPA).

University of Tennessee
Both free and paid tutoring is available to students. After the first exam, if the student is doing poorly it is free.
16 currently, that includes DDS and DH (3.6% of currently enrolled students).
Special accommodations are granted only be proper application in SASSI. CoD does not (by itself) grant special accommodations.
Absolutely. The services are available through SASSI, through UHS, and through a 24/7 mental health call in number.

UT Health Houston
Depends of the situation. Students might ask course director or faculty in charge for help. Or in another circumstance the course director or even office of student affairs may intervene.
No. However, selected students are invited to be a tutor, if they accept they are enrolled in an elective course and will receive credit.
As many as bring in proof they need them.
Yes, just do not know who effective they are.

UT Health San Antonio
Accommodation ADA Students
Time and ½ for Didactic Exams (not quizzes or practicals)
Quiet environment for exams only
DS1 – 2 students
DS 2 – 8 students
DS 3 – 3 students
DS 4 – 12 students –

5. **Have you identified internet technology that may be used by schools to advance operative dentistry education?**
    a. **Are there techniques, devices, or educational materials that you would be willing to share?**
    b. **How are new materials and devices selected and introduced to your students?**

LSUSD
No
I would if I had something to share.
Brought to the Clinic Committee for approval.

University of Mississippi

University of Oklahoma
No
Sure, not sure what exactly someone would want, that they wouldn't already have.
We have a materials and instrument committee. If functions as well as most committees do.

University of Tennessee

UT Health Houston
Some YouTube videos are pretty good.
Class I Amalgam Restoration: Instructional Video
www.mededportal.org/publication/9498
Class I Composite Restoration: Instructional Video
www.mededportal.org/publication/9505
Class I Preparation: Instructional Video
www.mededportal.org/publication/9396

Clinical Affairs Committee approves, then they are placed in clinic and preclinic.

UT Health San Antonio

6. **What are your policies and procedures on student dismissal, repeating the year or reentry after an extended leave of absence?**

LSUSD
The Associate Dean for Academic Affairs and the APAC committee will review such a situation and will make a recommendation to the Dean. The student has the right to appeal any decision made. If a student resigns from school "in good standing", they have a very good chance to be offered another chance to complete their education.

University of Mississippi

University of Oklahoma

I was told that our specific policies for student dismissal, repeat of the year, and re-entry after leave are currently all being reviewed and updated. These written policies were not made available to me at this time.

Here is some general information: Students are sometimes allowed to repeat the year. Usually due to a personal problem that caused them to miss a large portion of an academic year, or due to an academic problem such as multiple failing grades in courses or dropping below a 2.5 cumulative GPA. The decision as to whether a student will be dismissed from the program, or allowed to repeat an academic year, is decided by the Periodic Assessment Committee. This committee is made up of the division chairs, course directors from all courses offered during the previous semester, Dean for Preclinical and Clinical Education, Dean for Quality Assurance and Compliance, and Dean of Research.

University of Tennessee

One F-and multiple D's, multiple F's and/or Cumulative GPA below 2.0 triggers discussion for dismissal or repeat of year. If a student has already repeated the year or a term, then dismissal is a more likely scenario. After a lengthy leave of absence, students are usually given a manikin-based hand-skill exam to determine clinic readiness. If failed, remedial work in the lab is prescribed prior to working on patients.

UT Health Houston

There is a specific E&P process for repeat or dismissal. If the committee votes for a student to repeat or be dismissed, they have the right to appeal. It is brought before the Appeals committee. This committee is made up of the E&P chairs of all the other committees that were not involved in the original decision and one other random faculty, plus the Chair of the committee, the Associate Dean for Academic and Student Affairs, and the administrator of the academic and student affairs department. The student is allowed to present any information they want the committee to hear. Usually it is info that was not presented at the E&P meeting since that decision is solely based on academic performance. The committee will vote to either uphold the E&P Committees decision or to not uphold. If it is not upheld, we then make a recommendation from the committee. Our decision along with the original decision goes to the Dean who ultimately either upholds the original decision or goes with the appeals committee decision.
As far as re-entry, if they went on leave of absence in good standing, they can come back after the leave, usually retaking the year they were in when the leave started.

UT Health San Antonio

Leave of Absence
Students in good academic standing who wish an extended leave of absence for extenuating physical or personal reasons must submit a written request to the Dean

stating reasons for such a request, the period of time involved, and intentions concerning resumption of dental studies. The Dean will consider such requests on their individual merit.

Generally, a leave of absence shall not exceed one academic year. Any additional leaves of absence must be reviewed and recommended by the Academic Performance Committee and approved by the Dean. The Dean's Office must be notified of intentions to re-enroll by the first day of April prior to the next academic year. Students who take a leave in the fall of the junior year will be required to report the sophomore year in order to regain the clinical skills and knowledge to provide patient care as a junior.

Readmission
Readmission to the freshmen year requires that a student apply again according to the procedures required for first-time applicants and be accepted in competition with other applicants for that year. Readmission into the sophomore, junior, or senior years is contingent upon available space in the class.

Applications for readmission after a leave of absence must be in the form of a written request to the Dean and must include satisfactory evidence that the condition or conditions necessitating the absence have been corrected and that the student is able to resume dental studies. The request must be submitted no later than April 1 of the year the student wishes to be reinstated.

Southern CaMBRA Coalition
Agenda 2019

Thank you in advance for your participation in the 2019 Southern CaMBRA agenda. This agenda is based in part on responses to agenda questions from the previous year – it can be thought of as a continuation of a conversation regarding caries management education and clinical implementation at our schools.

1. **Do you run a study club related to cariology at your school?**

LSUSD
We do not.

University of Mississippi

University of Oklahoma
No

University of Tennessee

UT Health Houston
No

UT Health San Antonio

2. **Do you have clinical protocols written out for extreme risk, high risk, moderate risk and low risk patients? How do you execute its implementation?**

LSUSD
We do not.

University of Mississippi

University of Oklahoma
Yes, the protocols are listed as documents on our Clinic Software. The students can download the documents and discuss the preventive and restorative treatment options with the patient.

University of Tennessee

UT Health Houston

Yes, for High, Moderate, and Low Risk patients. This protocol relates especially to in-office and prescription fluoride modalities. At one point in time, these protocols were accessible in Axium; not sure if they still are. Implementation varies dependent on faculty.

UT Health San Antonio

3. **Do you have a drop-down list associated with treatment tress in Axium/health portal associated with various risk levels?**

LSUSD
We only have a Caries Risk Assessment Form.

University of Mississippi

University of Oklahoma
No

University of Tennessee

UT Health Houston
No, not in the sense of having macro-codes for treatment. Management guidelines for each risk category have historically been available (see question 2 above), but utilization is not consistent.

UT Health San Antonio

2019 CODE Meeting Attendee's

Name	University	Phone	email
A.C. Liles III, DDS	Louisiana State U Health Science Center School of Dentistry	504-941-8257	alile1@Lsuhsc.edu
F. Thomas Giacona, DDS	Louisiana State U Health Science Center School of Dentistry	504-941-8257	fgiaco@Lsuhsc.edu
Steve E. Magee, DDS	University of Mississippi Medical Center School of Dentistry	601-984-6030	smagee@umc.edu
Pia Chatterjee DDS	University of Mississippi Medical Center School of Dentistry	601-984-6030	pchatterjee@umc.edu
William L Boteler, DDS	University of Mississippi Medical Center School of Dentistry	601-984-6030	wboteler@umc.edu
Mitch Hutto, DDS	University of Mississippi Medical Center School of Dentistry	601-201-2791	dhutto@umc.edu
Terry Fruits, DDS	U of Oklahoma College of Dentistry	405-271-5735	terry-fruits@ouhsc.edu
Zack Dacus, DDS	U of Oklahoma College of Dentistry	405-271-5735	zachary-dacus@ouhsc.edu
Troy Schmitz DDS	U of Oklahoma	405-271-5735	tschmitz@ouhsc.edu

	College of Dentistry		
William R. Callahan, DDS	U of Tennessee College of Dentistry	901-487-7540	wcallaha@uthsc.edu
Mojdeh Dehghan, DDS	U of Tennessee College of Dentistry	901-448-1314	mdehghan@uthsc.edu
Jeffrey Brooks, DDS	U of Tennessee College of Dentistry	901-568-4887	drbrooks@uthsc.edu
Gary Frey, DDS	U of Texas School of Dentistry Houston	713-486-4286	Gary.N.Frey@uth.tmc.edu
Juliana Barros DDS	U of Texas School of Dentistry Houston	713-486-4564	Juliana.Barros@uthh.tmc.edu
Shelly Patel DDS	U of Texas School of Dentistry Houston	713-486-4362	shalizeh.patel@uth.tmc.edu
Marilia Sly, DDS	U of Texas School of Dentistry Houston	713-486-4362	Marilia.M.Sly@uth.tmc.edu
Joseph P. Connor, DDS	U of Texas Health SC School of Dentistry San Antonio	210-567-3693	connorj@uthscsa.edu
Karen Troendle, DDS	U of Texas Health SC School of Dentistry San Antonio	210-567-3653	troendle@uthscsa.edu
Daniel Lavin, DDS	U of Texas Health SC School of Dentistry San Antonio	210-428-1618	Lavind@uthscsa.edu

Janet Harrison, DDS	U of Texas Health SC School of Dentistry San Antonio	210-567-3653	lgeo1964@gmail.com

Fall 19

Consortium of Operative Dentistry Educators (CODE)

2019 National Agenda

Prepared by:

Gary L. Stafford DMD – National Director

staffoga@ohsu.edu

Regional Meeting Reporting/National Meeting Information

The 2019 National Agenda was established after a review of the suggestions contained in the reports from the 2018 Fall Regional meetings, National CODE Meeting and from the Regional CODE Directors. Previous National agendas were reviewed to avoid topic duplication. Inclusion of a previous topic may occur for discussion from the aspect as to what has changed and the response/action taken and/or the outcome.

Thank you to the Regional CODE Directors and the membership for making recommendations to establish the National Agenda. Each Region is encouraged to also have a Regional Agenda.

Each school attending a Regional Meeting is requested to bring their responses to the National Agenda in written form AND electronic media. This information is vital to timely publication of the National Annual Report.

Continue to invite your colleagues, Dental Licensure Board examiners, and your Military and Public Health Service colleagues who head/instruct dental education programs to your Regional meetings. The strength of the organization lies in its membership.

Each Region should select next year's meeting site and date/tentative date during your Fall Regional CODE meeting so this information may be published in the Annual National Report and on the CODE website.

The Regional meeting reports are to be submitted to the National Director **in publishable format** as an email attachment.

The required format and sequence will be:

1. **CODE Regional Meeting Report Form***
2. **CODE Regional Attendees form***
3. **Summary of responses to the National Agenda**
4. **Individual school responses to the National Agenda**
5. **The Regional Agenda summary and responses**

***(copies may be obtained from the CODE website: www.unmc.edu/code or within this document)

Send an electronic copy of the final regional report via an email attachment to the National Director (staffoga@ohsu.edu) within thirty (30) days of the meetings conclusion.

National CODE Meeting:

The meeting will be held Thursday, February 20th, 2020 from 5:10 – 6:30 pm in the Parkside Room at the Drake Hotel, 140 East Walton Place in Chicago, IL. Any member who would like to present or who has suggestions for speakers should contact their Regional Director or the National Director for more information.

2020 ADEA Section on Operative Dentistry and Biomaterials Meeting:
The meeting will be held during the ADEA Annual Session & Exhibition, March 14-17, 2020 in National Harbor, MD.

National Directory of Operative Dentistry Educators:
The CODE National Director maintains the National Directory of Operative Dentistry Educators as a resource for other dental professionals. It is critically important that this information be as current as possible.

You may update your university's directory listing on the CODE website at www.unmc.edu/code or by sending an email directly to the National Director at staffoga@ohsu.edu.

In an effort to keep the National Directory up to date, please have each school in your Region update the following information:

1. *School name and complete mailing address*
2. *Individual names: (F/T Faculty), phone number and email address of F/T Faculty who teaches operative dentistry.*
    a. This could be an individual who teaches in a comprehensive care program, etc..., if there is no defined operative section of the department.

Your help and cooperation in accomplishing the above tasks helps save time and effort in maintaining a complete National Directory and publishing the Annual National Report in a timely fashion.

All my best,

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director
Senior Associate Dean for Academic Affairs
Oregon Health & Science University
School of Dentistry
2730 SW Moody Ave
Portland, OR 97201
staffoga@ohsu.edu

2019 Regional Meeting Hosts

Region/Dates	University/Address	Host Name/Phone/email
I – September 26-27, 2019	University of Nevada, Las Vegas School of Dental Medicine 1001 Shadow Lane MS 7415 Las Vegas, NV 89106	Davin Faulkner 702.774.2559 davin.faulkner@unlv.edu Bernard Hurlbut 702.774.2687 bernard.hurlbut@unlv.edu
II – September 19-20, 2019	A.T. Still University Missouri School of Dentistry & Oral Health 1500 Park Ave St. Louis, MO 63104	Brandon Crivello 314.685.3573 brandoncrivello@atsu.edu
III – October 24-25, 2019	University of Texas Health Science Center at San Antonio School of Dentistry 7703 Floyd Curl Drive San Antonio, TX 78232	Joseph Connor 210.567.3693 connorj@uthscsa.edu
IV – October 3-4, 2019	Indiana University School of Dentistry 1121 W Michigan St Indianapolis, IN 46202	Michele Kirkup 317.278.3398 mkirkup@iu.edu
V – September 16-17, 2019	New York University College of Dentistry 345 E 24th St New York, NY 10010	James Kaim 212.998.9720 Jmk2@nyu.edu
VI – October 16-18, 2019	East Carolina University School of Dental Medicine 441 Brauer Hall Greenville, NC 27834	Roopwant Kaur 252.737.7148 kaurr@ecu.edu

2019 National Agenda

I. Curriculum

a. How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?

Summary: The majority of the schools responded with the inclusion of more integrated examinations with basic science material and case based questions.

Schools:

OSU: OSCE with D4 students;
UIC: Changed the curriculum in 2011, small group learning with problem and cases, decreased specific basic science courses (integrated into cases for D1 and D2 year). Moved up some pieces in the curriculum, basic science integrated in clinical courses. 20% of all examination should be integrated; collaboration with other discipline.
Michigan: case based learning examinations
Midwestern: Integrated curriculum, D3 OSCE, D4 general comprehensive exam, no major changes
UDM: integrated preclinical courses with basic sciences, plan to have integrated examinations, seminars with cases, comprehensive examination
Western: No formal training, semi-integrated curriculum, more overlap with disciplines
Pitt: Spreading out basic sciences, may plan a review prior to board exam, case based examinations planned,
WVU: integrated examination mapping out where the content is taught in the curriculum, online courses (mapping course objectives for collaboration of clinical and basic sciences).
I**U:** Comprehensive examination after D1 year (integrated and station exam), basic sciences integrated clinical cases, group learning activities (basic sciences, integrated treatment planning), case based scenarios,

b. How many attempts do students get to remediate an exam, a clinical procedure, and a course?

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Summary: Remediation is different for each course for the majority of the schools. Faculty tend to rotate on a weekly basis or by a rotation schedule.

Schools:

IU: b. Remediation is different for each course, clinical does not have a formal structure, competencies do have a redo, students can only remediate 3 courses within the D1 and D2 curriculum. c. Same faculty rotate in the preclinical courses, also have D4 student instructors

WVU: B. varies dependent on the course, fail a performance assessment, remediate and can only retake 1 exam to a 70%. Didactic exam are not remediated. For clinics, pull the student out of clinic if a student is performing poorly and will work with the student and director.
c. Faculty rotate through the preclinical courses, rotation schedule

Pitt: Clinical competency can be redone, but if fail again the director sets up a remediation protocol. Course directors determine the remediation. C. faculty rotate after the first semester.

Western: B didactic or preclinical courses do not have remediations, but will meet with students, If a student fails a course= failure = remediation exam and grade reported as a supplemental examination was needed. C. preclinical courses have faculty rotations

UDM: B. course directors determine the remediations, written no remediation, lab projects/practicals must see course directors and develop a plan, max score is 70%, sign a contract that they understand the terms of the syllabus, c. rotate the faculty every week,

Midwestern: b. clinic procedures do not have remediations c. rotate instructors quarterly

Michigan: clinical competencies can be taken again and ask clinic directors to be involved, retake the examination, which the students fail, b. faculty rotate frequently, 70% grad residents help.

UIC: Remediation policy (college wide) assessment failure=course directors can single remediation of any assessment; if the remediation is failed than it is becomes a component failure (failed course, or failed remediation attempts). For component failure, repeat the remediation, repeat the year. C. faculty rotate every 5 weeks, daily assignments

Ohio state: lecture is no remediation, labs = build remediation into the course, aim high course includes remediation and low performers; designated lab time when faculty and students have time built into the schedule. Clinic assessment can be remediated c. faculty rotate every 2 weeks

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
    i. If not, what do you contribute your success to?
    ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3
    i. What types of experiences are the most difficult to find in your patient pool?

Summary: The majority of schools reported difficulty attracting patients for crown, removable, and endodontic experiences. Some schools report issues with parking and high treatment costs.

Schools:

OSU: FPDs, crowns, and complete dentures may be lacking; students share patients; work as a team D3/D4 students
UIC: No problem due to Medicaid patients; implants and rpds are lacking, directors make sure the experiences are balanced and some pairing of students (dentures).
Michigan: due to parking issues,
Midwestern: pedo patients are difficult to find, other procedures are good.
UDM: Endo and crowns/fpds, D3 and D4 students are paired and sharing with other clinical groups
Western: Prosth, especially crowns, Pedo, Endo ; share patients
Pitt: maintaining patients is tough due to time, not enough clinical appts, students pair up for implants, RPDs are short
WVU: patients leave due to costs, fixed (FPD and crowns), endo, Perio for SRP; pairing students D3/D4
IU: RPDs, Endo

f. Describe your screening/patient admissions process?
g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?
    i. If so, please describe?
h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?
    i. If your state MLP's, who is responsible for the education? Please describe?
    ii. Do the students, faculty, and local dental community embrace the concept?
    iii. Would your institution be willing to provide this instruction?

Summary: For many schools, the process typically includes medical history, radiographs, and assignment of patient to student. The average number of patients screened is 20 per day. Some schools are planning changes, while others are not. Majority of schools are not investigating or are not interested in mid-level providers.

Schools:
OSU: 18 per session. Screening is patient intake, new patient appt usually within a few days/weeks, emergencies are another clinic. Students may keep patients, or may be given to new student who need it more. Mid-level providers are not approved in Ohio.
UIC: 16 patients per session, once patient is deemed appropriate the patients are given to students who need such experiences. No mid-level providers.
Michigan: Clinic coordinators assign the patients to students based on need. No mid-level providers at school. 20 screening patients a day.
Midwestern: 40 patients per day, group leaders can allow screening student to keep patients or give to students in need of patients. No mid-level providers.
UDM: Screening process: student gets patient screened, but it can be shared with other students. Started planning but due to funding the incorporation was not pursued further. 20-25 patients per day
Western: 2 dedicated faculty help the students perform the screening, 10 patients per day; mid level providers = restorative dental hygienists are present but has not made a significant impact.
Pitt: Screening (students rotations), 16 per session. Brief medical history, brief exam, radiographs are taken. Staff give the patients to the team leaders which distribute the patients to the student. No Mid-level providers.
WVU: Initial assessment=team leaders oversee, med hx, radiographs, problem list, one person tracks what students need and patients are assigned based on need. MLPs: none in state,
IU: student rotations includes med hx, radiographs; change includes leaders will be assigning patients to students based on their educational needs. No mid-level providers.

II. Cariology

a. What terminology does your school use to define and categorize dental caries?
b. How does your school calibrate its faculty for caries diagnosis?
c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Summary: The majority of schools use the ICDAS and/or ADA guidelines to define and categorize dental caries. Calibration typically occurs over lunch time meeting and/or during retreats. Overall, the cariology curriculum is integrated into the preclinical operative courses at most schools.

Schools:

IU: International dental caries, ICDAS, ADA guidelines. Calibration of full time faculty by attending sessions. D1 cariology and perio are integrated, D3 group learning activities.

UDM: ICDOS, calibration in clinic with seminar, integrated curriculum within the first two years.

Midwestern: monthly and quarterly meeting for calibration, ICDAS,

Michigan: ICDAS, integrated with preclinical curriculum, calibration day,

UIC: ADA, ICDAS, treatment planning course helps reinforce, risk assessment form in axiUm, calibration session 2 times a year at most (at lunch), comprehensive courses, clinical aspect by case reports

OSU: operative 1 course = 5 hours, calibration at lunch, ICDAS

WVU: ADA classifications, zones, integrated starting with prevention and risk assessment, calibration=retreats, ICD10 codes

Pitt: ICDAS, calibration sessions (lunch time), integrated cariology into preclinical operative course

Western: ICDAS, active, arrested; calibration is needed more, needs more reinforcement of what is taught in preclinical courses to clinics.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?
ii. Sandwich technique?
iii. Bulk fill technique?
iv. Resin Modified Glass Ionomers (RMGI)
v. Amalgam?
    1. % of direct restorations?
    2. Bonded or unbonded?
vi. Air abrasion?

Summary: The majority of schools do not teach cusp replacement with composite resin. See schools responses for sandwich techniques and RMGIs. The majority of schools are not teaching the bulk fill technique. The average percent of amalgam used in the schools was 15%, and most do not used bonded technique. Also, air abrasion is not used often in the majority of the schools.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?
    i. Has it replaced gold in your clinic?

d. Who performs molar endo?
    i. Pre-doc students %, Endo Residents %, Endo Faculty %

e. Do you utilize bond strength testing exercises?
    i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? In the clinic?
    i. If no, why not?
    ii. If Yes, what system?

Summary: The majority of schools did not report an increase in milled partial coverage restorations. The clinicians who perform molar endo varies from each school. Many schools do not have bond strength testing and half the schools use electric handpieces while the other half does not. Brassler is the most common brand.

Schools:
UDM: Scanning but milling in the lab. 23% predoc, Yes for bond strength testing (BST), Yes electric handpieces (EP)
Midwestern: Moving towards ceramic. 100% molar endo, No for BST, Yes for electric handpieces
Michigan: Cerec system-Ceramic crowns are majority, Endo some, no EP
UIC: Scanning and milling (Trios), molar endo predoc (1 molar experience) and residents, no BST, No EP
OSU: Limited milling, cerec is used in the preclinics, Zirconia used often, Endo (3 canals, no molars for predoc), No BST, Yes for EP,

IU: Limited for partial coverage, no molar endo, some BST in past, No EP,
WVU: Cerec units not as many partial coverage, some gold crowns, more zirconia, no predoc molar endo, No BST, Yes for EP
Pitt: Cerec 5, increasing crowns and partial coverage has not replaced crowns, $50 molar endo for predoc 15% by predoc, 80% of molars, BST no, EP no
Western: Cerec, not replaced gold, predoc do all molar endo, no BST, electric for endo only

IV. Student Assessment

- **a.** Does your institution have an international dental program?
  - i. If yes, does your school utilize a bench test? Please describe.
  - ii. If yes, how many students are enrolled?

Summary: The majority of schools have an international program and most report a 2.5 or 3 year program. Some schools utilize bench testing (operative and prosth procedures). The number of students enrolled varies from 6 to 52.

Schools:
IU: Yes for IDP, yes for bench test (amalgam, fpd, adex criteria) 14 to 16 IDP student accepted
OSU: NO
UIC: Yes for IDP, 52 IDPs accepted, no bench test,
Michigan: Yes, 18 students, no bench test, accelerated program and then integrated within
Midwestern: No
Western: Yes, 20 IDPs, bench test with operative and prosth (going to 3rd year program).
Pitt: Yes, bench test (amal, PFM) and interview, accept 6-8 per year, 2 years and a few months
WVU: no

- **b.** Do you evaluate students using OSCE's?
- **c.** Describe your primary didactic testing methodology
  - i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
  - ii. Pros/cons to the one you are primarily using?
  - iii. Are you investigating other methods?
    1. If yes, which one(s)?

Summary:
Many schools evaluate students using OSCEs. Many schools use ExamSoft. Overall, schools had mostly positive comments for using ExamSoft versus other methods.

Schools:
WVU: Prosth OSCE (end of D2 year), lab is graded by hand, DA (digital assessment) for written exams, password protected, if multiple attempts, lockdown the computer, instant reports for faculty,
Pitt: No OSCE, hand-grading, Examsoft
Western: No OSCE, pen/paper, no EA,
Midwestern: D3 OSCE comprehensive, Examsoft and scantrons,
Michigan: OSCE, scantron, canvas,
UIC: OSCE behavioral science, Examsoft,

OSU: 4th year OSCE, clinical entry exam for D3, scantron, test run with examsoft,
IU: Prosth OSCE, OSCE behavioral sciences, Review of D1 Courses OSCE, Examsoft, canvas,

V. Administration

- **a.** What is your policy on attendance?
  - i. Please provide the actual attendance policy statement.
  - ii. Who is responsible for tracking attendance?
  - iii. How effective is your policy?
- **b.** What is your policy with student complaints about grades?
- **c.** What is your policy on student absences?

Summary: For the majority of schools, attendance is mandatory. However, many state that attendance is difficult to monitor or receive support from administration regarding student absences. Student complaints regarding grades are typically managed by the course directors. Some schools have professional points which students can lose points for absences or unprofessional behavior.

Schools:

Western: Attendance is mandatory for all courses, miss more than 10% will need to medical note. Missed exams and projects must be made up; if not excused for an assessment, student will receive a 0. Course directors are responsible. Student grades – course directors would provide the feedback; pass/fail for lab grades.
Michigan: lose points on the course if students miss, documented online, exceed 3 absence will receive an incomplete grade for the course. Grades: review the examinations
Midwestern: Mandatory attendance, Tophat, sign in sheets, Grades to course directors – appealing is possible Student can have 3 absences and then grade deduction. Professional points 100 (rubric).
OSU: Attendance is expected. Course directors, excused absences through academic affairs. Grades: course directors should be first contacted, no formal policy for grade complaints.
UIC: Attendance policy is based on expectation for each component (clinic, lab, lectures); lectures are recorded and policy is at the discretion of the course director. No excused absences, students do not make up anything unless the student has a leave of absence. All courses have a professionalism component and deduct points for absences. Daily engagement points measures preparation, IC, time management. Clinic have 2 personal days. Grades: course directors address the concerns, no changes typically but there is a formal policy.
WVU: Attendance is mandatory, 2 unexcused absences is a letter grade drop, 4 tardys = letter grade, sleeping is unexcused absence. Clinic is 95% attendance tracked by hours, 5% medical appt, studying, lab work. Can lose clinical time. Course directors to chair to AA.
IU: Required. Course directors' discretion. Clinical 70% attendance. Not effective. Grades: Test review committee can send challenges to directors.

d. Regional licensure exam
   i. What exam(s) does your school host?
   ii. What's the general consensus towards the benefits of the exam?
   iii. What's the general consensus on the elimination of the exam?
   iv. What are the alternatives?

Summary: Majority of schools host the ADEX or CDCA regional board examination. Many schools state that faculty and students feel that the patient examination may not be ethical due to small size of the lesions. Alternatives to the boards may include OSCEs or portfolios.

Schools:
Western: No regional exam; national exam with no practical/patient component; written and OSCE
Michigan: Regional exam (ADEX), 40% support, but patient exam may not be ethical due to small size of lesions. Alternatives: none
Midwestern: ADEX, WREB, and CRDTS; Benefits-older dentist want to keep them, need patient based – but ethical concerns for patients,
OSU: CDCA only; no consensus, ethical concerns regarding cariology EBD,
UIC: CDCA, students are not in favor, ethical concerns; Alternatives: OSCE or portfolios,
WVU: SRTA, consensus is not favor of eliminating the board and may become more tough
IU: CDCA, all the same concerns

e. Discuss opinions on realigning the CODE regions.
   i. Are there schools you feel should be in your region that are not?
f. Discuss and describe suggestions for improving CODE.

Summary: Overall, the Great Lakes Region IV agree that we like to continue to have the same schools and would prefer no changes to the realigning the regions. Some suggestions includes showing a regional map of the CODE schools.

Individual school responses to the National Agenda

2019 National Agenda

I. Curriculum

- **a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?
- **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course?
- **c.** Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?
- **d.** Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?
    - i. If not, what do you contribute your success to?
    - ii. If so, please describe the issues
- **e.** Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? 3
    - i. What types of experiences are the most difficult to find in your patient pool?
- **f.** Describe your screening/patient admissions process?
- **g.** Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?
    - i. If so, please describe?
- **h.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?
    - i. If your state MLP's, who is responsible for the education? Please describe?
    - ii. Do the students, faculty, and local dental community embrace the concept?
    - iii. Would your institution be willing to provide this instruction?

Buffalo	No Response
Case Western	No Response
Detroit Mercy	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? UDM: We have integrated the curriculum in diagnostic sciences and Ds1 and Ds2 courses taught. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? UDM: The course directors dictate the policy of the course UDM: They cannot remediate didactic portion of exam UDM: Pre-clinical procedure, they have two

attempts to remediate the procedure, first remediation is maximum 70% and second remediation is maximum 60%, If they fail the second attempt then it goes to APC.

c. Within the preclinical courses, does the faculty rotate among the students during the course (e.g. weekly, by project)?

UDM: We have 144 students in a class, we have 15 faculties on a given day, our ration is 5:1 and there is a floater. We make our rotation schedule at the beginning of the semester, the faculty rotates weekly. The floater will work as a regular bench faculty if anyone is missing from the regular schedule. If there are more than one faculty absent then our ration goes higher, usually bench faculty covers 7-9 students on that day. Most of our faculties are scheduled on Ds1 or Ds2 simlab days.

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

i. If not, what do you contribute your success to?

UDM: We are able to attract sufficient numbers of patients to our pre-doctural teaching programs.

ii. If so, please describe the issues

UDM: Total patient numbers are not the problem, the number of patients with appropriate teaching needs is a continuing concern as well as patients who have the appropriate needs but have severe financial limitations. We *Wait* till March April to see which group is lacking experiences and then transfer the patients accordingly

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

UDM: There are enough patients within the group, 90% of the experiences are met within the group.

i. What types of experiences are the most difficult to find in your patient pool?

UDM: Crown and Bridge, dentures, and RCT's are a challenge

f. Describe your screening/patient admissions process?

UDM: Our screening appointment has certain criteria, the walk in patients are seen by the pre-doc students and depending on whether it is a teaching case or not we accept

	it or refer it to AEGD,faculty practice **g.** Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? UDM: No, not at this time i. If so, please describe? **h.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? UDM: No, our school was thinking of the mid-level provider two year restorative programs. We visited Minnesota University and private clinics ten years ago where we observed their program very closely due to funding the program did not continue and we decided to increase our class size i. If your state MLP's, who is responsible for the education? Please describe? ii. Do the students, faculty, and local dental community embrace the concept? Would your institution be willing to provide this instruction?
Indiana	The curriculum is being altered in multiple locations. One of the first areas to be enhanced is after the conclusion of the first year of dental school. Lisa Willis and her task force worked this year to begin the development of the CCA (Comprehensive Curriculum Assessment) in the summer between D1 and D2 years. This is an attempt to develop ongoing assessments of the content in the D1 year that must be maintained moving forward to D2 and beyond. It included about 110 Examsoft questions and a large number of station exams. It was a collaborative effort across most D1 faculty. The intent is to continue to develop this onoing testing of the most important concepts in order to ensure they are retested and retrieved often enough to retain them in the students' working memory. --The biomedical faculty who lecture within the D1 and D2 years are working on the SABS (systems approach to biomedical sciences) courses to increase clinical correlations of the SABS content, to include the use of case-based testing. They have not yet submitted their proposal to the Curriculum Assessment Committee, but it is in development. --GLA (Group Learning Activities) has been revamped within the D3 year to create a refreshed course that asks students to incorporate the biomedical sciences along with interdisciplinary

	treatment planning in the D3 year. It begins with example cases presented by faculty and will conclude with the students developing their own presentations, evaluated by peers and faculty. --Finally, we are also working to carry biomedical concepts into 3rd year and better weave it into the curriculum through the use of rounds. I was a part of a biomedical task force integration. We have a concept that will be piloted this fall that integrates case scenarios into a rounds format. Students will have to read cases, answer multiple choice questions, then 3 essay questions as well. They will present their work to their rounds group so that everyone can learn from it. They will then have a comprehensive exam at the conclusion of the course to assess their knowledge from the case presentations. Remediation of an exam alone is completely up to the course director. For example, for tooth morphology lab, I do not make them remediate the first practical if they fail it. That said, if they fail the second practical, they will have to do some sort of remediation with me at that point. Within the fixed prosthodontics course, each student must retake and pass any practical they fail by the end of the semester during appointed times. --For clinical procedures, there is usually not a remediation protocol in place unless there is a continual problem with the student or a critical error has been made. For a clinical competency, however, the student must retake all 5 competency exams if they fail one of the 5. I don't believe there is a limit on retakes. For a course, per our handbook, each student is allowed to remediate 3 courses during their first two years of dental school. After that point, they are up for dismissal by the progress committee. Yes, our preclinical faculty and instructors (we use a large number of pre-selected D4 TA's) rotate every 2-3 weeks from bench to bench. We think this important to allow them to get to know different students within the course and be given feedback from other viewpoints. Yes, getting certain types of clinical experiences, specifically removable dentures (both removable and complete); - Yes. However, their requirements are considered minimal. Students are required to attend screening clinics where they screen patients and take all needed records (x-rays, impressions….) then they keep the patient.

	Yes, a change is planned. In the future, perhaps students don't get to keep the patients they screen and instead the cases go through a sorting mechanism by clinic directors that would assign the patients according to students' needs. We do not have MLP's currently in the state of Indiana. This really hasn't been discussed much within our institution, therefore I'm not sure how it would be received. Not sure if the school would be willing to do this; I'm sure discussions will come in the future if we find ourselves needing to consider this change.
Michigan	No written response submitted
Midwestern-Illinois	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? **Midwestern IL:** We feel our curriculum is integrated and prepares our students adequate for the INBDE. Therefore, no curriculum changes are being made geared specifically towards the INBDE at this time. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? **Midwestern IL:** Varies **c.** Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? **Midwestern IL:** Yes (quarterly, daily for lectures) **d.** Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? **Midwestern IL:** No, not for regular patients and procedures. Our difficulty lies with getting pediatric patients and procedures sufficient to provide our students with plentiful pediatric experiences. i. If not, what do you contribute your success to? For our regular patients. **Midwestern IL:** For our regular patients, our location, the quality of our facilities and our reputation are our main attractions. For pediatric patients, we struggle because of our clinic hours and the availability of other pediatric clinics in the area that can see patients at more convenient times. ii. If so, please describe the issues **e.** Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? **Midwestern IL:** Yes, see above i. What types of experiences are the most difficult to find in your patient pool? **Midwestern IL:** Pedo **f.** Describe your screening/patient admissions process? **Midwestern IL:** Patients are screened in the suites, (group practices). Each "Group Practice Leader", (we use a different term) sees the patient after the initial introduction by an assistant and the students assigned to screening. The doctor then decides if the patient is going to be accepted into the program. **g.** Is your institution planning any changes to the protocols for

	screening/patient admissions for your pre-doctoral program? **Midwestern IL:** No i. If so, please describe? **h.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? **Midwestern IL:** No i. If your state MLP's, who is responsible for the education? Please describe? ii. Do the students, faculty, and local dental community embrace the concept? iii. Would your institution be willing to provide this instruction?
Ohio State	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? We have started doing OSCE exams in the 2nd and 4th year. Not a lot of changes since we are right in the middle of accreditation visit. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? Exam: written-must follow what has been written in the syllabus. No retakes of written exams. Lab classes are broken into 2 separate courses lab and lecture. A 70% is usually considered passing in didactic courses and 2.0 in lab courses. Some course directors give a "retake" lab practical during the course. If the student still earns a failing grade they must participate in remediation and if successful they earn another grade for the course and the failing grade remains on their transcript. In didactic courses the course director has to determine the remediation process. Retest, repeat the course??? Clinical procedures: procedures are retested but fails are recorded. If three failed attempts then the students must participate in remediation. **c.** Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? Some directors rotate after projects or practicals and some directors so not rotate, no set rule **d.** Are you having difficulty attracting patients to

any of your pre-doctoral teaching programs?
    i. If not, what do you contribute your success to?
    ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? Not sure, there is sharing of patients and now we have started "teams" of Dent 3 and 4 students to help with meeting experiences
    i. What types of experiences are the most difficult to find in your patient pool? Usually crowns and FPD, some dentures.

f. Describe your screening/patient admissions process? Our process is called Patient intake. Each pt appointment is scheduled with a restorative and pathology/head and neck faculty. Patients call the college main registration number to schedule a new patient appointment if they have not been seen in the college in the last 18 months. Most patients get scheduled within a few days –week. If the patient arrives for their appointment in pain, that chief complaint is addressed before intake/ new patient visit. 16 patients are scheduled per half day. Dental and Dental Hygiene students are scheduled in "Patient Intake" as a rotation. Patients have an initial exam and then are put into a pool in the respective student clinic area and the clinic director then decides who ultimately treats the patient.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? Maybe, we are in the process of a new clinic being built and there will be 8 clinics. A final plan is still being formulated. We are testing one method and exploring other methods
    i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? Not currently, the Dental Hygiene Association is lobbying for this option.
    i. If your state MLP's, who is responsible for the education? Please describe? NA
    ii. Do the students, faculty, and

	local dental community embrace the concept? Not a lot of discussion. The ODA does not support the concept. iii. Would your institution be willing to provide this instruction? Not sure
Pittsburg	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? **University of Pittsburgh-**In the previous years, students were able to take the National Board Exam Part I after their first year. There are still ongoing discussions pertaining to the changes needed in the curriculum to better equip our students for the INBE. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? **University of Pittsburgh-**One attempt for remediation of an exam. For a clinical procedure there is no set rule. Students have many times have had to redo a procedure, however it would be up to the supervising faculty as to whether the student has the ability to perform the procedure with a good clinical outcome. Remediation for a course would involve one chance. **c.** Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? **University of Pittsburgh-**No. Faculty only rotate after a semester (course) is complete. **d.** Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? **University of Pittsburgh-**No, we are screening enough patients. However, due to our inefficiency in providing timely patient treatment we have a tremendous amount of difficulty maintaining patients**.** i. If not, what do you contribute your success to? ii. If so, please describe the issues. **University of Pittsburgh-** After patients come in for a ten minute screening appointment they are assigned to a student. The student in many cases cannot see the patient for about a month for a comprehensive oral exam. After the oral exam appointment, the patient's second appointment is a complete periodontal evaluation. Treatment planning is usually the following appointment. Many times patients are discouraged at this point and leave the dental school to receive treatment elsewhere. **e.** Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? **University of Pittsburgh-** Students do share patients in order to meet the necessary

	clinical experiences. i. What types of experiences are the most difficult to find in your patient pool? **University of Pittsburgh-**RPDs **f.** Describe your screening/patient admissions process? **University of Pittsburgh-** Patients are scheduled a screening appointment. This appointment lasts for about 20 minutes in which they complete a short medical history, have their oral tissues checked, have a quick examination of the teeth and then it is decided which radiographs are needed. Radiographs are then taken in the radiology department, the patient is registered and then dismissed. Within a month after the screening appointment the patient is assigned to a student. The patient is then scheduled for an appointment based upon the student's schedule. **g.** Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? **University of Pittsburgh-**Unsure. i. If so, please describe? **h.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? **University of Pittsburgh**-No. i. If your state MLP's, who is responsible for the education? Please describe? ii. Do the students, faculty, and local dental community embrace the concept? **University of Pittsburgh-**Unsure iii. Would your institution be willing to provide this instruction? **University of Pittsburgh-**Unsure.
University of Illinois-Chicago	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? **UIC**: There are a number of actions that have been taken in our curricular structure that are part of a plan for revision in alignment with INBDE. This is within a didactic curriculum that has already taken significant strides integrating biomedical, clinical, and social science concepts that define our curriculum and student competency. At a recent faculty retreat, there was a session to help instructors learn to write questions in the INBDE format. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? **UIC:** One attempt, before referral to the Subcommittee on Student Promotion (SSP). If a student fails the remediation exam, the student's overall performance in the curriculum is discussed during

the SSP meeting. An action plan is developed to help the student remediate successfully.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? **UIC**: Yes, approximately every 5 weeks or after the completion of a significant project.

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? **UIC:** Generally no. There might be certain procedures that students have limited experiences such as IOD and RPD.

i. If not, what do you contribute your success to? **UIC:** The College is located in the City of Chicago, we are the largest recipient of Medicaid patients.

ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? **UIC:** Yes, with slight exceptions for IOD, RPD and implants supported restorations.

i. What types of experiences are the most difficult to find in your patient pool? **UIC:** Endo, RPD, IOD, STI.

f. Describe your screening/patient admissions process? **UIC**: Every day, 18 patients are accepted for screening per session, for a total of 36 per day. The patient is screened by a student, forms are completed, and all policies are reviewed. If the patient is deemed appropriate for the Pre-Doctoral program, the patient will receive an appointment to get a panoramic and/or a FMX.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? **UIC**: No

i. If so, please describe?

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? **UIC**: To the best of our knowledge, the state has not and currently is not investigating mid-level providers.

i. If your state MLP's, who is responsible for the education? Please describe? N/A

ii. Do the students, faculty, and local dental community embrace the concept? UIC: Our

	societies (CDS, ISDS) do not "embrace" the concept. iii. Would your institution be willing to provide this instruction? N/A
West Virginia	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? **West Virginia University** Meetings were held with dental course directors and basic sciences course directors. There was discussion of collaboration with intent to integrate questions into the lectures/curriculum of both dental and basic sciences courses. Mapping of curriculum content/objectives throughout electronic courses is in process to assist with this collaboration and integration of board type questions into the courses/exams. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? **West Virginia University** Varies upon the course, and is stated in each syllabus. For operative pre-clinical courses, remediation is necessary upon failure, but only one retake is permitted. The retake may yield a grade change with a max 70 score. Exams are not typically remediated. A student who fails an exam would be expected to meet with the course director to review the content at the student's request (some do not desire/request this.) Exams are not typically able to be retaken. In the clinic, if there is a trend with poor performance, the student may not be permitted in the clinic until satisfactory remediation is completed. Also, failure of 2 CPAs (clinical performance assessments) results in revocation of clinic privileges until successful remediation is completed. **c.** Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)? **West Virginia University** Usually faculty rotate throughout the semester, dividing them up by dates/time. This permits each section to acquire feedback/evaluation from each of the faculty members by equal amounts of exposure time. **d.** Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? i. If not, what do you contribute your success to? ii. If so, please describe the issues **West Virginia University** There is a general/overall lack of patients. Lack of patients needing specific desired procedures seems to come in phases. Sometimes there will be lack of dentures, partials. Often there is a lack of crowns, always a lack of FDP/bridges due to many opting for implants instead. Endodontic procedures are lacking as well for the same reason (implant option instead.) Pre-doctoral students also compete with the Endodontics specialty program for patients. There is commonly a lack of

SRP, especially for sharing distribution of these patients with the dental hygiene program.

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students? **West Virginia University** Sometimes yes, sometimes no. It varies depending on the students. Students who are better communicators have better luck of course. Other students have poor luck with patients or are not good communicators. Those students usually have a harder time keeping patients of course. Sharing of patients happens often, especially in the last semester before graduation.
Also, each 4th year is teamed with a 3rd year student, and they collaborate, as well as the 3rd year covering for the 4th year when he/she goes on rural rotation.

i. What types of experiences are the most difficult to find in your patient pool? **West Virginia University** Endodontic/root canals, FDP/Bridge, and Scaling and Root Planing, sometimes also implants, also a complex amalgam restoration (which they must complete as a PA)

f. Describe your screening/patient admissions process? **West Virginia University** There are 5 team leaders. Each team leader does a half-day session of "initial assessment." Usually each session, 6 patients are scheduled (up to 10 when mass screenings are being done.) Students have rotations for the initial assessment clinics. At the initial assessment, a problem list is created, including a list of consults needed . From the problem list (list of likely needs for the patient) the patient care coordinator for the school will assign the patient to a student who needs the clinical experiences that are on that patient's problem list. The patient care coordinator keeps track of what each student has in their family of patients (as best as possible) for as best distribution of patients as possible, or send to grad pros if deemed appropriate. After the patient is assigned, the student brings the patient in for treatment planning (has to book appt with at least 1 OP and 1 Perio faculty within 1 month of assignment of the patient which is tracked via recall system.) All necessary consults are obtained, and a phased treatment plan is created. If there are urgent problems, there is a separate Phase II plan created for that. More complex pros cases (more than 3 crowns, RDPs, implants) will require the student to obtain impressions/study models, and sign up and meet with a pros faculty for a Pros Review before the treatment plan is completed. The next appt will begin treatment—if treatment planning is completed in one appt. (sometimes more than 1 appt is required for complex cases.)

	g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? **West Virginia University** Not currently. In the past there was discussion of moving to a block system, but currently no changes planned. i. If so, please describe? **h.** Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? **West Virginia University** Our state does not have/allow MLPs and currently our state board is not comfortable with the idea. The only thing they allow is RDHs to see students within a school system/FQHC unsupervised, but they prefer a RDH only does this 1x per year, and a dentist performs an exam at least 1x per year i. If your state MLP's, who is responsible for the education? Please describe? **West Virginia University** N/A ii. Do the students, faculty, and local dental community embrace the concept? **West Virginia University** (see response above) iii. Would your institution be willing to provide this instruction? **West Virginia University** Not at this time.
Western-Ontario	**a.** How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)? **Western University:** As we are in Canada, this change to the board exam will not impact our school or curriculum. **b.** How many attempts do students get to remediate an exam, a clinical procedure, and a course? **Western University:** Individual exams/practicals do not get remediated such that the mark/result can be changed, however faculty do meet with the student to review the result and to discuss what problems were encountered, give advice & tips, suggest modifications to their technique, review knowledge gaps, etc. If a student fails an overall preclinical course component (i.e. either written or practical), then, assuming that they meet eligibility requirements (i.e. they have a year-end overall average of 65% or greater), they will be eligible for a supplemental exam. For written exams, they have only the 1 additional attempt. For practical exams (at least currently), they have 2 attempts to successfully pass the exam; there is talk that this may be reviewed in the near future with the goal of changing it back to a single attempt for practicals as well. For clinical procedures, individual procedures do not get remediated per se, however students who are having difficulties in a particular clinical area would typically meet with the relevant

department head to discuss the situation, and may be assigned remedial work (i.e. additional projects/training in the Simulation Clinic) that they need to show before seeing a patient in that discipline again, or they may be restricted to working with particular instructors for closer monitoring/observation. Additional patients may be assigned after any immediate concerns are dealt with to enable the student to gain more clinical experience & to prove competence.

c. Within the preclinical courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

Western University: Yes- it varies by course, but instructors typically rotate according to a schedule, usually after a certain number of sessions (2-3 sessions is typical for Operative) or at the conclusion of a project or topic area

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs?

Western University: In general, there are a sufficient number of patients in the system, however there can at times be shortages in specific treatment areas, particularly in prosthodontics and pediatric dentistry.

i. If not, what do you contribute your success to? ii. If so, please describe the issues

Western University: regular screening (see below), two associated dental hygiene programs that also generate patients, lower fees compared to private practice

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?

Western University: Most of the time, although sharing or transferring patients between students can sometimes be necessary

i. What types of experiences are the most difficult to find in your patient pool?

Western University: Crowns, bridges, dentures, and partials are the most challenging treatment experiences to procure.

f. Describe your screening/patient admissions process?

Western University: The prospective new patient fills out an application for screening and returns it to the front reception desk (or fills it out online); they are then placed on a waiting list. The patient is then contacted by the front desk when they are at the top of the waiting list (patients seeking a particular potential treatment may at times be given priority) and a screening appointment is booked, where they are then screened by a student and a faculty member. Screenings are conducted every day by two dedicated faculty screeners.
At the screening appointment, the faculty member educates the patient on how the school works, takes a brief history, and examines them for potential suitability for the pre-doctoral clinic. If the patient seems as though they may be suitable from both a dental and attendance/patient management standpoint, they are then assigned to a student for a comprehensive exam.
Patients may also enter the school system through direct referral from a community dentist (usually for a particular specific treatment) or they may enter through two dental hygiene programs that are associated with the school.

g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

i. If so, please describe?

Western University: There are no known plans to change the overall process/system, however recent evolutions have included having a student participate in the screening session for educational purposes, and having two dedicated faculty members function as the screeners.

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team?

Western University: Restorative dental hygienists currently exist in Ontario, but are not particularly common. Ontario also allows Denturists who perform removable prosthodontic treatment. Denturists are common, and have taken over a significant amount of the overall removable prosthodontic treatment within the province.

i. If your state MLP's, who is responsible for the education? Please describe? ii. Do the students, faculty, and local dental community embrace the concept?

iii. Would your institution be willing to provide this instruction?

Western University: For registration in Ontario as a Restorative Dental Hygienist, there are 2 approved provincial post-graduate Community College programs and 1 approved University program that is located in a

	different province (Manitoba). I also found online some private commercial institutions claiming to provide this training, however they were not listed on the College of Dental Hygienists of Ontario website, so am not sure if they would allow for actual official licensure at that level in this province. Becoming licensed as a Denturist in Ontario requires completion of a Community College program; currently ~6 Colleges throughout Canada appear to be offering this 2-3 year long course of study. There doesn't seem to be a lot of current active discussion on restorative hygienists, as they have been in existence for some time yet are still not very common. It is doubtful that the dental community wholeheartedly embraces this concept. Denturists have existed in Ontario since the 1970s; they are not particularly embraced, especially when it comes to providing partial denture and implant denture treatment. Currently, Western is not involved in providing instruction for either of these programs, and there are no known plans for us to become involved.

II. Cariology

a. What terminology does your school use to define and categorize dental caries?

b. How does your school calibrate its faculty for caries diagnosis?

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

Buffalo	No Response
Case Western	No Response
Detroit Mercy	**a.** What terminology does your school use to define and categorize dental caries? UDM: We teach ICDAS however it does not match the axiUm terminology, We teach CAMBRA concepts in our didactic portion in cariology. **b.** How does your school calibrate its faculty for caries diagnosis? UDM: Yes, We do, every one half a day we have seminars we discuss treatment planning module and discuss cases in coordination with the Clinic leads. **c.** Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe. UDM: Yes, we have integrated cariology

	curriculum. Most of our curriculum is completed in DS1 year some of it is reinforced in DS2 and DS3 years.
Indiana	We use primarily the International Caries Detection and Assessment System (ICDAS) and the American Dental Association (ADA) Caries Classification System (CCS). We emphasize to describe caries process as "demineralization," NOT "decalcification." We also emphasize how to use sharp explorer for oral examination, NOT for caries detection and diagnosis. As a part of calibration, we offered the CE course to all faculty in the Cariology and Operative Dentistry and Public Health Department. This calibration also included other clinical faculty in other departments that were interested in being calibrated. Topics offered to faculty for calibration were, caries detection, caries risk assessment and management, Patient Management according to Caries Risk Status; patient/cases were used at the end of this calibration. At IUSD, we have a pre-clinical course integrated with the Periodontics program, the title of this course is: Risk Assessment, Prevention, and Early Management of Dental Disease and the course is given during the Fall of D1. We have a second pre-clinical course integrated with Operative Dentistry that runs for the Fall and the Spring of D2, the course title is: Clinical Applications of Cariology and Operative Dentistry Concepts. We have a clinical cariology course integrated with operative course in the D3 in which students need to fulfill requirements towards their competencies. This course runs Summer, Fall and Spring and the title is: Cariology and Operative dentistry Clinic I and II. During D4 cariology is integrated in the Comprehensive clinics. ICDAS and ADA CCS There is a calibration series of presentations given to faculty or taken online to qualify to be an eligible faculty on the clinic floor to approve Caries Risk/Assessment procedures for pre-competencies & competencies
Michigan	No written response submitted
Midwestern-Illinois	**a.** What terminology does your school use to define and categorize dental caries? **Midwestern IL:** White spot lesions, incipient, in dentin. ICDAS is also discussed didactically. **b.** How does your school calibrate its faculty for caries diagnosis? **c.** Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? **Midwestern IL:** Integrated into other curricula Please describe.
Ohio State	**a.** What terminology does your school use to define and categorize

	dental caries? We use the GV Black I-V classification system. We discuss caries according to surface: pits and fissure, smooth and root surface, and how caries activity differs from one location to the other. Students learn about oral microbiomes, plaque biofilm, primary and secondary caries, active and inactivecaries lesions and their clinical manifestation. We discuss E1, E2, D1, and D2 lesions **b.** How does your school calibrate its faculty for caries diagnosis? Faculty who teach cariology and CAMBRA are always taking the lead on discussing techniques to diagnose caries. Recently we talked about the ICDAS and introduced it in our lectures. We have presented CAMBRA and Axium CRA in monthly calibration session for faculty and in the division meetings **c.** Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe. Cariology is a separate section in our Operative 1 course. It is taught in the first semester of dental school. It is a 5 lecture series. Dent 1 students learn some of the **d.** Microstructure of the tooth. Caries as a disease and its activity.
Pittsburg	**a.** What terminology does your school use to define and categorize dental caries? **University of Pittsburgh-**International Caries Detection and Assessment System (ICDAS). **b.** How does your school calibrate its faculty for caries diagnosis? **University of Pittsburgh**-We had an annual calibration meeting in which we were given a presentation by our cariology faculty. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? **University of Pittsburgh-**In the past there was a separate cariology course. However, now, as of last year, it is incorporated into the pre-clinical operative course for D1 students.
University of Illinois-Chicago	**a.** What terminology does your school use to define and categorize dental caries? **UIC:** Didactically we teach the ADA CCS. We put emphasis on identification of caries stages (cavitated vs non-cavitated, caries activity and caries risk to assist with decision-making. We are in the process of changing our terminology in AxiUm which is not diagnostic. **b.** How does your school calibrate its faculty for caries diagnosis? **UIC:** We have faculty in service 2 times a year, as well as weekly CE opportunities. **c.** Does your school have a separate cariology curriculum or is it integrated into the operative

	course and/or other courses? Please describe. **UIC:** There is no separate cariology course as all of our courses are multidisciplinary. Cariology is taught as part of the operative component of the curriculum along the D1, D2 and D3 course.
West Virginia	**a.** What terminology does your school use to define and categorize dental caries? **West Virginia University** Caries classification is taught according to Sturdevant classifications, (infected vs affected; biochemistry of a white spot lesion/ demin/remin, 4 zones of an incipient lesion in enamel (translucent, dark, body, surface), 5 zones of dentin caries/cavitated lesion(normal, subtransparent, transparent, turbid, infected), Blacks, classification, location classification, Anusavice classification of lesion severity , ICDAS, and ADA classification. ICD.10 Diagnosis codes are taught. CAMBRA guidelines used for caries risk assessment and management, and there is a form in axium that must be completed for each patient. **b.** How does your school calibrate its faculty for caries diagnosis? **West Virginia University** Calibration efforts are made via discussion during department meetings and faculty retreats. Currently, no physical/clinical calibration measures are in place. Calibration is a continued topic of discussion, and contemplation on best methods of calibration to implement. **c.** Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe. **West Virginia University** It is integrated in the curriculum, it is taught mostly in the preventive dentistry and operative courses.
Western-Ontario	**a.** What terminology does your school use to define and categorize dental caries? **Western University:** In cariology, students learn about the ICDAS (ii)- ICCMS classification system, although this is not strictly employed on the clinic. In Operative, the approach has more been based on the explanation of the caries disease process and etiology, with caries often being described using traditional terms such as active/arrested, cavitated/non-cavitated, infected/affected dentin, etc. The Pediatric dentistry department uses ICDAS. In radiology, caries has been staged from 1-4, with 1 being less than ½ the enamel thickness, 2= ½ to full enamel thickness, 3= dentinal involvement up to ½ way to the pulp, 4= dentinal involvement more than ½ way to the pulp. In addition, in operative, the ADA classification for proximal lesions

	is referenced to help explain the management of incipient carious lesions according to the patient's caries risk. **b.** How does your school calibrate its faculty for caries diagnosis? **Western University:** Calibration sessions/presentations, including examples and clinical cases, and the discussion of current philosophies Online posted information on the school's OWL (online learning resources) site is also employed. **c.** Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe. **Western University:** There is a separate cariology module in 1st year that is part of the Oral Diseases course/curriculum. There is also some overlap/review/reinforcement that occurs during Operative courses in 1st and 2nd year, however the basic cariology is taught in this separate module. There has been discussion on implementing some additional review into 3rd year to reinforce these concepts as students are beginning to see patients in the clinic.

III. Materials and Techniques

a. What does your school teach in terms of cusp replacement in composite resin?

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?
ii. Sandwich technique?
iii. Bulk fill technique?
iv. Resin Modified Glass Ionomers (RMGI)?

v. Amalgam?
    1. % of direct restorations?
    2. Bonded or unbonded?
vi. Air abrasion?

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?
    i. Has it replaced gold in your clinic?
d. Who performs molar endo?
    i. Pre-doc students %, Endo Residents %, Endo Faculty %
e. Do you utilize bond strength testing exercises?
    i. Who supervises?
f. Do you use electric handpieces in the simulation laboratory? In the clinic?
    i. If no, why not?
    ii. If Yes, what system?

Buffalo	No Response
Case Western	No Response
Detroit Mercy	**a.** What does your school teach in terms of cusp replacement in composite resin? **b.** For the following, describe what is being taught, indications, materials used, frequency of use, etc… iii. Class V composite resin? UDM: Yes. However, students are taught that glass ionomer have been reported to be more successful for non-carious lesions. iv. Sandwich technique? UDM: Yes. However, students are taught that every time an interface is added to a restoration, the stress distribution is affected and more prone to failure. Both closed and open sandwich techniques are taught (in classroom). Adhesive restorations are not encouraged to be used with sandwich techniques. v. Bulk fill technique? UDM: Yes. Students are exposed to bulk fill technique and the subject is discussed in classroom, in terms of advantages and disadvantages (Dr. Pacheco does a simulation exercise in sim lab to demonstrate depth of cure).

	vi. Resin Modified Glass Ionomers (RMGI)? UDM:Yes. There is a whole lecture dedicated to resin modified glass ionomers, and the gradient that involves glass ionomer cement > resin modified glass ionomer > giomers/compomers > resin composites. The use of RMGI is encouraged for dental sealants, non-carious cervical lesions, pediatric restorative procedures, and liners/bases. vii. Amalgam? UDM: Yes. Two lectures exclusive for dental materials, and multiple simulation exercises**.** 1. % of direct restorations? UDM: 20% 2. Bonded or unbonded? UDM: Unbonded. viii. Air abrasion? UDM: Not sure**.** **c.** Are you doing more milled partial coverage as a result of the scanning and milling capability? UDM: The school does not encourage this type of procedure due to conflicts with coding/insurance. ix. Has it replaced gold in your clinic? UDM: No. **d.** Who performs molar endo? x. Pre-doc students %, Endo Residents %, Endo Faculty % 23.6% by pre-doc 66.4% by endo residents 9.9% by faculty practice 0.2% by other **e.** Do you utilize bond strength testing exercises? UDM:Yes. Not with a universal testing machine/Instron, but using hand instruments. The exercise compares techniques and different number of steps for adhesion. xi. Who supervises? UDM: Simulation clinic faculty and DDS/MSC/PHD in Dental Materials (adhesive dentistry). **f.** Do you use electric handpieces in the simulation laboratory? In the clinic? xii. If no, why not? xiii. If **Yes**, what system? UDM: Brassler and the Bien Air are electric high speeds.
Indiana	**a.** What does your school teach in terms of cusp replacement in composite resin? **Indiana University**: We do not advocate using resin composite for cusp replacement **b.** For the following, describe what is being

taught, indications, materials used, frequency of use, etc…

i. Class V composite resin?

Indiana University: Gingival margins should be on sound enamel.

ii. Sandwich technique?

Indiana University: Both Open & Closed Sandwich techniques are taught; use GI or RMGI when margins are on dentin.

iii. Bulk fill technique?

Indiana University: We advocate incremental filling technique. We do have a bulk fill resin core material, which is often used inappropriately. We are considering adding SonicFill to our Graduate Cliinic armamentarium. Decision regarding use in pre-doctoral clinic will be made after evaluation in Graduate Operative Dentistry.

iv. Resin Modified Glass Ionomers (RMGI)?

Indiana University: We teach both conventional & resin-modified GIC restorative materials. We also use RMGI materials as cavity liners & luting agents for gold, PFM, & certain all-ceramic restorations (per manufacturer's instructions).

i. Amalgam?

1. % of direct restorations?

Indiana University: Amalgam acounts for approximately 30% of direct restorations placed.

2. Bonded or unbonded?

Indiana University: Unbonded.

ii. Air abrasion?

Indiana University: we use air abrasion to repair existing all-ceramic, PFM, & resin composite restorations.

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Indiana University: Yes, but not substantialy.

i. Has it replaced gold in your clinic?

Indiana University: No.

d. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

Indiana University: Endo residents perform all molar RCT. We have only one Endodontics faculty member who participates in Faculty Practice.

e. Do you utilize bond strength testing exercises?

i. Who supervises?

Indiana University: Perhaps in Dental Materials – supervised by Biomaterials Dept Head (Dr. Platt).

	f. Do you use electric handpieces in the simulation laboratory? In the clinic? i. If no, why not? ii. If Yes, what system? **Indiana University**: No. We do not have electric handpieces available in either Simulation Lab or Clinics.
Michigan	No written response submitted
Midwestern-Illinois	**II.** What does your school teach in terms of cusp replacement in composite resin? **Midwestern IL:** CAD-CAM indirect onlay b. For the following, describe what is being taught, indications, materials used, frequency of use, etc… i. Class V composite resin? Midwestern IL: Composite - sensitivity, caries, esthetics ii. Sandwich technique? Midwestern IL: Discussed on didactic only – deep caries iii. Bulk fill technique? Midwestern IL: Discussed on didactic only i. Resin Modified Glass Ionomers Midwestern IL: (RMGI)? Discussed on didactic only - class v, pedo, rampant caries ii. Amalgam? 1. % of direct restorations? **Midwestern IL:** 5% 2. Bonded or unbonded? **Midwestern IL:** Unbonded iii. Air abrasion? **Midwestern IL:** No **c.** Are you doing more milled partial coverage as a result of the scanning and milling capability? **Midwestern IL:** Yes, about 10% of our indirects are inlays and onlays iv. Has it replaced gold in your clinic? **Midwestern IL:** Zirconia has replaced gold in our clinic **d.** Who performs molar endo? v. Pre-doc students **Midwestern IL:** 100%, Endo Residents %, Endo Faculty % **e.** Do you utilize bond strength testing exercises? **Midwestern IL:** No vi. Who supervises? **f.** Do you use electric handpieces in the simulation laboratory? **Midwestern IL:** Yes, In the clinic? **Midwestern IL:** Yes vii. If no, why not? viii. If Yes, what system? **Midwestern IL:** Bien-Air ix.
Ohio State	**a.** What does your school teach in terms of cusp replacement in composite resin? We teach amalgam and pin retained amalgams in the pre clinic. There are many clinical faculty that have students do build ups with composite or glass ionomer in the clinic. **b.** For the following, describe what is being taught, indications, materials used, frequency of use, etc…

	iv. Class V composite resin? Caries when enamel is available to bond, if no enamel then restore with glass ionomers. We use Herculite and Filtek composites and Fugi RMGI v. Sandwich technique? Taught when unable to properly place a matrix and wedge. Will place a matrix and fill with RMGI until a wedge can be placed then the remaining restoration can be composite or amalgam. vi. Bulk fill technique? Not currently taught in lab or clinic. Resin Modified Glass Ionomers (RMGI)? Used for Class V lesions with no available enamel for bonding, abfractions, base, and used in the sandwich technique. We have FUGI RMGI in our clinics i. Amalgam? 1. % of direct restorations? 7/2018-7/2019 1733 amalgams (4.3%) and 5228 composites (13% 2. Bonded or unbonded? Direct placement ii. Air abrasion?None to my knowledge **i.** Are you doing more milled partial coverage as a result of the scanning and milling capability? No i. Has it replaced gold in your clinic? Full coverage zirconia replacing gold is more common **j.** Who performs molar endo? i. Pre-doc students %only do 3 canals, no molars Endo Residents %do the majority of endo at our school, Endo Faculty % July 2018-July 2019 faculty =221, grad endo and GPR=1528, dental students=290 **k.** Do you utilize bond strength testing exercises? NO i. Who supervises? **l.** Do you use electric handpieces in the simulation laboratory? Yes, the Dean required the new students to purchase so they would have their own handpiece and will be able to use in our new clinic building. In the clinic? Not in our current clinics, we will be using in our new building next summer i. If no, why not? ii. If Yes, what system? Bien Air
Pittsburg	**a.** What does your school teach in terms of cusp replacement in composite resin**? University of Pittsburgh**-We teach replacing missing cusps with both amalgam and composite materials. We teach in pre-clinic the use of pins and slots for retention. When it comes to the clinic the material of choice is decided by the restorative instructor. **b.** For the following, describe what is being taught, indications, materials used, frequency of use, etc… iv. Class V composite resin? **University of Pittsburgh**-Composite material we use is TPH Spectra ST. We also have available for

	Class V lesions RMGI (Fuji II). We teach the students the use of RMGI is indicated for patients with high caries index, xerostomia or poor oral hygiene. However, it is the decision of the restorative dentist to select the appropriate restorative material. v. Sandwich technique? **University of Pittsburgh-**This technique is discussed in the pre-clinical operatory course in the first year of dental school. We teach them that a RMGI can be used as the initial layer in the proximal box. Some instructors recommend its use in the patient clinic. The majority of the time Surefil SDR is used for the initial layer in the proximal box. See the answer to the next question. **vi.** Bulk fill technique? **University of Pittsburgh-**We lecture about the bulk fill materials in the first year pre-clinical operative course. However, the only bulk fill composite we have in the clinic is Surefil SDR. We do not encourage students to use this for the entire restoration but to place it as the first layer in the proximal box because of its self-leveling properties. It should be placed below the contact point because of its increased wear properties. vii. Resin Modified Glass Ionomers (RMGI)? **University of Pittsburgh-**Fuji II Capsules. i. Amalgam? 1. % of direct restorations? **University of Pittsburgh-**20% 2. Bonded or unbonded? **University of Pittsburgh-** Unbonded ii. Air abrasion? **University of Pittsburgh-**None **i.** Are you doing more milled partial coverage as a result of the scanning and milling capability? **University of Pittsburgh-**Yes i. Has it replaced gold in your clinic? **University of Pittsburgh-** Not completely **j.** Who performs molar endo? i. **University of Pittsburgh-**Pre-doc students-15%, Endo Residents-80%, Endo Faculty-5% **k.** Do you utilize bond strength testing exercises? **University of Pittsburgh-**No i. Who supervises? **l.** Do you use electric handpieces in the simulation laboratory? No In the clinic? **University of Pittsburgh-**No i. If no, why not? **University of Pittsburgh-**The extra cost. ii. If Yes, what system?
University of Illinois-Chicago	**a.** What does your school teach in terms of cusp replacement in composite resin? **UIC:** We do not

teach cusp replacement with resin composite for final restorations.

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…

i. Class V composite resin? **UIC:** Cosmodent Nanofilled resin composite for cases with no indication of fremitus. Cosmodent Microfilled resin composite with occlusal adjustment in suspected cases affected by abfraction. 3M Ketac Nano Resin Modified Glass Ionomer for extreme high risk and root caries.

ii. Sandwich technique? **UIC**: Closed sandwich with Dycal and Fuji Liner LC or Theracal. Open sandwich with RMGI and Nanofilled or Microfilled composite is discussed didactic, but not clinically utilized.

iii. Bulk fill technique? **UIC:** We do not teach any bulk fill techniques.

iv. Resin Modified Glass Ionomers (RMGI) UIC: 3M Ketac Nano Resin Modified Glass Ionomer for extreme high risk and root caries.

v. Amalgam?

1. % of direct restorations? 2.5% of all direct restoration are amalgam.
2. Bonded or unbonded? **UIC:** Unbonded

vi. Air abrasion? **UIC:** We teach air abrasion of restorations prior to silane application and/or cementation.

b. Are you doing more milled partial coverage as a result of the scanning and milling capability? Yes

i. Has it replaced gold in your clinic? No, UIC still considers gold as a treatment option for full or partial coverage onlay.

c. Who performs molar endo? **UIC:** Students and residents

i. Pre-doc students %, Endo Residents %, Endo Faculty %

d. Do you utilize bond strength testing exercises? **UIC: No**

i. Who supervises? N/A

e. Do you use electric handpieces in the simulation laboratory? In the clinic? **UIC: No**

i. If no, why not? Not available

ii. If Yes, what system?

West Virginia	**a.** What does your school teach in terms of cusp replacement in composite resin? **West Virginia University** Cuspal replacement with composite resin is taught as long as the area can be properly isolated and the patient does not have parafunctional occlusion. Amalgam is preferred for posterior cores. **b.** For the following, describe what is being taught, indications, materials used, frequency of use, etc… i. Class V composite resin? **West Virginia University** Indications- esthetics, able to properly isolate, we use a Universal bonding agent (Ivoclar Adhese pen system, Optibond XTR also used sometimes, and is taught in lab) Surefil flowable and Tetric Evoceram, and Class V composite restorations are placed very frequently in the clinic ii. Sandwich technique? **West Virginia University** The students are taught both an open and closed sandwich technique using RMGI and composite. This procedure is rarely used in the student clinic. Theracal is often used as a liner. iii. Bulk fill technique? **West Virginia University** We utilize both Tetric Evoceram Bulkfill and the Sonicfill in our student clinics. The indications for the Tetric Evoceram Bulkfill are typically in core restorations on posterior teeth that are indicated for a full coverage restoration. In our Innovation Center, Sonicfill is utilized to allow the students to try the handpiece, and it is rarely used, but when utilized it is typically on small to moderate preparations in posterior teeth only. iv. Resin Modified Glass Ionomers (RMGI)? **West Virginia University** RMGI are predominately used on root surface caries in anterior teeth (for esthetics), in our Pediatric clinic, or as a temporary restoration placed following Endodontic therapy. We use Fuji II LC, Fuji IX, and Triage, respectively. v. Amalgam? **West Virginia University** Direct restorations Class I, II, III (D of canines –taught but rarely utilized), and V. Indications- A must if isolation cannot be achieved, best for cores in posterior teeth, superior longevity when hygiene is poor. Materials- Tytin and Dispersalloy. 1. % of direct restorations? **West Virginia University** 20% amalgam—between amalgam and composite (of all restorations, not just posterior). Likely higher due to requirement of minimal experiences for competency, and CP requirements in amalgam (Class II and Complex) 2. Bonded or unbonded? **West Virginia University** Both are taught, amalgambond plus bonding material is utilized if bonding is completed. But, students are taught not to rely on bonding alone.

	vi. Air abrasion? **West Virginia University** Not performed **c.** Are you doing more milled partial coverage as a result of the scanning and milling capability? **West Virginia University** Not currently, scanning and milling just started within the pre-doc program within the last 2 years in the innovation center and will begin in the main clinic this year. i. Has it replaced gold in your clinic? **West Virginia University** No, students still do gold inlays/onlays. They have incentive to do them as they receive credit for both Operative and Fixed for the inlays/onlays. There is also a Gold Foil Society that comes to the school 2X/year to teach gold foils clinically. **d.** Who performs molar endo? **West Virginia University** Residents only, except in specific cases. Students can access molars, but usually not complete the case. i. **West Virginia University** Pre-doc students <1 %, Endo Residents99 %, Endo Faculty1 % **e.** Do you utilize bond strength testing exercises? **West Virginia University** Within the school, we do not have the equipment to truly test bond strength. Dr. Perrine presents exercises she has personally done outside WVU at a research facility concerning bond strength, and also what the literature states concerning bond strength exercises. i. Who supervises? **f.** Do you use electric handpieces in the simulation laboratory? In the clinic? **West Virginia University** Yes, both i. If no, why not? ii. If Yes, what system? **West Virginia University** Kavo
Western-Ontario	**a.** What does your school teach in terms of cusp replacement in composite resin? **Western University:** Up until this current school year, cusp replacement was only taught using amalgam. This year, an exercise featuring cusp replacement with composite is being introduced preclinically (a relatively conservative, supragingival replacement/shoeing on an upper premolar), due to the fact that cusp replacement with composite has been happening clinically, driven by part-time/sessional instructors. This is an effort to try to prepare students but to also reinforce the limitations and importance of case selection when doing so. We believe in taking a cautious/conservative approach, as there is a lack of strong, definitive, long term evidence as to the longevity of composite when used to replace multiple cusps. **b.** For the following, describe what is being taught, indications, materials used, frequency of use, etc… i. Class V composite resin?

Western University: Beveling of enamel margins + retentive groove/elements if on root structure
Indications- cavitated/active caries, NCCL that is an esthetic concern or affecting the structural integrity or pulpal health of the tooth, replacement of esthetically unsuitable, fractured, or significantly compromised prior restorations
Materials- Filtek Supreme, alone or in concert with a GI or RMGI
Frequency- common

ii. Sandwich technique?

Western University: Yes- both the open and closed sandwich techniques are taught
Indications- open sandwich for composite restorations lacking ideal gingival enamel and/or where the gingival margin is below the CEJ, or where isolation is not ideal but the patient insists on a composite. GI/RMGI is routinely used as a liner underneath direct restorations with areas of less than optimal remaining dentin thickness
Materials- Fuji II, Fuji IX, Vitrebond. The product used depends on the particular application, with Vitrebond reserved for use as a liner.
Frequency- variable/case dependent. Very common as a liner, less so with respect to the open sandwich and full-on closed sandwich techniques

iii. Bulk fill technique?

Western University: Not taught/advocated

iv. Resin Modified Glass Ionomers (RMGI)?

Western University: Yes- importance/use is increasing
Indications- base/liner, Class V and root caries, particularly on high caries rate individuals, temporary restorative material
Product- Fuji II (restoration), Fuji II or Vitrebond (base/liner)
Frequency- common overall, with frequency in particular situations being variable. Increasing use in Class V restorations in non-esthetic areas.

v. Amalgam?

1. % of direct restorations?

Western University: In 2018, amalgam accounted for ~15% of direct restorations in the clinic

2. Bonded or unbonded?

Western University: Unbonded. Bonded amalgams are not currently taught

vi. Air abrasion?

Western University: Not taught

c. Are you doing more milled partial coverage as a result of the scanning and milling capability?

Western University: Very few cases are milled- more cases are done with IPS e.max press than IPS e.max cad

i. Has it replaced gold in your clinic?

Western University: Not fully- gold is still taught preclinically, and some gold crowns and onlays are still done in the clinic, however ceramic has become more predominant/is more commonly used.

d. Who performs molar endo?

i. Pre-doc students %, Endo Residents %, Endo Faculty %

Western University: We do not have a Graduate Endodontics program. Pre-doctoral students perform all molar endo cases that are deemed acceptable for treatment at the school. Overly complex cases may be rejected/not deemed acceptable, in which case the patient is encouraged to seek treatment in a private practice.

Do you utilize bond strength testing exercises?

Western University: No- bond strength testing is only used for research purposes, and is not part of the undergraduate operative curriculum.

ii. Who supervises?

Western University: N/A

e. Do you use electric handpieces in the simulation laboratory? In the clinic?

i. If no, why not?

	ii. If Yes, what system? **Western University:** We do not use electric handpieces either preclinically or clinically, other than in Endodontics, who use an electric rotary endo motor system (ProMark Endo from Dentsply Tulsa). Reasons are cost to the student kit, infrastructure of the clinic, and tradition/lack of problems with the current air driven handpieces.

IV. Student Assessment

a. Does your institution have an international dental program?
- i. If yes, does your school utilize a bench test? Please describe.
- ii. If yes, how many students are enrolled?

b. Do you evaluate students using OSCE's?

c. Describe your primary didactic testing methodology
- i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
- ii. Pros/cons to the one you are primarily using?
- iii. Are you investigating other methods?
  1. If yes, which one(s)?

Buffalo	No Response
Case Western	No Response
Detroit Mercy	**a.** Does your institution have an international dental program? UDM: No we don't xiv. If yes, does your school utilize a bench test? Please describe. UDM: No, we don't utilize a bench test xv. If yes, how many students are enrolled? **b.** Do you evaluate students using OSCE's? UDM: YES we do, the OSCE is conducted at a Medical facility **c.** Describe your primary didactic testing methodology xvi. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) UDM: Turning Point Software. xvii. Pros/cons to the one you are primarily using? UDM: The front end is time consuming but the end results are fantastic xviii. Are you investigating other methods? UDM: No we aren't

Indiana	**a.** Does your institution have an international dental program? **Indiana University**- yes If yes, does your school utilize a bench test? Please describe. **Indiana University**- yes 1. Bench Test- Class II amalgam preparation & restoration #21 MO, full gold crown prep on #3 and PFM on #5 for a FPD, ADEX criteria is used for grading x. If yes, how many students are enrolled? 1. Bench test applicants- **Indiana Univ**.- 75 2. Selected- **Indiana Univ.** -14-16 **b.** Do you evaluate students using OSCE's?- **Indiana University-yes** xi. 1- Fall/ standardized patient assessment/ topic- addictions xii. D1- Spring/ standardized patient assessment/ topic- communicating scientific & lay literature to patients xiii. D1 Spring semester- Nonsurgical Perio / electronic case-based format xiv. D2 Fall/ standardized patient assessment/ topic- behavioral considerations when working with patients who have visual impairment xv. D2/D3 Summer: Integrated CCA/OSCE- D600 Clinical Procedures/ electronic exam questions + station exam with props (photos, models, diagrams, etc. / focus on integrating all material from D1 year: Biomedical + Clinical Sciences/ future preparation for Integrated NBDE xvi. D3 summer: Behavioral & Ethics/ OSCE format with standardized patients/ focus on assessment of behavioral patient management, communication, and ethical sensitivity xvii. D4- 1 OSCE was given 2019, Prosth Dept- questions/ props on CD, RPD, Implant, Fixe **III.** Describe your primary didactic testing methodology i. Which method? (e.g. pen/paper- hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) 1. **Indiana University**- Written test primariy given on Examsoft/ Examplify software ii. Pros/cons to the one you are primarily using? 1. **Indiana University**- pros: ease of administering, lots of statistics, etc./ cons: internet connections, entering into Examsoft iii. Are you investigating other methods? **1.** If yes, which one(s)?- **Indiana University-no**

Michigan	No written response submitted
Midwestern-Illinois	**a.** Does your institution have an international dental program? **Midwestern IL:** No iv. If yes, does your school utilize a bench test? Please describe. v. If yes, how many students are enrolled? **b.** Do you evaluate students using OSCE's? **Midwestern IL:** Yes **c.** Describe your primary didactic testing methodology vi. Which method? (e.g. pen/paper-hand graded, **Midwestern IL:** ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) vii. Pros/cons to the one you are primarily using? viii. Are you investigating other methods? **Midwestern IL:** No 1. If yes, which one(s)?
Ohio State	**a.** Does your institution have an international dental program? No iii. If yes, does your school utilize a bench test? Please describe. iv. If yes, how many students are enrolled? **b.** Do you evaluate students using OSCE's? We have just started to use them **c.** Describe your primary didactic testing methodology v. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) Usually scan tron, occasional hand graded essay exams. vi. Pros/cons to the one you are primarily using? vii. Are you investigating other methods? 1. If yes, which one(s)?
Pittsburg	**a.** Does your institution have an international dental program? **University of Pittsburgh**-Yes iii. If yes, does your school utilize a bench test? **University of Pittsburgh**-Yes. Candidates have to complete a Class II amalgam preparation on a mandibular premolar and a PRM crown preparation on a maxillary molar. iv. If yes, how many students are enrolled? **University of Pittsburgh**-6-8 each year. **b.** Do you evaluate students using OSCE's? **University of Pittsburgh**-No **c.** Describe your primary didactic testing methodology v. Which method? **University of Pittsburgh**-Some instructors are using Scan Tron sheets, some are using ExamSoft and some are using pen/paper. The use of ExamSoft is increasing. (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as

	ExamSoft or eMedley, other…) vi. Pros/cons to the one you are primarily using? **University of Pittsburgh-**I have been using ExamSoft for three years. The positives concerning ExamSoft are the students receive their grade once they upload their exam. The questions and answers (unless locked) are scrambled to decrease the likelihood of cheating. Assessments can be created from questions stored in a question bank where the questions have been created throughout the many years of a course. The negatives about ExamSoft are it is somewhat user unfriendly as far as setting up the exam. IT needs to be present since in my course at least one student every examination has a computer issue where they are unable to download the examination or upload their completed answers vii. Are you investigating other methods? **University of Pittsburgh-**No 1. If yes, which one(s)?
University of Illinois-Chicago	**a.** Does your institution have an international dental program? **UIC:** Yes iv. If yes, does your school utilize a bench test? Please describe. **UIC:** We do not utilize a bench test. **v.** If yes, how many students are enrolled? **UIC:** 52 per cohort **b.** Do you evaluate students using OSCE's? **UIC:** Yes, we use OSCE for behavioral sciences **c.** Describe your primary didactic testing methodology **vi.** Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) **UIC:** We mostly use Examsoft for high stake written and station exams. Pen/Pencil and Paper is used for self-assessment and most Performance Exams. vii. Pros/cons to the one you are primarily using? **UIC: PROS:** Examsoft allows for immediate review of the results for students (if made available) and faculty. The item analysis is readily available. The statistics provided are very helpful to identify problematic questions and there are multiple methods of question adjustment. Customized reports can be

	easily created for students to review their strengths and opportunities for improvement. **CONS:** The Examsoft application has occasional technical errors that require troubleshooting and can delay exam procedures. viii. Are you investigating other methods? 1. If yes, which one(s)?
West Virginia	**a.** Does your institution have an international dental program? **West Virginia University No** i. If yes, does your school utilize a bench test? Please describe. ii. If yes, how many students are enrolled? **b.** Do you evaluate students using OSCE's? **West Virginia University** Yes, mostly for prosthodontics **c.** Describe your primary didactic testing methodology i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) **West Virginia University** Digital assessments/ exams in SOLE (WVU Health Sciences electronic course content and assessment program.) Any lab OSCE/ bench tests, tooth ID tests, instrument ID tests, perio instrumentation lab tests are graded by hand. ii. Pros/cons to the one you are primarily using? Pros to online testing on SOLE: Instant results— faculty can see how many students have completed the exam, faculty can see their grade instantly (student can see also if it is set up/permitted by the faculty for each exam) Statistics for each student's exam and statistics for exam questions are available immediately after closing the exam. Security: exams are password protected. Students cannot access exams without the password. Students cannot even see the exam/ log into it until the faculty electronically releases the exam. If a student tries to guess password/ enter exam early- faculty can see this because the program shows how many attempts a student makes into exam and at what time (in case they try to leave exam, look up something and re-enter exam—it will show this.) There is a lockdown browser option that may be selected by faculty for each exam. The lockdown browser requirement disables the student from the ability to open anything else on the computer screen while the exam is open. Exams can be directly linked to a gradebook within SOLE (so grades do not need to be entered—and the gradebook calculates the grades automatically in the way it is set up for the course.)

	iii. Are you investigating other methods? Not currently 1. If yes, which one(s)? 2.
Western-Ontario	**a.** Does your institution have an international dental program? **Western University:** Yes i. If yes, does your school utilize a bench test? Please describe. **Western University:** Yes- A Prior Learning Assessment practical exam is utilized as part of the admissions process. It currently takes place over 2 days where applicants perform selected Operative and Fixed Prosthodontic procedures, which are evaluated and scored. There are normally 2 sessions of the exam held consecutively, with ~50 applicants per session. The scores are used to help rank and select candidates for subsequent interviews, and form a component of the overall admission decision/candidate ranking. ii. If yes, how many students are enrolled? **Western University:** Currently 20 per year **b.** Do you evaluate students using OSCE's? **Western University:** Not currently, although introducing one into 1st year Operative has been discussed. **c.** Describe your primary didactic testing methodology i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) **Western University:** Written examinations, generally predominantly pen/paper/hand-graded, with some courses using Scan-Tron for a portion of the exam. ii. Pros/cons to the one you are primarily using? **Western University:** Pros- a traditional, well-crafted written exam does a good job of testing student knowledge of course material Cons- very time intensive for faculty to create and mark iii. Are you investigating other methods?

	Western University: No 1. If yes, which one(s)?

b. Administration

a. What is your policy on attendance?
   i. Please provide the actual attendance policy statement.
   ii. Who is responsible for tracking attendance?
   iii. How effective is your policy?
b. What is your policy with student complaints about grades?
c. What is your policy on student absences?
d. Regional licensure exam
   i. What exam(s) does your school host?
   ii. What's the general consensus towards the benefits of the exam?
   iii. What's the general consensus on the elimination of the exam?
   iv. What are the alternatives?
e. Discuss opinions on realigning the CODE regions.
   i. Are there schools you feel should be in your region that are not?
f. Discuss and describe suggestions for improving CODE.

Buffalo	No Response
Case Western	No Response
Detroit Mercy	**a.** What is your policy on attendance? xix. Please provide the actual attendance policy statement. UDM: Please see attached xx. Who is responsible for tracking attendance? UDM: Faculty lecturing is responsible, and we do it randomly using sign in sheet, using Turning Point xxi. How effective is your policy? UDM: It is somewhat effective; we would like it to be effective 100%, sometimes glitches such as, TP does not record the attendance, sign-in sheet someone forges sign-in sheet **b.** What is your policy with student complaints about grades? UDM: Yes they do, but I can speak of simlab, but no change once recorded, cause we have two faculty grading the exercises independently and if there is a critical error, we call in a third faculty to solve the dilemma. **c.** What is your policy on student absences? UDM: See attached **d.** Regional licensure exam

	xxii. What exam(s) does your school host? UDM: CDCA xxiii. What's the general consensus towards the benefits of the exam? UDM: Student gets license xxiv. What's the general consensus on the elimination of the exam? UDM: Discontinue patient base exam
Indiana	**a.** What is your policy on attendance? **INDIANA UNIVERSITY**: Verbatim from Student Handbook: As a professional program, attendance at all didactic, preclinical and clinical sessions is required. As future dental professionals, students are also expected to be punctual for classes and clinical activities. The specific DDS attendance policy for individual courses is left to the discretion of the course directors. The syllabus must clearly state the attendance policy for each course. i. Please provide the actual attendance policy statement. **INDIANA UNIVERSITY**: Student Absence It is understood that students must occasionally be absent from class or clinic for unavoidable personal reasons. Students are expected to contact the Office of Academic Programs at oasamail@iupui.edu as early as possible to report an absence. The Office of Academic Programs will then notify course directors regarding the absence and its general nature. It is the responsibility of the student to coordinate missed assignments or makeup quizzes with course directors and other involved faculty in a timely fashion. A student who is absent and fails to communicate with course directors in a timely manner regarding missed assignments is accountable for any negative outcomes based on the attendance policy of the course director. **The Office of Academic Programs only determines whether an absence is excused or unexcused when an assessment is involved.** Please see the section below, "Assessment Absence," for the appropriate procedures when an absence causes a student to miss an assessment. Assessment Absence Except for extenuating circumstances, students are prohibited from missing any type of assessment unless excused by the Associate Dean for Admissions and Student Affairs. If the request for an excused absence is determined to be valid, the course director(s) will be notified by the Office of Academic Programs and the student will be required to make arrangements for alternate assessment date(s). The student may be required to provide documentation from the health care provider of record to the Associate Dean for Admissions and Student Affairs. Below is a list of acceptable and unacceptable reasons for missed assessment(s). This list is not exhaustive and each case will be considered by the Associate Dean for Admissions and Student Affairs. [Source: OAP 5/12/15] Leave of Absence If absent for more than 3 consecutive business days, the student must request a Leave of Absence (LOA), which may or may not be approved by the Associate Dean for Admissions and Student Affairs. If approved, the student will be allowed to make up any missed assessments or work. See the

Leave of Absence Form (in **Appendix I**.) Official documentation related to the leave may be required. If the student will miss scheduled rotations during the Leave of Absence, it is the student's responsibility to make alternative arrangements. Contingent upon the reason and the number of days missed, the Progress Committee will consider whether or not a student should be promoted, retained, or dismissed. [Source: OCA 5/12/15]

Absence Due to Participation in Student and Service Organizations

Students who are in good standing are encouraged to participate in local, regional or national student organizations such as ASDA, ADEA, AADR, SPEA or in service-related activities for IUSD. However, students must recognize that their primary focus should be on academics, and therefore must weigh the impact of these absences on their learning. When travel is involved, students must first get approval from their course directors and then the Office of Academic Programs through submission of the required Student Travel Form (see the **Student Travel** section of this handbook and **Appendix P**). Even though the student is approved to travel by the Office of Academic Programs, the course/clinic directors determine whether or not the absence is excused. It is the student's responsibility to reschedule any rotations, according to accepted clinic practices, or other prescribed academic obligations.

Attendance and Religious Observances

IU respects the right of all students to commemorate personal religious observance and will make reasonable accommodations, upon request, for such observances. Students seeking accommodation for religious observances must complete the Request for Course Accommodation Due to Religious Observance electronic form (https://studentcentral.iupui.edu/calendars/holidays/course-accommodation-form.html) and submit a printed copy of the form to the Office of Academic Programs (oasamail@iupui.edu) by the end of the second week of the semester. The Office of Academic Programs will send notification of the approval to faculty and clinical directors. It should be noted that while campus policy requires faculty to make reasonable accommodations for missed assignments or examinations for religious observances, it is NOT campus policy for faculty to make accommodations when students wish to travel to share a holiday with family and/or friends.

Clinical Attendance

Clinic attendance levels are monitored by the Office of Clinical Affairs.

Students falling below the required level of productivity and participation are subject to disciplinary action, up to and including dismissal.

When students are accused of or found to be in violation of the Clinical Manual, the Associate Dean for Clinical Affairs has the right to suspend students from all clinical activity pending final results of the professional conduct and appeals processes. Given that violations of policies and procedures governing the clinics can impact patient health, impair student safety and impact school

liability, clinical suspensions are not subject to appeal.

However, before the Associate Dean for Clinical Affairs can suspend students from all clinical activity, he/she or the Associate Dean for Admissions and Student Affairs must interview the student(s) to hear their explanation of the issue(s). In the event of a suspension from clinical activity, the IUSD Dean and the Senior Associate Dean for Academic Programs must be notified.

ii. Who is responsible for tracking attendance?

INDIANA UNIVERSITY: The Office of Academic Affairs tracks the absences and determines whether the absence is excused or unexused. Students are required to report an absence and its reason to OAA. This is especially important when the absence is during an assessment period. However, students tend to skip class if a non-assessment day. Therefore, some course directors elect to take attendance during non-assessment periods (lectures, etc.) and make attendance a part of the student's grade for the course. To most, however, this takes a lot of time and effort on the part of support personnel.

The Office of Academic Programs is responsible for tracking attendance unless it is used by a course director for grading purposes through the course syllabus. If so, then the course director will track the attendance as they see fit.

iii. How effective is your policy?

INDIANA UNIVERSITY: It depends on who you ask. If you ask the administration, it works well. However, Course Directors do not see communications from the Office of Academic Affairs in which the absent student is not granted an escused absence (and thereby allowed to make up any work including an assessment). So it seems to be only effective if the Course Director takes attendance while paying attention to the fact that students are "always" grated an excused absence. A Catch 22.

b. What is your policy with student complaints about grades?

INDIANA UNIVERSITY: Students who wish to challenge any test item for a higher grade must submit their challenge(s) to their elected class representative(s) (Testing Committee) who will then forward all challenges to the appropriate instructor within five (5) business days of receipt of the examination. When the questions that are being challenged are part of a final examination, the Testing Committee may be allowed the opportunity to address their concerns in the first five (5) business days of the following term. In the interim, grades for the term will be reported based on the pre-challenge exam results. Instructors who agree to modify scores due to the Test Committee discussion that occurs at the beginning of the next term, will edit grades to reflect the revisions. No student's grades will be lowered based on the Test Committee challenge, but student scores may be improved. [Source: CAC 5/12/15 approved by FC]

Each instructor has the prerogative to develop his/her own method of addressing grade challenges; however, deviation from the aforementioned policy must be outlined in detail in the syllabus and explained on the first day of the course. Please note: This policy should not discourage students from approaching faculty and instructors when their pursuit is to acquire information,

knowledge, or clarification of the subject matter. It is the responsibility of the elected class test representative(s) (Testing Committee) to relay information back to the class requiring faculty clarification of challenged test questions.

If a student has a disagreement concerning a grade or evaluation other than a test question(s), the student must discuss the disagreement initially with the faculty member.

If the student desires to *challenge* a faculty decision with respect to a course grade, the student should contact the Senior Associate Dean for Academic Programs within ten (10) business days of receipt of the contested course grade. The Senior Associate Dean for Academic Programs will assign the challenge to the Assistant Dean for Academic Affairs, who will review the students' concerns, and, if appropriate, may contact the course director and/or faculty member involved to mediate. The Assistant Dean reviewing the challenge will not make any grade change

c. What is your policy on student absences?

INDIANA UNIVERSITY: If an excused absence, the student must be granted the right by the course director to make up the course work. Normally this is only critical when an assessment. Clinically this is only critical if the student has an extended leave of absence. (Third an fourth year students only need to be in the clinic 70% of the time.) In a preclinical course (lab or didactic) the course director states the policy in the syllabus. The course director may make any policy that is not in conflict with the student handbook (see above answers).

d.Regional licensure exam

i.What exam(s) does your school host?

INDIANA UNIVERSITY CDCA only.

ii. What's the general consensus towards the benefits of the exam?

INDIANA UNIVERSITY: It is important as a final test before licensure so it is thought important to keep. It is considered fair to the students.

iii. What's the general consensus on the elimination of the exam?

INDIANA UNIVERSITY The exam should not be eliminated but only modified. For example Indiana has difficulty with and is at odds with the choice and approval of caries activity by the CDCA. Indiana is very conservative and instructs not to restore the radiographic enamel lesions that are approved for restoration by the regional exam guidelines.

iv. What are the alternatives?

INDIANA UNIVERSITY Bench (typodont) exam. Modify restorative guidelines as to choice of lesion.

e. Discuss opinions on realigning the CODE regions.

i. Are there schools you feel should be in your region that are not?

INDIANA UNIVERSITY: No, there will always be schools close by that are in different regions. The line has to drawn somewhere. Indiana is happy in the Great Lakes region.

f. Discuss and describe suggestions for improving CODE.

	INDIANA UNIVERSITY: Suggestions have been made concerning having the meeting a different time of year but we are busy other times also. Consensus is to keep it in September/October.
Michigan	No written response submitted
Midwestern -Illinois	**a.** What is your policy on attendance? **Midwestern IL:** Mandatory attendance ix. Please provide the actual attendance policy statement. **Midwestern IL:** Attached x. Who is responsible for tracking attendance? **Midwestern IL:** Course directors xi. How effective is your policy? **Midwestern IL:** Effective **b.** What is your policy with student complaints about grades? **Midwestern IL:** Students may file grade appeals as outlined in our catalog **c.** What is your policy on student absences? **Midwestern IL:** Students have a certain number of allowed absences beyond which a grade deduction occurs **d.** Regional licensure exam xii. What exam(s) does your school host? **Midwestern IL:** ADEX, WREB, CRDTS xiii. What's the general consensus towards the benefits of the exam? **Midwestern IL:** Dentistry requires hand eye coordination and dealing with saliva, lips and cheeks. Live patient testing insures that the student can deal with this dynamic environment xiv. What's the general consensus on the elimination of the exam? **Midwestern IL:** Younger faculty and students want it replaced, older faculty think that it is needed xv. What are the alternatives? **Midwestern IL:** OSCE, required residencies, putting the onus of certifying a competent clinician on the school. **e.** Discuss opinions on realigning the CODE regions. xvi. Are there schools you feel should be in your region that are not? **f.** Discuss and describe suggestions for improving CODE.
Ohio State	**a.** What is your policy on attendance? See attached viii. Please provide the actual attendance policy statement. ix. Who is responsible for tracking attendance? Office of Academic Affairs x. How effective is your policy? **b.** What is your policy with student complaints about grades? Not sure we have a policy. The students will usually go to student affairs and complain then they go to the academic dean who usually contacts the course director. **c.** What is your policy on student absences? **d.** Regional licensure exam xi. What exam(s) does your school host? CDCA xii. What's the general consensus towards the benefits of the exam? xiii. What's the general consensus on the elimination of the exam? xiv. What are the alternatives? PGY 1 in Ohio or WREB **e.** Discuss opinions on realigning the CODE regions. xv. Are there schools you feel should be in your region that are not? Kentucky?? **f.** Discuss and describe suggestions for improving CODE.

Pittsburg	**a.** What is your policy on attendance? Please provide the actual attendance policy statement. viii. **University of Pittsburgh-**ATTENDANCE POLICY: The School publishes the calendar for each academic year at the beginning of the fall term of that year. The academic calendar includes starting and ending dates for each of the fall, spring, and summer terms, which may differ from the University's academic calendar. Students should not make personal plans on dates in which they are scheduled to be in class and/or clinic. The School does not support changing of exams, small group rotation schedules, or clinical schedules except in the event of a documented medical illness, family emergency, or approved School-sponsored activity. Final exam draft schedules are released at the beginning of each term. The School reserves the right to modify the exam offerings within the final examination week and students are expected to be present until the end of the scheduled examination period. Personal or travel plans made prior to the end of the final examination week will not be considered an excused absence. The faculty and administration of the School expect every student to attend all scheduled lectures, seminars, small group rotation sessions, laboratory sessions and clinic assignments, except in the event of illness, emergency, or approved School-sponsored activity as noted above. Regular class attendance is a student obligation, and a student is responsible for all work, including tests, written work, and clinical obligations including those missed during excused absences. Completing missed curriculum material is the responsibility of the student. Excessive absenteeism, as determined by the course director, could have an adverse effect on a student's performance and may result in a Global Assessment entry as well. Students needing academic accommodations should contact the Office of Disability Resources and Services for further assistance. Attendance at clinic rotations in the Comprehensive Care Modules is monitored through the Successful Practice Management course series. Students falling below the expected level of participation are subject to disciplinary action and/or grading sanctions as outlined in course syllabi. Clinic attendance in areas outside the Comprehensive Care Modules will be determined and monitored at the respective departmental level. Students should consult their Comprehensive Care Module team leader and/or clinical rotation director to determine the make-up policies for any sessions that are missed as a result of clinical externships or residency program interviews. Students should notify their course instructors and the Office of Student Affairs of illness, death in the family, or other unusual circumstances that may affect their ability to meet deadlines for assignments or necessitate being absent from classroom, laboratory or clinical assignments of one day or longer. In the case of emergency, the Office of Student Affairs will notify the appropriate faculty members of the student's absence. Students must contact appropriate faculty members upon their return. In any event, students remain responsible for any assignments and lecture material missed during their absence. Where appropriate, course directors are encouraged to assist students who for good

	reason are absent from classes. Absences of longer duration, including leaves of absence, must be approved in writing by the Office of Student Affairs. Students are referred to the School's "Policies and Procedures for Leaves of Absence or Withdrawal" section of this document for more information. ix. Who is responsible for tracking attendance? **University of Pittsburgh-** Faculty x. How effective is your policy? **University of Pittsburgh-**Non-effective. Will become less effective when it becomes mandatory for lectures to be audio taped. **b.** What is your policy with student complaints about grades? **University of Pittsburgh-** There are test representatives in every class which will talk to the instructor if there are complains concerning an examination. Students do question their grades with the respective course director. It is the decision of the course director whether to curve examinations to achieve a more equitable grade distribution. **c.** What is your policy on student absences? **University of Pittsburgh-**See above. **d.** Regional licensure exam xi. What exam(s) does your school host? **University of Pittsburgh-**CDCA **xii.** What's the general consensus towards the benefits of the exam? **University of Pittsburgh-**Students do not like it. xiii. What's the general consensus on the elimination of the exam? **University of Pittsburgh**-Because our requirements are so low, there needs to be some exam with which to evaluate the students for licensure. xiv. What are the alternatives? **University of Pittsburgh-**The CDCA is working on a pilot program to replace the patient based portion of the examination utilizing only typodont teeth. **e.** Discuss opinions on realigning the CODE regions. xv. Are there schools you feel should be in your region that are not? **No** Discuss and describe suggestions for improving CODE. **University of Pittsburgh-**I believe CODE is a great resource for understanding how other dental schools educate their students and deal with issues involving students. I personally feel CODE provides a vital function. I would just be curious how many CODE representatives are approached by their school administrators as to the information collected and discussed at our meetings
University of Illinois-Chicago	a. What is your policy on attendance? i. Please provide the actual attendance policy statement. See attached ii. Who is responsible for tracking attendance? Course directors and component directors. iii. How effective is your policy? UIC: The new testing policy is working great (grade reduction to minimum passing) if they don't have an emergency or acute illness and miss an exam. Otherwise, it's really hard to track and adjudicate excessive absences. It has to go through SSP as a professionalism issue. b. What is your policy with student complaints about grades? UIC: We have an official grade grievance policy but most complaints are handled at the Course Director level. Students are encouraged to review their performance with the faculty if they have questions, but we communicate that exams are not regraded and grades do not change unless there is a mathematical error. c. What is your policy on student absences? UIC: From our policy doc: No

	absences are considered "excused", unless an official Leave of Absence (LOA) has been approved by the Associate Dean for Academic Affairs. Students are encouraged to use the ample amount of time during break weeks to attend extracurricular functions not directly supporting or representing the College. Planned and unplanned absences will be handled on a case-by-case basis at the discretion of the Course Director. Students participating in clinic must consult with their MP/Clinic Manager. A student who misses 3 or more consecutive days of class is required to submit a doctor's note from their primary GP or UIC Health Services to the Office of Academic Affairs, prior to returning to class. d. Regional licensure exam i. What exam(s) does your school host? UIC: CDCA ii. What's the general consensus towards the benefits of the exam? UIC: Students are not in favor of the exam. It adds stress and pressure. "ideal lesions" for CDCA exam may possibly be better managed with alternative treatment options. iii. What's the general consensus on the elimination of the exam? UIC: Faculty are not in favor of the exam as it contradicts our treatment philosophy. The exam may not the best method to measure competency. Some faculty believe it should be replaced by an OSCE or a portfolio. iv. What are the alternatives? UIC: OSCEs or Portfolios e. Discuss opinions on realigning the CODE regions. i. Are there schools you feel should be in your region that are not? f. Discuss and describe suggestions for improving CODE. UIC: Topics suggested to discuss: i. As we are treatment planning more indirect restorations such as CADCAM inlays and onlays, discuss how and where it's sequenced in the curriculum, and what current the clinical trends are at various schools.. ii. Amalgam versus composite.
West Virginia	**a.** What is your policy on attendance? **West Virginia University** Attendance is mandatory for all preclinic labs and lectures. Two unexcused absences results in a letter grade drop. Lateness is disruptive and is treated as unexcused absence, two infractions of tardiness is counted as one absence. An unexcused absence the day prior to or following a holiday or break will be counted as two (2) absences, resulting in one letter grade drop from the final grade. The number of absences resulting in a grade letter drop is determined by the credit hour designation. For example, in a one-hour course, two absences will result in a letter grade drop from the final grade. Also, sleeping in class is an indication of inattentiveness and will be recorded as an unexcused absence. An absence the day before or following a break/holiday is counted as two unexcused absences. Consequences of lateness for an exam or quiz varies depending on the course. It is outlined in each course syllabus. The consequences vary from loss of time for the exam/quiz, to inability to take it and receive a score of zero, with no option to retake/take later. For the clinic, 95% attendance is required each semester and is tracked by available clinic hours per semester. Student hours are classified as provider, rotation and assistant- which permits us to see the % of time the student is spending on rotations and providing care vs. being present in an assisting capacity only. The 5% time off accounts

for time for lab work, medical appointments, preparing for boards, interviews, etc.

i. Please provide the actual attendance policy statement. **West Virginia University** (See policy attached at end of Agenda)
ii. Who is responsible for tracking attendance? **West Virginia University** Preclinic courses: the course directors. In clinic, attendance is entered into and tracked through axium.
iii. How effective is your policy? **West Virginia University** Most students adhere due to the official policy and risk of consequences (such as loss of clinic privileges)

West Virginia University: Attendance Policy:

Syllabus statement:

Attendance is mandatory. Lateness is disruptive and will be treated as an unexcused absence. As defined in this course, lateness is when the classroom door is closed by the faculty member. **(This definition may be different for different courses.)** Calling the Dean's office (304-293-2521) to report that you are going to be tardy or absent is mandatory, but does not mean the absence is automatically excused. Excused absences are only those resulting from death in the family, hospitalization, or official University functions. Two infractions of tardiness will be treated as one absence.

The number of absences resulting in a grade letter drop is determined by the credit hour designation. For example, in a one-hour course, two absences will result in a letter grade drop from the final grade.

In preclinical courses, attendance is counted separately for lecture and lab sessions meeting the same day.

Clinical Attendance Policy

In order for the student to attain the goals of clinical competency in all of the prescribed clinical disciplines, a MANDATORY clinical attendance policy is in place. The student must be PRESENT at each clinical session. Attendance will be monitored using the Axium Clinical Tracking System which we have established. All clinical activities in which the student is engaged will be monitored including direct patient care, work on assignments, chair side assisting, Health Right, manikin practice, and special needs patient care.

Attendance data is utilized by the Academic and Professional Standards Committee as one of many factors to determine positive progression through the curriculum, lack of progress relative to sanctions up to and including dismissal, repeating a year, and determining a student's readiness for graduation. All students in the clinical portion of their curriculum must have six complete semesters of clinical attendance at 95% or above. If the attendance for a semester falls below 95%, the student must make up this time by volunteering for assignments during unscheduled time, volunteering for the Health Right clinic, and/or scheduling and treating a student's own family of patients during a clinical session in which the priority scheduling is for the other class in the clinic. Attendance hours received beyond the 95% may be credited to the next semester only. Any deficiencies in total attendance hours must be corrected by the conclusion of the Spring semester of the Senior Year.

Less than 95% clinical time utilization is considered unsatisfactory for progression through the clinical curriculum. Deficient hours for each semester will accrue over the course of the student's clinical curriculum.

Please consult your team leaders and any administrators within the School if you have any questions concerning this policy.

	Seminars and Instructional Sessions Attendance Students must be accountable for attending all clinically-related **mandatory seminars/instructional sessions**. For each session missed, a sanction will be imposed at the discretion of the Clinical Dean. Sanctions may include writing a research paper on the content covered or revocation of clinic privileges for a minimum of one week. **b.** What is your policy with student complaints about grades? **West Virginia University** Student complaints are expected to follow the "chain of command" – course director, department chair, academic or clinical dean and lastly, the Dean for the School of Dentistry. If unresolved, the next level is the VP or Provost or CODA depending on the issue. **c.** What is your policy on student absences? **West Virginia University** (See attendance policy) **d.** Regional licensure exam i. What exam(s) does your school host? **West Virginia University** CITA/SRTA ii. What's the general consensus towards the benefits of the exam? **West Virginia University** The only path available for our students to achieve state licensure at this time. CITA (being an ADEX exam) offers our students more portability, but SRTA does allow lesions to be pre-approved by SRTA approved faculty members (who are SRTA board examiners), thus eliminating the fear that a patient will not qualify. (All students are encouraged to take a clinical board exam, but are not required to pass a board exam to graduate. Exceptions are when a student is going to a state/program which does not require such board exam.) iii. What's the general consensus on the elimination of the exam? **West Virginia University** Our state board is not in favor of eliminating a patient-based exam and is actually in the process of making the exam slightly more rigorous by mandating that the periodontal portion be completed, as well as potentially eliminating some of the exams it will accept. iv. What are the alternatives? **West Virginia University** While there is a movement toward patientless exams, again, our state board is currently not in favor of this. **e.** Discuss opinions on realigning the CODE regions. i. Are there schools you feel should be in your region that are not? **f.** Discuss and describe suggestions for improving CODE.
Western-Ontario	**a.** What is your policy on attendance? i. Please provide the actual attendance policy statement. **Western University:** First year D5125- "**Attendance at all sessions is compulsory**. Absence must be supported by valid documentation. In such cases formal procedures for academic accommodation will be followed" and **"**If the ability of a student to be present for an operative exercise or practical examination is compromised by illness, injury, birthing, bereavement, etc, accommodation may be negotiated. This will require the involvement of the Academic Affairs office and/or Learner Equity and Wellness office in the case of examinations worth more than 10%. **No circumstance will altogether**

excuse a student from completing any element of the course. Every exercise or practical examination must be completed before consideration is given to advancement to year two. Students should advise the course director as early as possible (depending upon the specifics) of any circumstances that will cause them to be absent"
and "The Chair of the Division may deny the privilege of sitting the written or practical final examination to any student who fails to attend or remain in attendance at one or more regularly scheduled lecture or simulation clinic sessions without an acceptable reason. A mandatory attendance policy is necessary to protect the interests of both students and patients."

Second Year D5225- "Student attendance is mandatory at all lectures and practical exercises. The Chair of the Division may deny the privilege of sitting the written and/or practical final examinations to any student who fails to attend the scheduled lectures or simulation clinic sessions for reasons other than illness, injury, bereavement or birthing or other extenuating circumstance approved by the course director. In case of student absence from assignments, practical exams or midterm exams, medical or non-medical documentation must be provided. Such documentation must be submitted by the student directly to the Academic Affairs Office for Dentistry. It will be the Director`s Office that will determine if accommodation is warranted. Academic accommodation for work representing 10% or more of the student's overall grade in the course shall be granted only in those cases where there is documentation indicating that the student was seriously affected by illness and could not reasonably be expected to meet his/her academic responsibilities.
Policy on Accommodation for Medical Illness
https://studentservices.uwo.ca/secure/index.cfm
http://www.uwo.ca/univsec/pdf/academic_policies/appeals/accommodation_medical.pdf".
In addition, unexcused absence or absence without notification will affect the student's professional score, resulting in lost marks within their practical component of the course.

Third Year D5325- same as 2nd year

ITD D5395- same as 2nd & 3rd year.

ii. Who is responsible for tracking attendance?

Western University: The Course director, with help from row instructors. In Operative, specific tracking/attendance sheets are employed for this purpose

iii. How effective is your policy?

Western University: Effective- seems to work well/generally minimal problems.

b. What is your policy with student complaints about grades?

Western University: Generally handled at the course level- the course director would review the item in question with the student to explain why the result is as depicted according to the relevant criteria or scoring key. If there was a major or more generalized issue/concern, students could potentially bring it to Academic Affairs or the Student Complaints committee. Since moving to a pass/fail practical component, student complaints about grades have significantly decreased.

What is your policy on student absences?

Western University: See above re. student attendance. In the event of a long term student absence, documentation would need to be provided to the Academic Affairs and/or Learner Equity & Wellness offices.

c. Regional licensure exam

i. What exam(s) does your school host?

Western University: NDEB exam for graduates of accredited programs- written and OSCE
NDEB Assessment of Clinical Skills for foreign trained dentists- dentoform based practical exam
There are no regional licensure examinations in Canada- only a National one.

ii. What's the general consensus towards the benefits of the exam?

Western University: NDEB exam for graduates of accredited programs- that it is a necessary regulatory step, with the benefit of allowing licensure anywhere within Canada.
NDEB licensing exams for graduates of non-accredited programs/Assessment of Clinical Skills are more controversial. Positives are that it would allow qualified/competent individuals to become licensed without having to invest the time/financial commitment to attend an ITD program. Negatives are that it is solely written and dentoform based- an individual can potentially become licensed with little/minimal real patient treatment experience/knowledge.

iii. What's the general consensus on the elimination of the exam?

Western University: No knowledge of any plans/consensus for them to be eliminated. Have not heard of any strong feelings or push to change or eliminate the exam for graduates of accredited programs.
Some in the dental community are not in agreement with the direct licensing exam for foreign-trained dentists, and feel that an ITD program should be mandatory, however due to government policies/political reasons, this exam seems unlikely to change.

iv. What are the alternatives?

Western University: ITD program instead of the direct licensing exam for non-accredited graduates.

	d. Discuss opinions on realigning the CODE regions. i. Are there schools you feel should be in your region that are not? **Western University:** University of Toronto (if they are a member??) **e.** Discuss and describe suggestions for improving CODE. **Western University:** Meeting timing – possibility to hold it either in June or late August?

Attendance Appendix:
Detroit Mercy

SELECTED UNIVERSITY GENERAL POLICIES 2019-20

SELECTED UNIVERSITY GENERAL POLICIES

All University of Detroit Mercy Student Policies, unless otherwise specifically noted, apply to all students enrolled in the University. The following section of the University of Detroit Mercy School of Dentistry Academic Policy Handbook includes selected University of Detroit Mercy Policies for the convenience of School of Dentistry students and residents. This section is not intended to be an all-inclusive resource of University policies for University of Detroit Mercy School of Dentistry students and residents. The comprehensive resource may be found online on the main University of Detroit Mercy home page (www.udmercy.edu) and through TitanPass (https://tc.udmercy.edu).

UNIVERSITY AND CAMPUS CLOSURE NOTIFICATION PLAN

This information covers the University's procedure related to class cancellations and school closings due to weather conditions or other threatening circumstances.

You will notice that the procedure now includes a "Late Start" designation in those instances when weather conditions may temporarily create a safety hazard during the early morning commute hours. A Late Start delay will be for two hours. With 8:00 AM as the standard opening time at the University, an announced two-hour delay would mean that the University would open at 10:00 AM. See Late Start Frequently Asked Questions below for some of the questions you may have.

When the University or one of the three Detroit campuses needs to begin classes late or cancel classes, the information will be posted on the home page of the Detroit Mercy website and through the following media: Detroit TV channels 2, 4, 7, 50 and 62 and radio stations *WWJ-950 AM* and *WJR-760 AM*. Additionally a notice will be sent to all subscribers of the University's Emergency Alert System.

We hope that there will be minimal disruption to the academic class schedule with this slightly revised process, which will allow us to be prepared, especially during Michigan's winter months.

Sign up for the Free Alert System now!

SELECTED UNIVERSITY GENERAL POLICIES 2019-20

CONFIDENTIALITY OF STUDENT RECORDS
FAMILY EDUCATION RIGHTS AND PRIVACY ACT (FERPA)

Family Educational Rights and Privacy Act: University of Detroit Mercy maintains the confidentiality of student records in accordance with the Family Educational Rights and Privacy Act (FERPA) of 1974 as amended. At Detroit Mercy, the University Registrar coordinates the inspection and review procedures for student records, which includes admissions, personal, academic, and financial files as well as cooperative education and placement records.

No one outside the institution may have access to, nor will the institution disclose any information from, students' educational records without the written consent of the student, except: to personnel within the institution, to officials of other institutions in which the student seeks to enroll, to persons or organizations providing student financial aid, to accrediting agencies carrying out their accreditation function, to persons in compliance with a judicial order or subpoena; and to persons in an emergency in order to protect the health or safety of students or other persons. Personnel within the institution shall include administrative, supervisory, academic, research, or support staff, a person or company with whom the institution has contracted (such as an attorney, auditor, or collection agent), a person serving on the Board of Trustees, or a student serving on an official committee, such as a disciplinary or grievance committee, or assisting personnel within the institution in performing a task. All of these exceptions are permitted under the act.

Educational records or components thereof may be made available without the student's written consent to personnel within the University who are determined by the institution to have a legitimate educational interest. The University will maintain a **record of all requests and disclosures of personally identifiable information** except those made to University of Detroit Mercy officials. Legitimate recipients of all such records will be informed that they are not permitted to disclose the information to others.

Students may review their education records by making a written request to the Registrar or appropriate dean's office. Students may not inspect financial information submitted by their parents; confidential letters and recommendations associated with admissions, employment or job placement or honors to which they have waived their right of inspection or review; or educational records containing information about more than one student. The University is not required to permit students to inspect and review confidential letters and recommendations placed in their files prior to January 1, 1975.

The University may disclose the following categories of public or "directory" information for any purpose, at its discretion: student name, addresses, telephone numbers, dates of attendance, class, date and place of birth, major field of study, previous institutions attended, awards, honors (includes Dean's List), degrees conferred (including dates), photograph, past and present participation in officially recognized activities and sports, physical factors (e.g. weight and height of athletes).

Ohio State

THE OHIO STATE UNIVERSITY
COLLEGE OF DENTISTRY

OPERATING PROCEDURE

Issued: 05/09/2016

An operating procedure for dental hygiene and dental student attendance is essential for a common understanding of the responsibilities of students, staff members, course and/or clinic directors, the College's Associate Dean for Academic Affairs, and the Academic Progress Committee.
Furthermore, it must ensure accurate and timely communication of student absences to appropriate staff members and course and/or clinic directors so as to support student learning and facilitate appropriate patient care. University policy permits each college to develop its own student attendance operating procedures (University Faculty Rules 335-9-21).

The intention of this operating procedure is to define the expectation for attendance, the circumstances where dental hygiene and dental student absences are excused (allowing the student to make up graded work) and the process for notification regarding absences. Attendance at all course activities and clinical assignments allows students to maximize their educational experience and provide better care of our patients. This operating procedure is designed to empower students, reduce the impact on course and/or clinic directors, increase timely and accurate communication, and increase consistency by defining which types of absences are excused. Moreover, this operating procedure will benefit students, staff members and course and/or clinic directors by simplifying the process of communicating student absences. Multiple absences may impede a student's progress through the curriculum and delay the student's completion of the program. Generally, course and clinical activities occur Monday through Friday from 7:30 am – 4:30 pm, although various out of class assignments, assigned external rotations, and remediation opportunities may have schedules that precede or extend beyond these regular hours.

Definitions

Term	Definition
Planned Absence	An absence that could be reasonably anticipated by the student (e.g., medical appointment, National Dental Board Examination testing, wedding).
Unplanned Absence	An absence that could not be reasonably anticipated by the student (e.g., acute illness, transportation difficulties, oversleeping)
Excused Absence	Absence for which a student will be allowed to make up any graded work missed during the absence without penalty
Unexcused Absence	Absence for which a student may be allowed to make up graded work missed during the absence but may negatively affect the student's grade at the discretion of the course director, as stated in the course syllabus.
Scheduled Course/clinic Activities	Activities whose date and time are listed in the course syllabus distributed to students before or on the first day the course meets.
Immediate Family Member Adapted from the University Office of Human Resources Paid Leave Program Policy 6.27	Spouse; domestic partner; mother; father; sister; brother; biological, adopted or foster child; stepchild; legal ward; grandparent; grandchild; mother-in-law; father-in-law; sister-in-law; brother-in-law; daughter-in-law; son-in law; grandparent-in-law; grandchild-in-law; or corresponding relatives of the student's partner; other persons for whom the student is legally responsible; and anyone who stood in loco parentis to the student as a child.

THE OHIO STATE UNIVERSITY
COLLEGE OF DENTISTRY

Procedure Details

1. Class Attendance:
   a. Dental hygiene and dental students are expected to attend all **scheduled course/clinic activities** as determined by the course director and/or clinic director and as stated in the respective course syllabus.
   b. When a course director determines that a dental hygiene or dental student stops attending a course, the Associate Dean for Academic Affairs should be notified as soon as possible (University Faculty Rules 335-9-21).
2. Student Absences
   a. General
      i. It is the responsibility of the dental hygiene or dental student, as directed by the course and/or clinic director to which the work pertains, to work with appropriate course and/or clinic directors and staff members to complete all missed work and clinic responsibilities due to an absence.
      ii. If a dental hygiene or dental student fails to complete all missed work and/or clinic responsibilities as outlined by the course and/or clinic director before the end of the term, the student may receive an incomplete (I) or failing grade in the course depending upon the extent and nature of the missed work and/or clinic responsibilities.
      iii. If recreating a course activity that a dental hygiene or dental student misses for excused or unexcused reasons would be difficult due to cost, availability of equipment or other reasons, the course director may provide an alternative activity that will meet the educational objectives of the original activity.
      iv. If a dental hygiene or dental student is on a rotation to an external clinical experience, such as for the OHIO Project, the student will follow the schedule of that external clinic. For **planned absences** that involve a student's attendance at an external clinic, it may be possible for the student to reschedule his/her rotation through the clinic scheduler/OHIO Project assistant if done early enough.
      v. Excessive absences, planned or unplanned, may result in a dental hygiene or dental student being unprepared and therefore unable to move forward in the curriculum or to graduate. This determination will be made by the Academic Progress Committee.
   b. Planned Absences
      i. General
         1. Whenever possible, dental hygiene and dental students must schedule these events or activities at times that do not conflict with required course/clinic responsibilities. A planned absence in which a student could reasonably schedule so as not to conflict with a significant graded course activity will not be excused.
         2. For all planned absences, the Office of Student Affairs must be notified as far in advance as possible but at least 2 weeks before the planned absence, except for religious holidays as indicated below.
         3. The Office of Academic Affairs will consult with course and/or clinic directors to determine the courses for which planned student absences would not be excused. An example might be courses that are densely scheduled in a short period of time.
      ii. Excused Absences
         1. College-related business – When dental hygiene or dental students attend events or activities on behalf of the college, their absence is excused. Examples may include presenting student research results at IADR/AADR, ADHA, or ADEA meetings, attending a national conference for a national student organization, participating at an event or activity at the request of the college administration. Participation of a dental hygiene or dental student in these activities must be approved by the Chair of the Division of Dental Hygiene or the Office of Academic Affairs respectively, in consultation with the directors of the affected courses before the event occurs.
         2. Interviews – As dental hygiene and dental students prepare for careers after graduation from the college, they may need to attend interviews at locations outside of the College of Dentistry. Students will be granted **excused absences** by the Associate Dean for Academic Affairs (in consultation with the Chair of the Division of Dental Hygiene for dental hygiene students) for a reasonable number of interview days based upon individual circumstances, such as the type of post-graduate opportunity and timing of the interview days.

3. National Board Dental Examinations – Dental students are required to pass Part I of the National Board Dental Examination as a condition of their continued participation in clinical activities and they must pass Part II for graduation. Therefore when dental students take the national board exams, their absence is excused. Dental Hygiene student are not excused from class to take the National Board Dental Hygiene Exam unless they have permission from course directors when no other options are available.
4. Religious Holidays – It is the policy of The Ohio State University and the intent of the College of Dentistry that students be granted excused absences from class, clinics, and exams to observe religious holidays.
    a. The Office of Academic Affairs will consult with the dental hygiene or dental student, the student's course and clinic directors, and the Division of Dental Hygiene for dental hygiene students to determine which religious holidays will be excused.
    b. Notification of the absence should be made no later than one month before the beginning of the term in which the religious holiday is to be observed by the student.
5. Civic/Military Duty/Subpoenas – When dental hygiene or dental students are required to participate in military activity and/or civic responsibilities (e.g., absence resulting from receiving a subpoena or from jury duty that cannot be rescheduled), they will be granted an excused absence, or a leave of absence if more appropriate, as determined by the Associate Dean for Academic Affairs. Absence due to voting in local, state, or national elections will not be excused.
6. If a dental hygiene or dental student is in good academic standing, a planned absence for other reasons may be excused as determined by the Associate Dean for Academic Affairs in consultation with the student's course and/or clinic director and the Chair of the Division of Dental Hygiene for dental hygiene students.

c. Unplanned Absences
    i. General
        1. Dental hygiene and dental students may need to be absent from class/clinic responsibilities unexpectedly. For such an absence to be excused, students must notify the Office of Student Affairs as soon as possible.
        2. Excused Absences
            a. Personal illness – When a dental hygiene or dental student becomes ill and unable to attend class/clinic due to this illness, they should seek medical care. Documentation from an appropriate health care provider may be required by the Office of Student Affairs for the absence to be excused.
            b. Family illness – When **immediate family members** who are dependent upon the student for their care are ill, it may be appropriate for the student to be absent to care for the immediate family member. Documentation of the dependence of the immediate family member may be required by the Office of Student Affairs for the absence to be excused.
            c. Personal/Family Emergency – Documentation of the reason for this absence may be required by the Office of Student Affairs. Examples of this could include, but are not limited to, the following:
                i. Transportation issues not in the control of the student (e.g., car accident)
                ii. Death of immediate family member
                iii. Unexpected childcare issues

Applies to: Dental hygiene and dental students

3. Other reasons for an **unplanned absence** may be excused as determined by the Associate Dean for Academic Affairs in consultation with the student's course and/or clinic directors and the Chair of the Division of Dental Hygiene for dental hygiene students.

d. Unexcused Absences (planned and unplanned) The consequences for missing class sessions or activities without an excused absence are determined by each course director and provided in the course syllabus. These consequences could include, but are not limited to, the following:
   i. If a student misses more than a specified number of course activities as stated in the course syllabus without excused absences and fails the course, then the student must retake the course at the next offering, i.e., there would be no opportunity for remediation.
   ii. If a student misses a graded activity in the course without an excused absence, the student may participate in the graded activity at a later date but the score may be reduced as specified in the course syllabus.
   iii. If a student misses more than a specified number of course activities without excused absences, the student would not receive bonus course points or could lose course points as stated in the course syllabus.

3. Notification Protocol
   a. The student will notify the Office of Student Affairs, preferably using their OSU email account, or by phone if necessary, for any absences as soon as the student is aware that they will not be in attendance.
   b. The Office of Student Affairs will inform the appropriate staff members, course and/or clinic directors, and the Chair of the Division of Dental Hygiene for dental hygiene students of any absences on a timely basis. Examples of those individuals include:
      i. Clinic director – for students scheduled for clinical sessions
      ii. Course director(s) – for the course(s) from which the student will be absent
      iii. Clinical rotation desk – if the student is assigned to a rotation
      iv. Clinic scheduler/OHIO Project assistant
   c. Notification of the absence will include the days for which the student is expected to be absent and whether the absence is excused or unexcused.
   d. The Office of Student Affairs will inform the Associate Dean for Academic Affairs if a dental hygiene or dental student is absent for more than five days in a semester.
4. Appeal Process for Extenuating Circumstances
   a. If a dental hygiene or dental student deems that an absence should be excused but does not fall within the categories of excused absences listed above, he/she may submit an appeal.
   b. This appeal must be submitted in writing to the Associate Dean for Academic Affairs no later than five College of Dentistry business days after the student returns to the college for the appeal to be considered.
   c. The Associate Dean for Academic Affairs, in consultation with the appropriate course director/clinic director/staff, and Chair of the Division of Dental Hygiene for dental hygiene students, will determine if the absence is excused.
   d. If the appeal is not approved, the absence will remain unexcused and the consequences of the **unexcused absence** will remain in effect.

Applies to: Dental hygiene and dental students

Responsibilities

Position or Office	Responsibilities
Associate Dean for Academic Affairs	1. Review and revise the student attendance operating procedure as needed. 2. Notify course and/or clinic directors and staff members of revisions to this operating procedure 3. Review course syllabi to ensure that this operating procedure is referenced and the specific attendance requirements for the course are clearly defined 4. Consult with appropriate course directors and the Chair of the Division of Dental Hygiene (for dental hygiene students) for planned and unplanned student absences as described above 5. Receive notification from the Office of Student Affairs if a student is absent more than 5 days within an academic term 6. Review and render decisions (with consultation of appropriate course directors and the Chair of the Division of Dental Hygiene for dental hygiene students) on student appeals for excused absences
The Office of Student Affairs	1. Inform and advise students on appropriate use of the student attendance operating procedure 2. Receive all notices of absences (planned and unplanned) from dental hygiene and dental students 3. Inform appropriate course/clinic directors, on-site staff members, and the Chair of the Division of Dental Hygiene of all student absences in a timely manner 4. Inform the Associate Dean for Academic Affairs of student appeals or if a student is absent for more than five days within an academic term
Chair of the Division of Dental Hygiene	1. Inform the Associate Dean for Academic Affairs of the absences for college-related business events or other reasons that are excused for dental hygiene students 2. Receive notices of planned and unplanned absences from Office of Student Affairs
Clinic Scheduler/OHIO Project Assistant	1. Receive notices of planned and unplanned absences from Office of Student Affairs 2. Inform appropriate rotation staff of all student absences in a timely manner
Student	1. Be aware of and follow this student attendance operating procedure
Course and/or clinic directors	1. Incorporate course policy on student attendance in course syllabus 2. Monitor student participation in all scheduled graded course activities 3. Inform the Office of Student Affairs if a student is absent and the course and/or clinic directors have not been notified of this absence by the Office of Student Affairs 4. Inform the Associate Dean for Academic Affairs if a student has stopped attending scheduled course activities 5. Inform the Office of Academic Affairs when issues related to student attendance arise
College Registrar	1. Receive notices from the Associate Dean for Academic Affairs of students who stop attending a course 2. Determine if the student is no longer active in the predoctoral dental program 3. Redefine the student's academic status as necessary

University Faculty Rules Chapter 3335-9 Attendance and Graduation; section 3335-9-21 Absences University Faculty

Rules Chapter 3335-9 Attendance and Graduation; section 3335-9-22 Group absences University Office of Human

Resources Paid Leave Program Policy 6.27

Applies to: Dental hygiene and dental students

Subject	Office	Telephone	E-mail/URL
Notification for student	Office of Student Affairs	614-292-7809	dentistrystudentaffairs@osu.e
Notification by course directors of students who stop attending courses	Office of Academic Affairs	614-292-4250	delong.89@osu.edu hamamoto.4@osu.edu
Notification of clinic supervisors of student absences after being informed by the Office of	Office of Community Education	614-292-6111	levings.2@osu.edu
Appeal of an unexcused absence	Office of Academic Affairs	614-292-4250	delong.89@osu.edu hamamoto.4@osu.e

History

Issued: 05/09/2016

Regional Meeting Report Form

Region:

Host University, Address, and Dates of the **2019 Regional Meeting**:

Host University	Address	Dates of Meeting
Indiana University School of Dentistry	1121 W. Michigan Street Indianapolis, IN 46202	October 3 & 4 2019

Chairperson and Contact Information for the **2019 Regional Meeting**:

Chairperson	University/Address	Phone/email
Michele L. Kirkup	Indiana University School of Dentistry 1121 W. Michigan Street Indianapolis, IN 46202	317-274-5576 mkirkup@iu.edu

List of Attendees: (Please complete the CODE Regional Meeting Attendees Form on the following page)

Contact Person, Host University, and Dates of the **2020 Regional Meeting**:

Contact Name Phone/email	Host University/Address	Dates of Meeting
Tammy Chipps 304-293-1245 tchipps@hsc.wvu.edu	West Virginia University 64 Medical Center Drive PO Box 9600 Morgantown, WV 26506-9600	October 2020

Regional Meeting Attendee's Form

Name	University	Phone	email
Michele Kirkup	**Indiana University School of Dentistry**	317-278-5576	mkirkup@iu.edu
Lisa Willis	**Indiana University School of Dentistry**	317-278-3612	lhwillis@iu.edu
Kim Diefenderfer	**Indiana University School of Dentistry**	317-274-3715	kediefer@iu.edu
Brooke Adams	**Indiana University School of Dentistry**	317-439-2256	bnadams2@iu.edu
Paul Reifeis	**Indiana University School of Dentistry**	317-278-1858	pereifei@iu.edu
Blaine Cook	**Indiana University School of Dentistry**	317-274-3715	nbcook@iu.edu
Laila Al Dehailan	**Indiana University School of Dentistry**	317-640-4712	laldehai@iu.edu
Swati Chitre	**University of Detroit Mercy School of Dentistry**	313-494-6783	chitresd@udmercy.edu
Nahid Kashan	**University of Detroit Mercy School of Dentistry**		kashanin@udmercy.edu
Ron DeAngelis	**University of Pittsburgh School of Dental Medicine**	412-648-0079	rjd43@pitt.edu
Tammy Chipps	**West Virginia University School of Dentistry**	304-293-1245	tchipps@hsc.wvu.edu
Janet Bolina	**The Ohio State University College of Dentistry**		bolina.1@osu.edu

Elmer EJ Newness	**The Ohio State University College of Dentistry**		newness.1@osu.edu
Steven Reynolds	**Midwestern University –Illinois**		sreyno@midwestern.edu
Elisabeta Karl	**University of Michigan School of Dentistry**	734-763-3340	ekarlz@umich.edu
Adriana Semprum-Clavier	**The University of Illinois at Chicago College of Dentistry**	312-996-1811	asemprum@uic.edu
Priscilla Chang	**The University of Illinois at Chicago College of Dentistry**	312-355-0552	ppchang@uic.edu
Greg Jensen	**Western University – Ontario**	519-661-2111 ext:88813	gjensen@uwo.ca
Maria Jacinta Santos	**Western University – Ontario**	519-661-2111 ext. 88930	msantos9@uwo.ca

Suggested Questions for 2020 National Agenda

Zirconia restorations (preparation guidelines, preclinical and clinical use)
How to attract adjunct faculty and how to calibrate (how to align the faculty)
Ergonomics
Student accommodations for examinations: What is allowed and how the students are authorized
Digital technology (use in operative, prepcheck/compare)
How do other schools testing on reading materials
Dress code
How to address students with anxiety and overcoming failures?

Regional Nominee for Presenting at the 2020 CODE Annual Meeting which in conjunction with the Academy of Operative Dentistry's Annual Meeting (Please Include Topic)

Name	Topic	Contact Info
Adriana Semprum-Clavier		asemprum@uic.edu

Please return all completed enclosures to:

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director

Senior Associate Dean for Academic Affairs
Oregon Health & Science University
School of Dentistry
2730 SW Moody Ave
Portland, OR 97201

staffoga@ohsu.edu

Deadline for return: 30 days post-meeting

Please send the requested documents via email with attachments

CODE AGENDA Region V Meeting Report

Submitted by James m. Kaim DDS Regional Chair
Recorded by Melissa E. Ing, D.M.D.

Venue: New York University College of Dentistry
Date September 17, 2019

Schools Represented: Howard, Boston University, NYU, Maryland, UConn, Tufts, Harvard, UNE, Tuoro, UPenn, Columbia, Stonybrook, Rutgers, Temple
Testing Agencies Represented: WREBs, CRDTs, CDCA

It should be noted that all 15 regional schools were represented, 8 of whom had two attendees and another 2 schools sent three representatives.

Manufacturers Represented: Ultradent, Columbia Dentiform, Colgate

Dr. Jim Kaim thanked the vendors, testing agencies and schools for attending CODE/CAMBRA 2019 and coming to NYU. Dr. Kaim said he was excited that there were so many attendees at this meeting and that there would be great networking and sharing of ideas.
Dr. Kaim noted that each attendee has a binder with discussion topics and National Agenda questions.

Dr. Kaim reminded the schools to ensure that membership dues need to be paid.

Topic: CDCA update Dr. David Perkins
Dr. Kaim asked Dr. Perkins to talk about the simulated carious tooth that is being currently evaluated by CDCA to substitute in part or entirely for the current patient operative procedures(s)

Dr. Perkins informed the group that effective 2021 the state of Connecticut will not allow the use of live patients in licensing exams. not
The tooth is being Beta tested this fall at 6 different sites. The manufacturer was not identified. He did mention that the tooth would be layered with the location of the decay being varied.

The exams will be completed by December and the results will be presented at the annual January 2020 meeting. Data from the beta test sites will be collected as part of the study. Dr. Perkins concern was whether not only state boards by the dental practice act of each state would permit the use of this simulation to replace patient testing.

This study will be published in the Journal of Dental Education.

Topic #1 Curriculum:

a. **How is your curriculum changing in reaction to the new Integrated National Board Dental Examination (INBDE)?**

Dr. Kaim had requested that a member representative provide an introduction or overview on the topic for the Integrate Curriculum. Rutgers volunteered and Dr. Don Lapine presented for Dr. Ken Markowicz.

Summary report: All schools provide the same general information. Examples

NYU: did a complete curriculum review. For years they have used a case based simulation in the simulation laboratory where students were treating their manikin patients with an associated personal profile, medical history, dental history, radiographs, chief complaints. Students had to address patient modifications if necessary, need for medical consults, and treatment for teeth specific to different parameters including patients needs and requests.

In addition seniors were required to take oral examinations. Real patient records were provided similar to the format of the WREB CTP examination, where faculty asked questions geared to specific treatment as related to the overall profile of the patient.

Tuoro: identified that the have weekly case based seminars with students

Boston U: said that they just started an integrated Case presentations where 4 students work on the same case presentation. For example a patient is presented with heart issues and taking medications. First year students presents the normal anatomy of the heart. The second year student discuss the pathology of the heart. The third year student discuss the pharmacology of the drugs the patient is taking and how that could modify or perhaps limit treatment. The fourth year student discuss the dental treatment.

Other schools: All said they were investigating or planning on making appropriate changes this year.

b. **How many attempts do students get to remediate an exam, a clinical procedure**, and a course? Exam _____ Clinical Procedure _____ Course _____

Summary report. . The general consensus is if a student fails a single exam unless it is a one exam (final) exam the protocol depends on the Academic Standards. If the course has multiple examinations a single exam a retake is not normally provided.

Clinic procedures: We assumed that meant a patient clinic procedure and we also assumed it meant a simulation mock board or competency test. All schools allowed a retake. If the same was failed twice student had to remediate prior to a third retake.

Course failure: The general response is that the policy is dictated by the Academic Standards of a school. It also depends a great deal on the number of total failures or deficiencies that a

student may have. So for example if a student has failed three course at the end of the academic semester. He/she may not be eligible for a make up course.

An additional question was asked if a student fails a course some schools require the student to repeat the academic year.

c**: Does your school rotate faculty in the preclinical course? And if your school does rotate faculty how often do they rotate? Weekly/monthly/other?**

Boston and Tufts do not rotate the faculty. All other schools rotate. However, Columbia's full time faculty do not rotate. Their visiting scholars rotate.

NYU, Touro, Rutgers, Stonybrook rotate monthly.

Harvard and UNE rotates weekly.

UPenn,k Temple, UConn, Marylad and Howard rotate by project

d. **Are you having difficulty attracting patients to any of your pre-doctoral teaching programs**?

All schools said that there do not have any dramatic shortage of patients to train students. However, schools said: " we want what is good for dental students as far as experiences and we may not have the experiences that we need."

BU said that to attract patients they offer a "$950 implant bundle placement" which includes CBCT, sinus lift if needed, and implant crown.

UConn said that they offer late night appointments, multiple insurance plans so the convenient hours have helped.

NYU said that the community dental offices, the ER 24 hour care which offers very convenient hours helps with their attainments of patients.

Touro said they advertise and NYU said they have seen the nice ads. They said they get a ton of patients but not necessarily the patients that are needed for the student experiences.

e. **Do you have enough patients to supply each pre-doctoral student with the essential experiences needed without sharing patients among students?** YES ____ NO ____

i. **What types of experiences are the most difficult to find in your patient pool?**

BU and Touro said endo are the most difficult procedures to find and they share those patients with other students. Faculty asked if that is a problem for patients to accept seeing another student. BU said no, the patients are told this they are accepted as patients. Other schools that share patients such as Howard University and other schools said that patients get a "discount" if patients are shared for treatment.

All schools said that there do not have any dramatic shortage of patients to train students. However, schools said: " we want what is good for dental students as far as experiences and we may not have the experiences that we need."

BU said that to attract patients they offer a "$950 implant bundle placement" which includes CBCT, sinus lift if needed, and implant crown.

UConn said that they offer late night appointments, multiple insurance plans so the convenient hours have helped.

NYU said that the community dental offices, the ER 24 hour care which offers very convenient hours helps with their attainments of patients.

Touro said they advertise. They get many patients but not the type needed for undergraduate students.

Summary report: Chairman's comment. The perception is that few schools were willing to admit that they had difficulty attracting patients. The difficulty often is specific procedures. For example many schools admitted it was difficult to find enough full denture patients, endodontic patients. Most schools admitted was extremely difficult to provide enough Class III patient specifically as all the more conservative ones were being allocated as board patients.

A number of schools indicated that they provide discount or special incentives. For example Boston has a $950 special for an implant including the restoration.

Some School have combined a junior and senior student in all treatment. Meaning every patient is seen by two students each visit. Depending on the procedure to be performed one performs the procedure and the other as the assistant. This is done in part to account to perhaps a shortage of patients but as important to provide a kind of mentoring system for the the junior student. It mimic the medical model from hospital interns.

A number of schools may move a patient depending on procedure. For example Stonybrook makes sure that every senior has completed their Endo requirements or has enough endo patients to do so before assigning allowing a junior to do the endo procedure. That is with the patient's pemission. Stonybrook states that is never an issue as patient is informed at registration that this could happen.

f. **Describe your screening/patient admissions process? (NON-Emergency patient)!_____**

Chairman's note: I took the liberty of adding the words Non Emergency Patient-

Summary report: This varies a great deal. Some schools have an admissions areas where students rotate where the initial exam and x-rays are taken and that student gets to keep the patient. Treatment plan may be generated there or patient could be transferred to module that is next on rotation. Some schools triage patients immediately to different clinics.

Emergency patients: Again this varies in the same way. Every school tries to convert an emergency patient into an active patient.

g**. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program? Yes No**

Summary report: answer by all schools was NO or not aware of any immediate changes.

h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? Yes *No*

Chairman's comment: I added if yes list your state:

Connecticut appears to be the only state that is looking to do this according the legislation passed in that state. Training apparently will be Dental Hygiene Schools.

Summary report: All schools said no however NYU commented that if the legislature of a state mandated MLP's than the schools would either be required or volunteer to do so perhaps to increase the revenue of the school

Agenda Topic 2: Cariology

a. **Cariology What terminology do you use at your institution to describe caries and also depth of caries? Both in preclinic and clinic**

Maryland: ICDAS is taught in pre-clin officially but modifying to ADA which will be a drop box of Axium.

BU: Pit and fissure caries, smooth surface caries and SALUD

Columbia: The students use a drop down menu in computer that shows primary caries, incipient caries, etc. ADA terminology is not used.

UConn said that they use ICDAS from 0-6. The system is integrated into Axium as well as ADA system eg. D2. Advanced caries. Caries are colour coded.

Harvard teaches incipient, initial, moderate but it is transition as far as implementation.

Michigan said that they do whatever Margarita Fontana tells the students to do.

New England uses ICDAS; primary, secondary, cavitated, acute and chronic.

NYU uses ICDAS. The depth of each lesion is recorded.

UPenn uses system with E1, E2, etc. No ICDAS.

Rutgers uses initial, moderate, advanced and this is not in Axium at this time but things may change with the new dean.

Stonybrook uses ICDAS and ADA system. In clinic use E1, E2.

Temple uses E1 to D3 and ICDAS. Some clinical faculty may still use infected and affected

Touro practice different than school. Touro uses ADA system: E1 to D2.

Howard: The students are taught everything in pre-clinical but when they come to the clinic. Using Axium but in clinic: taught "incipient, one surface, 2 surface"

Tufts is going through some changes and collapsed coded.

b: How does your school calibrate the faculty for caries diagnosis?

7 schools said that they use online training for cariology. Is this monitored? 5 of the schools monitor the online training.

Sometimes the schools give CE credit for the online training such as UPenn which gives 1 hour of credit and Rutgers.

Uconn: Blackboard also uses course materials, hand outs, Orientation materials. Full time faculty receive emails regarding materials.

Harvard faculty receive online modules and also get LLs.

Howard said that their faculty are not well calibrated but that they have a new chair and things will change.

Maryland said that they have in service courses and also online courses.

New England said that part time faculty come to CE courses. There are weekly calibrations and also simulation assignments. They also have in service learning, lectures, and modules and they also calibrate during the huddles.

NYU have in service training, lectures and modules.

UPenn have lectures, on line modules, and also huddle review.

Boston: uses Lunch and Learns (LL), Blackboard, meetings, we try to do it multiple times; 5 pm meetings are mandatory and if you want to be teaching in clinic you must be there.

Columbia: study groups, research

New England has part timers go to CE courses. They have huddles. Weekly calibration assignments.

c. How do you calibrate faculty for caries diagnosis

Boston: uses Lunch and Learns (LL), Blackboard, meetings, we try to do it multiple times; 5 pm meetings are mandatory and if you want to be teaching in clinic you must be there.

Columbia: study groups, research

Uconn uses Blackboard, course materials, hand outs.

Harvard: online modules. We are transition with caries diagnosis and will cover it lunch time 5 days of the week.

Howard: not well calibrated.

New England has part timers go to CE courses. They have huddles. Weekly calibration assignments.

Kaim: but how do you want things changed?

Faculty meetings

MD: On line modules.

Rutgers has online lecture capture and calibration exam.

Stonybrook has an in person mandatory lecture which is a Lunch and Learn.

Temple all faculty get monitored and it is an online calibration. Changes are emailed out.

Tufts has a new chair who is giving LL, having retreats to give learning segments. Tufts is also trying games with the faculty such as The Caries Challenge. Dr. Ing, Dr. Kaim, and Dr. Zandona said that they are also in the midst of a research project that involves a game/puzzle project and Lunch and Learn and can report back once they have completed the project on the results.

d. Which schools have a separate cariology curriculum or is it integrated in the operative course?

6 currently have a separate cariology course. Tufts is initiating a separate cariology course this fall but had a cariology workshop prior to this. Howard and UPenn would like to make a separate cariology course.

Agenda Topic III Materials and Techniques:

a. What does your school teach in terms of cusp replacement in composite resin?
Dr. Kaim Comment: This is a broad question let us assume this is direct placement composite. Let us list areas it is not permitted such as not permitted on supporting molar cusps,etc.

Summary Report: The overwhelming response varied from not permitted to strongly discouraged: That did allow some wiggle room as an interium restoration and the a disclaimer when on a non functional cusp. Nearly all schools preferred an indirect procedure.

b. **For the following, describe what is being taught, indications, materials used, frequency of use, etc**…

Chairman's comment. the format of the question made it impossible to separate the answers so it was restructured or re written.

	TAUGHT yes/no	Indications	Materials	Frequency
i. Class V composite resin?	_	All taught	Varied RMGI Flowable	
ii. Sandwich technique?	_____	Most yes	All different variations	
iii. Bulk fill technique?		Most school NO		
iv. (RMGI)?		Most school as a liner	most school Fuji	

v. Amalgam? _____

1. % of direct restorations? varied from 5% to as high as 30%

2. Bonded or unbonded? _no one bonded amalgams

vi. Air abrasion? _Most schools no others said very rarely.

c. **Doing more milled partial coverage because of the scanning and milling capabilit**y?

Yes No Most schools said yes

i. **Has it replaced gold in your clinic?** Yes No comment_most school said yes although some are still doing Gold

d. **Who performs molar endo?** i. Pre-doc __%,Endo Residents ----%,Endo Faculty ---%

Dr.kaim comment: for some reason I failed to record this information. I have specific information from 4 schools. I am listing this because it is surprising

The response to the is question is for all the patients in the pre-doc clinic that require Molar endo what is the breakdown of treatment by provider.

School #1

Who performs molar endo? i. Pre-doc 90%,Endo Residents 10% Endo Faculty 0%
School #2
Who performs molar endo? i. Pre-doc 0%,Endo Residents 10% Endo Faculty 90%
School #3
Who performs molar endo? i. Pre-doc 0%,Endo Residents ? % Endo Faculty ?%
School #4
Who performs molar endo? i. Pre-doc 2-3%,Endo Residents 95-97% % Endo Faculty 0%

Although the assumption is if Endodontic treatment is rendered by undergraduate students if would not be uncommon for a faculty member to step in and directly perform the procedure.
The one school that comment or responded to 90% stated that this was to allow students to meet a canal requirement for graduation as in the previous question answered by most schools there is probably an insufficient number of endontic patient or at least insufficient anterior and premolar endodontic patients::

Chairman's comments: The question of endodontic training does really not fall under the CODE umbrella. However the question should be asked if there is a CODA requirement or expectation that graduates are competent to perform endodontics what is the patient threshold number of experiences necessary?? Does plastic endo licensing examinations really insure competency??

e. **Do you utilize bond strength testing exercises?** Yes **No** All Schools except Tufts:

Tufts reports that in her Materials Workshop they do a bonding strength test so students can understand bond strength. Lab personnel bring in a machine with buttons of composite resin and students can test the "strength" of resin composite.

f. **Electric handpieces used in the simulation laboratory**?

Summary Report: A fair number of schools are using electric handpieces and the reports are all positive. Those that do not report the expense of switching over prevents a change

ii. If Yes, what system? ___Bien Air

Topic 4 . Student Assessment (National Agenda)

a. **Does your institution have an international dental program**? Yes No

Summary report: Most schools have an international dental program that is described as advanced standing students (foreign graduates) entering the undergraduate class and graduating with a diploma.

i. **If yes, does your school utilize a bench test?** Please describe. About 50% require a hands on manikin bench test which generally includes crown preparations and operative preparations. A few also require the placement of restorative materials.

ii. **If yes, how many students are enrolled?** #__varies by school from 10-80

iii. ***What year student are they admitted as*** *?* 1st **2nd January 2. 1/2** 3rd 4th Most are admitted somewhere in the second year. Example 3months in the second year and two complete years as Juniors and Seniors

Kaim Comment: *We are now shifting answers to the entire student body.*

b. **Do you evaluate students using OSCE's**?

Summary report. Most schools said NO although some schools do use them. Some schools report that other disciplines such as Prosthetics has **developed an OSCE .**

Describe your primary didactic testing methodology _____

Summary: most schools use multiple choice format with some mix of essays. Some schools also use oral exams as part of course requirements

Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…) List what is used:

Summary. Most use a computer grading system such as Scan Tron, and Exam Soft. Decision on systems varied and often was not determined by Restorative departments. A few still use paper.

Pros: speed of feedback, ability to analysize responses and overall results_

Cons: Cost

iii. **Are you investigating other methods**? Yes No School may be
All schools either said or not sure as not in their domain

Topic V. Administration (National Agenda)

Kaim comment: This question had a fair amount of discussion. The consensus is that the attendance policy is dictated by the administration and academic affairs. A few schools allowed departments to set their on attendance policy as long as it was clearly in writing and provide to students prior to the course.

Our group also questioned why this question was something members of CODE, who for the most part have no control over the attendance policy, is part of the agenda If an administration of a school is looking for feedback from other schools they should specifically contact the adminstration of that school.

Tracking of attendance when required in CODE course was the responsibility of the course director.

a. **What is your policy on attendance**? _____

i. **Please provide the actual attendance policy statement. Briefly describe & include attachment:**

summary report: With rare exception all lectures were optional. With rare exception all simulation labs were required with a percentage of absences permitted. One school had no mandatory simulation lab requirement. All schools had required clinic attendance with so many permitted absences'. .

ii. **Who is responsible for tracking attendance**?

General Summary: Tracking of attendance when required in CODE courses was the responsibility of the course director.

How effective is your policy?

Where there is no required attendance it is very effective

Where there is attendance is required it is only as effective as the recording system that is in place and the follow through of the guidelines. Most schools that reported mandatory attendance thought there systems were effective.

b. **What is your policy with student complaints about grades**?

Summary report. There was a mix of response for Code course and again it was determined by the stated academic policy. Where there is no policy students have no remedy other than an improper calculation or recording of the grade. Those that had a policy reported for the sim lab the course director could or would review individual competencies but rarely if ever changed the grade. Some schools had one faculty grading all competencies and some schools used selected faculty grading for all assignments.

c. **What is your policy on student absences:** depending on the school and course as mentioned above.

d. **Regional licensure exam Please put your school name:**_______

i. **What exam(s) does your school host?** All the schools in our region host the CDCA examination with 4 schools Touro, NYU, Boston & Tufts also hosting the WREB exam.

ii. **What's the general consensus towards the benefits of the exam**?

summary report: These exam are a burden on the academic programs as they take up clinic time, require schools to invest significant preparation time and financial resources for faculty, staff and students. This also necessitates specific preparation time geared for a few very specific procedures.

The only benefit is that it provides an independent or third party assessment of our students on a one time specific event. Specifically because these examinations are mandated by the state boards and legislature providing our students with a home base to prepare and take the examination is the only true benefit.

iii. **What's the general consensus on the elimination of the exam**?_____

Summary report: All school said the examination should be eliminated at least as it deals with patients.

iv. **What are the alternatives**?

Summary: the alternatives already exist the issue is probably to get states to change their dental practice act. Alternative as used in Canada is an OSCE. Some states have required or provide for licensure with a 5 th year of education.

v**. Discuss opinions on realigning the CODE regions.**

Summary: NO Changes suggested

f. Discuss and describe suggestions for improving CODE. please list below:

Summary report:

1. Paying Dues by Credit Card

2. Eliminate those questions that really not in the domain of CODE. Such as Endo questions, Administrative Policy questions etc.

3. Providing National summary reports to Dean's of our dental schools who in many cases don't even know we exist.

2019 South East Region VI
Consortium of Operative Dentistry Educators
and
Caries Management by Risk Assessment Coalition meeting
October 16-18, 2019

This Regional CODE/CaMBRA Report was compiled by-

Dr. Roopwant Kaur BDS, MS Clinical Assistant Professor of Operative Dentistry, Division of General Dentistry, East Carolina University School of Dental Medicine, Greenville, NC 27834

Dr. Kevin B. Frazier, DMD, EdS Professor of Restorative Sciences, The Dental College of Georgia at Augusta, University, Augusta, GA 30912

AU	Augusta University Dental College of Georgia
ECU	East Carolina University School of Dental Medicine
LECOM	Lake Earie College of Osteopathic Medicine School of Dental Medicine
MMC	Meharry Medical College School of Dentistry
MUSC	Medical University of South Carolina School of Dentistry
NSU	Nova Southeastern University College of Dental Medicine
PR	University of Puerto Rico School of Dental Medicine
UAB	University of Alabama School of Dentistry
UF	University of Florida School of Dentistry
UK	University of Kentucky College of Dentistry
UL	University of Louisville School of Dentistry
UNC	University of North Carolina at Chapel Hill School of Dentistry
VCU	Virginia Commonwealth University School of Dentistry

Table of Contents

(Section report page numbers)

October 16-18 Meeting Agenda…….3

Southern CaMBRA Coalition…….5

Regional CODE Questions…….....8

National CODE Agenda ……...76

CODE Regional Questions Responses

UA ……14
ECU……...16
GA……..24
MMC……..36
MUSC……43
UF……..50
UNC ……..56
UL …….59
UK ……64
VCU ……..69

CODE National Agenda Questions

1. Curriculum……...79
2. Cariology…….....91
3. Materials and techniques……93
4. Student Assessment…….....103
5. Administration…….....107

Suggested Questions for 2020 National Agenda …….....118

Regional Meeting Attendee's Form …….....119

Region VI Group Picture at ECU School of Dental Medicine…….120

Consortium of Operative Dentistry Educators
CaMBRA Coalition
Region VI (South) Meeting
Oct 16-18, 2019

Host Hotel:	Holiday Inn; 203 Southwest Greenville Boulevard, Greenville, North Carolina 27834
Meeting Venue:	East Carolina University School of Dental Medicine; 1851 MacGregor Downs Road, Greenville, NC 27834

Wednesday, Oct 16th

12:00-5:00	Arrive in Greenville, NC
5:30	ECU Transportation to Dinner – departure promptly at 5:30 pm
6:00-9:00	Dinner at *Nino's Cucino Italian Restaurant* **(Sponsored by Ultradent)** 511 Red Banks Rd, Greenville, NC 27858 ninoscucinaitaliana.com
9:00	ECU Transportation to Hotel – departure promptly at 9:00 pm

Thursday, Oct 17th

6:30	ECU Transportation to ECU SoDM– departure promptly at 6:30 am
7:00	Breakfast **(Sponsored by 3M)**
8:15	Welcome by Dr. Linc Conn, Chair General Dentistry (ECU) Dr. Luis Sensi, Division Director, Operative Dentistry (ECU) Dr. Roopsi Kaur, CODE/CaMBRA Regional Director (ECU) Introduction of Region VI Representatives
9:00-10:30	*CaMBRA Agenda Discussion/Presentation on Terminology, Faculty Calibration & Course Structure, Drs. Marcelle Nascimento & Jan Mitchell*
10:30-10:45	Coffee Break **(Sponsored by Ultradent)**
10:45-12:15	*Regional CODE Discussion/Presentation: Remediation Dr. Kevin Frazier*
12:15-1:15	Lunch **(Sponsored by GC America)**
1:15-2:45	*Presentation on INBDE Preparation – Dr. Todd Watkins*
2:45- 4:15	*Presentation on OSCE's and other non-traditional exams combined with didactic testing methods - Dr. Linc Conn*
4:15- 4:30	Coffee Break **(Sponsored by Ultradent)**
4:30-5:30	*Presentation on Student Attendance issues combined with Absence policies- Dr. Susan Bishop and Dr. Hiroko Nagaoka*
5:30	ECU Transportation to Hotel– departure promptly at 5:30 pm
6:30	ECU Transportation to Dinner – departure promptly at 6:30 pm
7:00-9:00	Dinner at *Dickinson Avenue Public House***(Sponsored by Dentsply Sirona)** 703 Dickinson Ave, Greenville, NC 27834 daphousenc.com

Friday, October 18th

7:00	ECU Transportation to ECU SoDM– departure promptly at 7:00 am
7:30-8:15	Breakfast **(Sponsored by Komet)**
8.15-8.30	Welcome presentation by Dean Dr. Gregory Chadwick (ECU)
8:30-10:00	*Composite Cusp Replacement and Milled Partial Coverage restorations – Dr. Luis Schlichting*
10:00-10:15	Coffee Break **(Sponsored by Ultradent)**
10:00 -11:30	*CODE National /Regional Agenda Discussion (Summary and Discussion)- Dr. Roopsi Kaur*
11:30-12:30	Boxed Lunches **(Sponsored by Brassler)**
12:30-2:00	East Carolina University, School of Dental Medicine Tour
2:00	ECU Transportation to PGV Airport

Special Thanks to our generous sponsors:

CODE Region VI Schools

University of Alabama
East Carolina University
University of Florida
Dental College of Georgia
University of Kentucky
Lake Erie College of Osteopathic Medicine
University of Louisville
Meharry Medical College
University of North Carolina
NOVA Southeastern
University of Puerto Rico
The Medical University of South Carolina
Virginia Commonwealth University

Southern CaMBRA Coalition Questions
Southern CaMBRA Coalition
Agenda 2019

Thank you in advance for your participation in the 2019 Southern CaMBRA agenda. This agenda is based in part on responses to agenda questions from the previous year – it can be thought of as a continuation of a conversation regarding caries management education and clinical implementation at our schools.

1. ***Do you run a study club related to cariology at your school? What is the format? How often do you meet? Who all do you include?***

2. ***Do you have clinical protocols written out for extreme risk, high risk, moderate risk and low risk patients? How do you execute its implementation?***

3. ***Do you have a drop-down list associated with treatment trees in Axium/ health portal associated with various risk levels?***

CaMBRA Question Responses

1. ***Do you run a study club related to cariology at your school? What is the format? How often do you meet? Who all do you include?***

ECU – No, but we are starting in November. We will meet once monthly.

UF – We do not have a study club related to Cariology. Faculty does lit review and we have calibration sessions within the division and department.

GA – No. but we have a caries continuum lab/tutorial for students, all faculty participate

UK – No

UL – We don't

MMC – No

NOVA - We currently do not have a cariology study club at our school.

UNC – We have a core group of faculty that meet every month to discuss clinical practices related to Operative Dentistry and Cariology. This team includes group practice leaders, course directors and pre-doc clinical directors.

MUSC – No, not at this time but I have been asked to form one. A committee has been formed to address this this Fall. I expect it will be in place by Spring 2020

VCU – No

2. ***Do you have clinical protocols written out for extreme risk, high risk, moderate risk and low risk patients? How do you execute its implementation?***

ECU – We have CRA form in Axium. Students develop customized plan based on risk l evel and add chemotherapeutic interventions accordingly.

UF – We have recommendations to caries risk status, but each recommendations are tailored to the case. During the Cariology course, students learn how to perform CRA, evaluate the risk factors and protective factors, and come up with a caries risk program for their patient. The students discuss with faculty the plan, if approved, students print the plan and explain to their patient.

GA – Yes, we have a CRA from in AxiUm

UK – The list of recommended protocols for each risk is made available in Axium. Once CRA is calculated/determined, the list of treatment recommendation that is corresponding to the risk determined pops up on their screen as just a guide. It is supposed to be customized accordingly.

UL – We follow the recommendation of ADA

MMC – YES. It is operated in the ODS department using CAMBRA concepts.

NOVA - Yes we do. We have an NSU CAMBRA form. In that form, we have definition of each caries risk category and corresponding in-office / at-home preventive plan protocols, x-ray intervals and bitewing intervals. That is a single page document to be used as a guide by our students and faculty. In Axium, we have a preventive treatment plan tab under the caries risk assessment form. We pick and choose what in-office materials are to be applied and what at-home prophylactic agents are to be prescribed using that form. It has options for bitewings an recalls as drop down menus as well. Then when we are treatment planning our patients, we carry or add whatever applications/ prescriptions were selected in our caries management protocol to our treatment plans. Some codes such as high fluoride prescription are not associated with a charge but are still included in the treatment plan form for documentation purposes. We also have three prepared kits that we can give out to the patients. These are called NSU high caries kits. One is with only high fluoride toothpaste, xylitol gum and brush/paste/floss(that is the most commonly used one), the other has chlorhexidine included as well and the third one has MI paste additionally. As we are giving the kit, or giving just a prescription, we have a form that we give out to the patient together with the materials which is called NSU Patient Oral Care Instructions Form. It has times of the day and materials next to check boxes to be used as a cheat sheet by the patient. For instance, chlorhexidine check box is selected under “after breakfast” and high fluoride checkbox is selected under “before bed” area in the form.

UNC – Caries risk assessment in the EPR. Students are required to develop a customized plan for the patients based on their needs with input from group practice leaders. Highly recommend a one-week diet analysis following diagnosis and tx planning.

MUSC –

VCU – It is taught to the students in Cariology, and we have printed handouts to give to patients in the Clinic.

3. ***Do you have a drop-down list associated with treatment trees in Axium/ health portal associated with various risk levels?***

ECU – We have treatment codes for diagnosis and treatment but no drop downs.

UF – Not really. We have a dropdown list associated to interventions and recommendations.

GA – Yes

UK – Yes, as answered in Q2 above.

UL – Yes,

- D0601 Caries risk assessment and documentation with low risk
- D0602 Caries risk assessment and documentation with moderate risk
- D0603 Caries risk assessment and documentation with high risk
- D1354 Interim caries arresting medicament application- per tooth

MMC – YES. The drop-down list is in Axium which allows a tally of the risk factors to create a risk level.

NOVA - We have a drop down for risk levels. However we do not have a caries management protocol directly connected to that risk level since every patient's management protocol is different.We still pick and choose the preventive measures separately.

UNC – No

MUSC – Yes. And we are presently improving these.

VCU – We do have lists of treatment in axiUm on this, but it is not in a drop-down format.

Regional CODE Questions 2019

Alabama

AL-1: Do you have a department or division specifically for Operative Dentistry? If so, please share the structure/organizational chart.

AL-2: Recruiting faculty for Operative: How do you recruit for Pre-clinical dentistry? For Clinical? Specific training? Experience? What qualifications do you look for?

East Carolina

ECU-1: How often is your Pre-clinical Operative Dentistry course updated/changed and what that process looks like? (i.e. course hours, lab sessions, content, Curriculum committee involvement, institutional educational vision, etc.…).

ECU-2: How many and which skills assessments do students have to complete (both pre-clinically and clinically), what is the maximum number of re-takes allowed, and how do you conduct remedial processes?

Georgia

GA-1: What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your PRE-CLINICAL Operative/Restorative courses?
*Score the answers using the following scale: **1 - 5 *** *see below for rating criteria*

1. Student course attendance issues- absenteeism, coming late, leaving early
2. Student time management issues- lack of organization or preparation for the lab session, frequent/prolonged absences during the lab, too much socializing interfering with achievement
3. Maintaining students' attention and engagement during lectures or demonstrations (competing with surfing the web, texting, talking, etc.)
4. Student openness to receiving feedback or, resistance to asking for feedback in the lab
5. Motivating students to practice for enhanced skill proficiency (e.g. more emphasis on practicing for more than just minimum competence, and less emphasis on just getting projects signed-off)
6. Providing enough structured time and supervision for students to practice prior to practical testing
7. Finding enough time for student remediation of failed lab practical exams
8. Scheduling make-up didactic/written testing opportunities when students miss the original test
9. Students' inability to follow detailed sequential instructions (not doing some things at all or doing other multi-step procedures out of order). Unintentional- a lack of concentration or attention to detail.
10. Students willfully refusing to follow directions. Intentional / insubordination
11. Students giving more respect or credence to non-faculty sources (e.g. upperclassmen, videos from other schools or sites) of course information or protocols than from course faculty
12. Students not meeting or missing course/lab deadlines
13. Students chronically failing to complete their lab work during the scheduled session
14. Student demands on faculty time outside of normal lecture/lab times (e.g. when students come to a faculty's office with a dentoform in hand wanting a sign-off or wanting personal instruction/tutoring)

15. Student cheating, dishonesty regarding course projects or testing

16. Granting accommodations to students with disabilities or handicaps

17. Balancing the pace of the course: to keep the students that achieve competency faster from being bored, and to keep the students that take longer to become competent from stressing out.

18. Getting students to take the sim lab experience seriously and approaching it like clinic (e.g. work space organization, mirror use, proper operator posture, and relevant manikin head position)

19. Other: specify _____

*** Rating Scale** (5 = significant challenge, 1 = a non-issue)
The rating reflects how the challenge interferes with student success, course progress, or faculty effort.
5 = a very highly significant/common/regular issue
4 = significant but less critical and/or common than #5
3 = an important issue but not very critical or common (less than #3)
2 = low importance but it can create minor problems/hassles when it occurs
1 = not an issue for our program

GA-2: What are the biggest <u>STUDENT-RELATED</u> challenges for course directors and course faculty in your <u>CLINICAL</u> Operative/Restorative courses?
*Score the answers using the following scale: **1 - 5 *** see below for rating criteria*

1. Student attendance/poor use of available chair time

2. Students missing scheduled appointments (student no-shows)

3. Student reluctance to schedule patients (clinic anxiety- e.g. lack of confidence or doubts about skills)

4. Students struggling to handle the interpersonal aspects of patient management (poor social or communication skills)

5. Student openness to constructive criticism or resistance to asking for help or guidance

6. Students coming to clinic technically/mentally unprepared for the planned procedure that session

7. Student lack of organization, i.e. anticipation of needed supplies and equipment (wasting time during the appointment getting items that should have been secured before treatment was initiated)

8. Students performing planned treatment out-of-sequence

9. Student insubordination (not following faculty directions or clinic protocols)

10. Students failing to follow / maintain infection control protocols

11. Student struggles with getting / maintaining effective local anesthesia

12. Students wasting clinic materials and supplies

13. Students misusing materials (e.g. bonding agents) or equipment (e.g. light-curing units); due to poor or careless technique, lack of understanding about consequences.

14. Students not routinely finishing their procedures on time running into lunch hour or running late at the end of the day (due to- e.g. late starts or unreasonably slow progress, or lack of preparedness)

15. Student incivility (disrespect) towards staff

16. Student incivility / unprofessional conduct towards patients (e.g. disrespect or engaging in inappropriate personal contact- too friendly)

17. Students failing to maintain patient charts/records up-to-date

18. Student cheating or dishonesty during clinical treatment (competency exams or misleading faculty regarding the status or sequence of routine treatment)

19. Other: specify _____

*** Rating Scale** (5 = significant challenge, 1 = a non-issue)
The rating reflects how the challenge interferes with student success, course progress, or faculty effort.
5 = a very highly significant/common/regular issue
4 = significant but less critical and/or common than #5
3 = an important issue but not very critical or common (less than #3)
2 = low importance but it can create minor problems/hassles when it occurs
1 = not an issue for our program

GA-3: Do you have a *Scope of Practice Policy* or similar rules and protocols that defines and regulates the range of allowable dental treatment in student clinics? The intent of such a policy or practice would be to define the limitations of student treatment and describe when referral of a student program patient for treatment by a resident or faculty or private practitioner is recommended or mandated.The types of patients regulated by such a policy would have very complex dental and/or medical issues.
YES or NO?

IF YES-
How long has it been in effect?
How do you monitor compliance with it?
Which patient conditions or needed procedures are most rigidly adhered to per your policy (i.e., would usually, always trigger a referral out of the student program)?
Do you have exceptions to the *non-treatment by students list* of procedures? How are they managed?
What is the most common referral destination for these patients?
If you have such a policy, can you share it as an attachment to your response?

If NO-
Are you considering implementing such a policy?
If you are not considering such a policy, how do you manage the treatment of very complex patients in your pre-doctoral student program?
Optional comments: _____

GA-4: "Entrustable Professional Activities" (EPAs) is a new framework for assessing overall competency and readiness for practice. (Selected references linked below for your edification)
http://www.jdentaled.org/content/82/11/1123?rss=1
https://onlinelibrary.wiley.com/doi/full/10.1111/tct.12436
https://onlinelibrary.wiley.com/doi/full/10.1111/imj.12914

Is your school currently using EPA's in any portion of your pre-doctoral competency curriculum? YES or NO?

If YES-
How long have you been using it?
For which competencies?
During which years (e.g. D1, D2, D3, D4)?
What is your opinion or judgment of the outcomes associated with it?
Provide at least one detailed example of an EPA competency in your curriculum -

If NO-
Are you aware of / familiar with this new competency format?
Do you have plans to adopt it for your program?
If NO to adopting it, why not?

Optional comments: _____

Meharry Medical College School of Dentistry

Meharry- 1: How many courses in your curriculum are devoted to teaching Operative Dentistry? In what year and what semester? What is covered in each course? What is the general sequence of the broad topics? (Composites, amalgam, ceramics, etc.)

A. Does your school teach composite technique before amalgam technique or amalgam technique before composite technique? What are the reasons or justifications for doing this?
B. How many restorations is each student required to do in the pre-clinical classes/laboratories?
C. How do you incorporate recent technological advances in Operative Dentistry into your curriculum?
D. What does your school teach for the longevity of different restoration types? What is the supporting evidence?

Meharry-2: What changes to your Operative Dentistry Course Curriculum have been made to prepare for the new structure of the National Boards?

MUSC

MU1: Please indicate the manufacturer/product used for each category of material listed, device used, technique experienced, or faculty ratios requested

School Name:	
Primary dentin bonding agent	
Secondary dentin bonding agent	
Primary resin composite	
Secondary resin composite	
Primary base/liner	
Secondary base/liner	
Primary pulp capping agent	
Primary Liner under amalgam	

Primary luting cement	
Secondary luting cement	
Primary impr material (castings)	
% of students that use or have experience with CAD/CAM clinically	
Primary Indirect provisional material	
Have lasers in clinic? Type?	
Amalgam/Composite restoration in posterior ratio Ratio	
Total Students this year D1 / D4	
Faculty/Student ratio in Clinic	
Faculty/Student ratio in Lab	

MU2- Does your school provide all typodont teeth for student practice or does your school make the students buy their own?

Florida

UFL- 1: Does any of the school apply the EPA (Entrustable Professional Activities) model in the clinical scenario?

If yes, how is it used? How many EPAs does the school have?
If no, how are the schools evaluating the milestones of the student throughout Dental School? And how the notions of trust and supervision are added in the assessment equation?

UFL-2: What is the school policy for "cheating"? If a student is caught trying to cheat during a psychomotor, what is the consequence?

UFL-3: How have they changed the preclinical and clinical curriculum to better prepare students for the INDBE? We might also want to ask how they are calibrating faculty?

North Carolina (Chapel Hill)

UNC-1: Should bulk fill composite resin be introduced to the pre-doctoral program? If yes, what technique would be encouraged; a monolithic bulkfill restoration, or a bulkfill composite base veneered by a conventional composite resin.
UNC- 2: What is the teaching experience in your school for ceramic partial coverage restorations? Material selection and cementation protocol.

Louisville

Lou-1: Has your school implemented digital dentistry in the PRE-CLINICAL OPERATIVE Dentistry course? If yes, how?

Lou-2: Does your school teach breaking Interproximal contacts in Class II and III beyond what is necessary for carious hard tissue removal? Which, if any, is to break or to maintain?

Lou-3: Caries management that conserves reserves pulp vitality:

- Does your school advocate selective or partial caries removal in deep lesions?
- When should caries excavation stop? When hard or firm dentin is reached, or should leathery dentine be left close to the pulp?
- Is there evidence to support partial caries removal?

Kentucky

UK-1: Does your school have composite warming units in the preclinical and clinical labs? Is this part of your standard operating procedure when using composite?

UK-2: What exact technique do you teach for the placement of Class II Composite restorations? What term do you use to describe your technique, e.g. oblique, centripetal, or other?

UK-3: Which division in your institution is responsible for teaching crown courses? Does your school separate Restorative/Operative from Prosthodontics? Gold inlays/onlays are presented: Didactic only? Didactic and preclinical lab session?

UK-4: Are full-time faculty members at your institution given the opportunity to see patients outside of your institution? Are alternatives to a five-day work week available, e.g. four days with benefits? Is there a faculty practice within your institution where full-time faculty members are required to practice?

Virginia Commonwealth

VCU-1: Do you have pre-clinical practical exams on composite preparations? If so, what are your rubrics?

VCU-2: What are you teaching regarding bonded amalgam and pin-retained restorations?

Responses Regional CODE Questions 2019

Alabama

UA-1: Do you have a department or division specifically for Operative Dentistry? If so, please share the structure/ organizational chart.

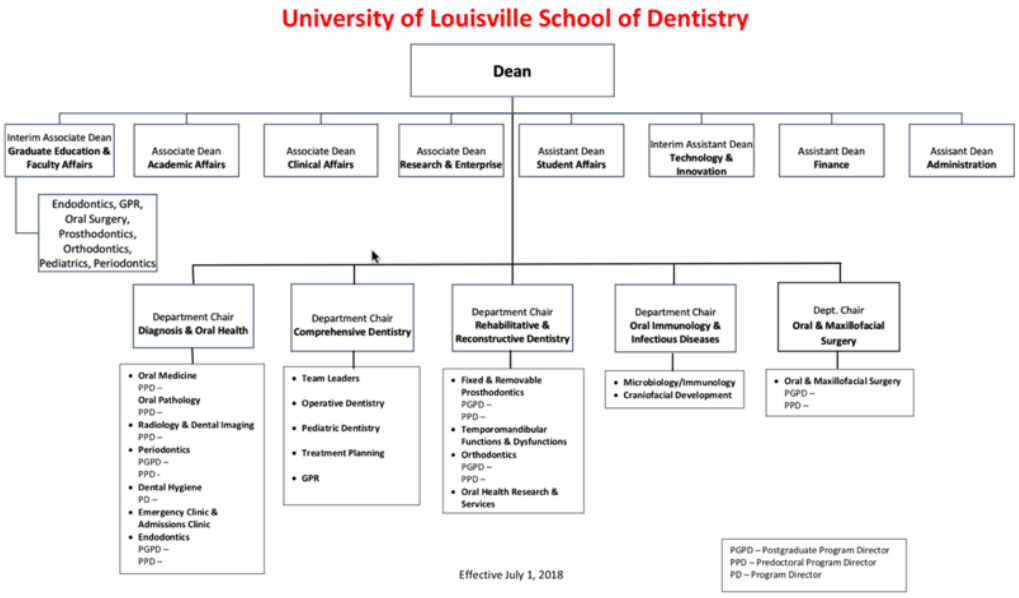
ECU – Yes, we have the Division of Operative Dentistry housed within the General Dentistry Department. We currently have a total of 4 Operative Dentistry Faculty.

UF – Our Restorative Dental Sciences Department, is structured with three divisions (Operative, Prosthodontic and General Dentistry)

GA – Yes. Section of Operative Dentistry

UK – We have a Restorative Division and a Prosthodontic Division. Both divisions are under Oral Health Practice

UL – We have comprehensive care clinics and divisions of multiple disciplins included in the chart below:



MMC – No. We have a combined Department of Restorative Dentistry. This includes Operative Dentistry, Fixed Prosthodontics, Removable Prosthodontics, and Implant Dentistry.

NOVA - We have a Department of Cariology and Restorative Dentistry. Within our department we have a Post Graduate Operative Dentistry Program.

UNC – Division of Operative Dentistry is under the Comprehensive Oral Health Department.

MUSC – No, we have a Department of Oral Rehabilitation with a Restorative Division.

VCU – No

UA-2: Recruiting faculty for Operative: How do you recruit for Pre-clinical dentistry? For Clinical? Specific training? Experience? What qualifications do you look for?

ECU – Formal Operative Dentistry training is always desirable (specially for pre-clinical) as well as clinical and teaching experience. We have hired Faculty both with more experience as well as fresh out of PG Programs.

UF – We favor candidates with advanced studies in operative dentistry and U.S. trained is preferred.

GA – Difficult, Georgia does not accept foreign credentials without 2 yrs. of additional US Adv. Ed. Training. Few people with operative grad degrees apply here. The majority have a DDS, DMD & GPR/AEGD

UK – From a Restorative Chair's perspective--I do not separate preclinical from clinical. A candidate should be comfortable and capable as a faculty member in a clinical or preclinical setting.
Recruitment is often initiated with the appointment of part-time faculty members. Part-time appointment can serve as a long "working interview." This facilitates evaluation of student and faculty interaction over time. Dental knowledge and experience are one aspect--but interpersonal relationships are critical as a faculty member.

UL – We don't recruit specifically for operative preclinical specifically. For clinical; advanced training or years of experience in the area are highly recommended.

MMC – We recruit for Pre-clinical Dentistry by looking for training in classic dentistry experiences and who will fit in to the Meharry experience. Many are graduates of Meharry Medical College SOD or the GPR program. We utilize some part-time individuals with similar experiences to go along with those aforementioned. The qualifications include passion for teaching, working with the group dynamics despite resource shortage, and understanding of traditional and modern techniques.

NOVA - For pre-clinical adjunct faculty, we look for experience in the field and preferably experience in teaching anatomy, operative dentistry, occlusion. However, we do not prefer to recruit full-time faculty that can only teach in the pre-clinical courses. We need more clinical faculty so when we are recruiting, we do not consider faculty members that cannot teach in the clinic. In clinical restorative dentistry, we look for experience in clinical restorative dentistry, if applicable, a post graduate training on operative dentistry. We need faculty members who can

teach in the clinic and pre-clinic and the ones that can lecture/ direct courses would be preferred. We also need faculty members who can adapt to using electronic patient charts.

UNC – Teaching experience is preferred. Minimum 5 yrs. of clinical practice. Majority of our clinical group leaders are practitioners who joined academia after retirement from private practice and community service. We have a robust Operative Dentistry graduate program that trains residents for a career in academia. Eight of our full-time faculty members are graduates of UNC Operative program.

MUSC – The process from what I have seen is one of a job posting on the MUSC website, applications submitted, they are vetted by a committee, a selection is made and forwarded to the Chair of Oral Rehab or other Departments, and if the applicant meets the criteria they are hired.

VCU – That information would need to be obtained by the Search Committee for that position.

East Carolina University SODM

ECU-1: How often is your Pre-clinical Operative Dentistry course updated/changed and what that process looks like? (i.e. course hours, lab sessions, content, Curriculum committee involvement, institutional educational vision, etc.…).

ECU – We have tried to keep the main structure of the course the same for the several past years. Eventually a few hours could be added or removed, and adjustments were needed. Any significant changes (content/hours) has to be approved by the Curriculum Committee.

UF – Our pre-clinical courses are updated every semester with new videos and updated lectures. However, changes that involves course hours, content, etc. are not routinely made. Operative I and II are being currently changed (course description, sequence of lectures, number of psychomotors) and this change requires: approval by the Curriculum Committee, initiate a process online by filling a form that will then be approved by the Department Chair, the Dean of Academic Affairs, the Dean of the College, and UF Curriculum Committee (university level). This process takes at least 6 weeks.

GA – Our course is updated annually. Updates are captured in the year of execution and incorporated into the new syllabus for the next year. Our Operative Course has been on a three-year revision converting from 3 semesters to 2 semesters and from Preparation Class-Based to Prevention/least invasive to most invasive and from composite forward to amalgam.

UK – The course is being evaluated currently to separate the course. The course currently runs from August until June. The new course proposal would separate the course into two courses, one per semester. The course content is reviewed yearly and updated. The curriculum committee is involved for any changes.

UL – The University of Louisville School of Dentistry (ULSD) Curriculum Committee requests that all course directors submit the Curriculum Assessment & Inventory Update Form (CAIU) at the end of the semester to assist them in their charge to review and evaluate the DMD

Curriculum. As course director, we are required to review the course content, competency statements, assessment methods, and if we plan to make any changes or revisions. The Curriculum Committee reviews the CAIU form to ensure evaluation of all courses with respect to the defined competencies of the school to include student evaluation of instruction, elimination of unwarranted repetition, outdated material, and unnecessary material. The curriculum committee will review annually ULSD educational outcomes as indicated by, but not limited to, National Board Dental Exam scores, Regional Dental Licensure Exam results, senior class graduation rates, student exit survey data, and recent ULSD graduate dentist survey data. The curriculum committee will also meet with student representatives from each class for focus group discussions of course evaluations at the end of each academic year. Any recommendations or course modifications based on the curriculum committee's review of student course evaluations, along with the course director's perspective and assessment will be submitted in writing to the course director. The course director will have 30 days to provide a written response to the curriculum committee detailing their plan to address to the curriculum committee's recommendations.

Preclinical Operative (D1) has undergone significant changes the last two years in its content. Prior to that time, the course was relatively stable with the biggest change being a greater emphasis on resin composite Class I and II preparations/restorations. Change is handled within the department; minimal, if any, outside involvement.
In 2018-2019, the course was reduced from a semester and a half to one semester. The reduction was a domino effect from the D1 students starting courses in July to starting in mid-August. Dental Anatomy was moved to the entire fall semester and preclinical operative was in the spring with little reduction in content. This academic year (2019-2020), there is a major reshuffling. Preclinical 1 remains in the spring (meets twice a week, 4 hour sessions) but the content will be Class I, Class II, and Class V amalgams and resin composite. A D2 Preclinical Operative 2 course (meeting once a week, fall and spring) has been structured to cover Class III, Class IV, review Class II slot, auxiliary retention, inlay/onlay ceramic prep, veneers, posts, and esthetic dentistry diagnostic wax-up.

MMC – The courses are updated as needed. Our preclinical dentistry course covers 3 semesters over 1 ½ years and covers the basic amalgam, composite, and CEREC topics. We have an advanced course in the first semester of D3 that includes updates in dentistry and more advanced topics: Veneers etc. The preclinical course in D1 second semester includes 52 hours of lecture and lab covering Class I amalgam. The preclinical course in D2 covers the full year (2 semesters) and includes topics of Amalgam restorations, Composite restorations, and CEREC Dentistry and includes 130 hours of lectures and lab first semester and 112 hours second semester. (approximately ¼ of the hours in D1 and D2 is lecture or demonstration) The D3 Operative course is 18 hours of lecture.

NOVA - The Pre-clinical Operative Dentistry is updated every year. That is a cumbersome process but the changes have been in steps from one year to the other rather than one drastic change. The planning phase of the minor updates are usually completed within a week. However we had to involve the curriculum committee when we wanted to introduce digital dentistry in the first year super course(Integrated Restorative Dental Sciences) and that change took almost a year to be approved.

UNC – Pre- clinical course updates are encouraged on a regular by the department. Curriculum committee has a peer review process for every course in the school. This helps the course directors and reviewers document improvements made to the course over the year. It also highlights new methods and technologies that are implemented by other course directors and serves as an opportunity for everyone to showcase their course. We recently formed a technology task force to assess the need for technological resources that support pre-clinical courses. We are in the process of adding adjunct technological resources to preclinical labs in Pros, Operative and Endo such as SimoDont, PrepCheck, Mora Vision etc.

MUSC – Since I arrived two years ago this has been an ongoing process for our Operative Courses. The course directors have autonomy to pursue and incorporate new directions, as long as there is the science to back it up. Only new courses go through the curriculum committee.

VCU – The operative courses are updated yearly. Text, journals and faculty are consulted, including Director of Biomaterials and others, and lectures and lab assignments are changed, and new materials are ordered as well. D2-D4 Students and Faculty are made aware of significant changes being taught in the D1 Operative courses, such as materials or technique, through e-mail updates. Curricular changes (other than minor changes within a course), go through the Curriculum Committee. Larger issues such as a change in course hours or a new course go through the University level.

ECU-2: How many and which skills assessments do students have to complete (both pre-clinically and clinically), what is the maximum number of re-takes allowed, and how do you conduct remedial processes?

ECU –
Pre-Clinical (currently a total of 11 SAs) – Max # of re-takes is currently 5.
Class 1s (amalgam prep) / Amalgam and composite restorations
Class 2 (amalgam prep) / Amalgam and composite restorations
Class 3s – prep and restoration
Class 4s – Restoration
Class 5s – Amalgam prep and composite restoration

Clinical (Currently 5) – 4/5x repetitions as pre-reqs.
Non-Surgical Caries Management
Class 2 Amalgam and Composite
Class 3 and 5 Composite

Pre-Clinical Remediation includes a # of repetitions of the failed exercise; tutoring sessions; faculty guided sessions; multiple meetings for feedback.

UF – For pre-clinical courses, we have from 3 to 4 psychomotors for every Operative Dentistry course. Student can remediate one time at the end of the semester and if the student still fails, he fails the course and will be sent to the SPEC (Student Performance Evaluation Committee).
-Dental Anatomy: central incisor, pre-molar, maxillary molar, mandibular molar;

-Operative I: Class V (prep and restoration); Class III (Prep and Restoration) and Class I (prep and restoration);

- Operative II: Class II prep, Class II amalgam restoration, Class II RBC restoration and Complex RBC restoration;

- Operative III: Class IV restoration, Composite veneer restoration, Porcelain veneer prep and onlay prep.

For clinical courses, the juniors have 2 clinical assessments (Caries Risk Assessment and Management Plan and Class V Composite, RMGI or Amalgam Restoration) and 4 clinical requirements (carious tissue removal, complex Class II, CAD/CAM assists and Onlay assists). The seniors have 3 clinical assessments (Class II, Class III and caries management case completion) and clinical requirements (CAD/CAM restoration, complex Class II, amalgam restoration). For the clinical courses, if the student fails more than 2 times the competency, the clinical director and division director based on the case will define an intervention program for the student.

GA – The Operative Preclinical course does not include competencies. We have Practicals (Skill assessments) for Dentoform ICDAS 3-4 Resin and Am, ICDAS 0-1 Sealants, Class V Scenario (Resin, Am, GI scenario), Class II Resin and Am, and Class III and IV Resin. We teach Hybrid GI/Resin restorations based on local environment. Students are allowed to remediate to minimal acceptable level of understanding but the initial grade is not changed. Remediation takes place the week after the initial practical.

Junior Clinic Operative Competency Exams:
Dentoform: Class II Amalgam
Class II Composite
Class III Composite
Patient: Class I or V
Remediation is dictated by the performance.

Senior General Dentistry Clinic Restorative Competency Exam:
Patient: Class II Composite
Full Coverage Crown

Senior Pediatric Dentistry Clinic Operative Competency Exam:
Patient: Class II Amalgam

UK –

Operative/Restorative I Course:

Practical 1	Isolation Practical	10%
Practical 2	Class II Prep for Amalgam (Lower Arch)	12.5%
Practical 3	Class II Restoration in Composite (Lower Arch)	12.5%

Practical 4	Class II Restoration in Composite (Upper Arch)	15%
Practical 5	Class III or IV Restoration in Composite	15%
Practical 6	Preparation for Amalgam (Upper Arch)	15%
Practical 7	MOB Restoration in Composite (Upper Arch)	15%
Sign Off Sheets	Daily Projects	5%

Retaking Practical Examinations:
Any student who has failed a practical skill assessment may complete a remediation exercise following consultation with the course director, and then MUST retake the practical skill assessment. The new grade on the practical skill assessment will be an average of the original and the retake practical. If/when the remediation exercise is successfully completed, the student(s) will be permitted to retake the practical. This "Retake Practical" will be done as a group at a time agreed upon by the class president and the course director. To re-emphasize, the final grade on the practical, if remediation/retake occurs, is an average of the grade on the original practical skill assessment and the grade on the retake practical. Note that the final grade can have points awarded or removed if a remediation/retake takes place.

Successive Failures or Failure to Meet Examination Deadlines:
A student can fail this course by failing to pass practical examinations. If three or more practical examinations are failed, the student will fail the course. Note that a retake of the practical examination will be averaged with the original practical exam grade to yield a final practical exam grade for the practical.

Failure to follow instructions during a practical examination will result in the loss of up to 5 points for the practical examination pertaining to the problem.

Clinical courses vary and are at the discretion of the course director.
An example of a clinical course is RSD 831:
For RSD 831, students need to complete 2 clinical skills assessments: Class III and Class II preparation and restoration. They are allowed 3 trials to complete each assessment. Remediation is under course director discretion. I usually speak with student about the section (s) failed to determine remediation. Students will continue to see patients clinically to make sure his/her skills improve. When necessary, remediation is completed using the simulator lab.

UL – Preclinical Operative Dentistry 1 Practical Exams:
Class 2 amalgam: prep and restoration
Class 2 resin composite (conventional): prep and restoration
Class 5 resin composite: prep and restoration
Class 2 resin composite (proximal slot): prep and restoration

Preclinical Operative Dentistry 2 Practical Exams:
Class 3 resin composite: prep and restoration
Class 4 resin composite: prep and restoration

Projects:
Polychromatic Class 4 restoration
Diastema closure
Onlay ceramic prep
2 resin composite veneers
Esthetic dentistry diagnostic wax-up

Maximum retakes: 1 – if unsuccessful, refer to academic achievement committee
Remediation occurs in course under testing conditions.

Clinical Operative I (must be successfully completed to become competency eligible)

- Mid- year non-patient-based examination, maximum number of re-takes is 2
- Year-end non-patient-based examination, Maximum number of re-takes is 2
- Completing an average of 15 operative procedures 10 of which are (ECE) essential clinical experiences "patient-based" that are completed under ideal clinical set up and requires a build-up of contacts, occlusion and caries excavation.

Clinical Operative II (Clinical operative I- must be successfully completed to become competency eligible)

- Competency examination:
- Students must complete 4 competency examinations:
  Non-patient based Class II
  Non-patient based class III
  Patient based class II
  Patient based class III

Remediation plan:

The remediation plan is tailored based on the nature of the failure. Student must follow the plan and successfully complete it prior to re attempting the competency examination.

- Student are allowed 2 re-takes.

MMC – We have in D1 preclinical 1 FCCE Class I amalgam preparation. In D2 we have 1 FCCE Class I amalgam preparation and restoration; 1 FCCE Class II amalgam preparation and restoration, 1 FCCE Class III composite preparation and restoration; 1 FCCE Class II composite preparation and restoration, and completion of a CEREC crown preparation and crown.

NOVA - Our students have 12 IPPAs in the first year preclinical super course. The second year they do not have operative dentistry because they have all prosthodontic labs. Right before they get into the clinic, they have a CPD Course. They can remediate at the end of each semester but the maximum grade is 70

UNC – The DDS-1 pre-clinical course consists of a full array of 'simple' restorative procedures on ivorine teeth, dentin-enamel simulated teeth and natural teeth, including selective caries removal exercise. The students take 3 lab practical exams in this course and are expected to pass all 3 exams with a minimum of 70%. A decision to allow the student to remediate needs to be approved by the Academic Performance Committee (APC). The remediation guidelines are usually customized to the student's needs and circumstance by the APC and implemented by the course director.
In DDS-3 students take advanced operative dentistry course which includes preparation for ceramic inlays & onlays, veneer preps and restorations etc.

MUSC – Each class has a series of exams and practicals in pre-clinic including an OSCE Exam. Before our students enter the clinic, they must pass a clinical assessment exam (can be retaken once). Remediation occurs on an as need basis as determined by the instructor in charge of the exam.

VCU – 1) For D1 Pre-Clinical Operative, currently we have 2 preparation (both Class IIs) and 4 restoration (Class II amalgam, Class II composite, Class IV composite, Complex Composite Restoration) Practicals/Laboratory Exams. Students are allowed an optional re-take for 1 of these 6 exams at the end of the year to re-place a grade. In the school, any student that does not pass a course must remediate that course in some format. This can vary by format and circumstance (i.e. repeating all or part of a year, remediating portions of a course or all of a course, etc.) This is determined on a case by case basis by the APC.

2) Test areas relevant to Operative Dentistry in D2 Clinical Skills include:
1. Class II, III, IV preparation and restoration as part of challenge exams
2. Rubber dam application
3. Core build up and cuspal coverage restorations (amalgam and composite)
4. Dental materials as it relates to operative dentistry including glass ionomers, pulp capping and cavity liners (in addition to composite and amalgam)
From the Clinical Skills Syllabus:
"Challenge Exams (Max 20 points)
You will have a total of 2 challenge exams to evaluate your skills for preparations and restorations according to sound operative principles introduced in D1 Operative Course. Each challenge exam will be valued for 10 points: 5 for preparation and 5 for restoration. If both the prep and restorations are evaluated to be "Clinically Acceptable", you will earn 10 points for the challenge. Clinically Acceptable is a minimum standard for an operative procedure that would likely result in the removal of a carious lesion while conserving maximal tooth structure and restoring the tooth to natural form and function. "Clinically Unacceptable" will earn you 0 points for that portion of the challenge. Clinically Unacceptable is defined as given a limited clinical session a major error or a combination of minor errors arise that must require additional correction or clinical failure likely would result. Major errors include but not limited to "likely pulp exposure if performed on a natural tooth" or an "open contact" restoration.

In-course remediation followed by a retest of the failed procedure (preparation or restoration) is required if you receive "Clinically Unacceptable" grade.
Following is the breakdown of points earned after each challenge:

Clinically Acceptable for each procedure (Prep and restoration) = 5
Clinically Unacceptable = 0
Clinically Acceptable after remediation and 1st retest (for each procedure) = 3
Clinically Acceptable after remediation and 2nd retest (for each procedure) = 2

Remediation for 'Clinically unacceptable' procedure in each challenge:
If the student fails either the prep or the restoration, he/she will have to remediate by doing 2 preps that are subsequently restored after preps are approved; If the student fails both, remediation will consist of 4 preps and 4 restorations. These can be completed in preclinical lab, but the preps need to be approved by faculty prior to restoration.

3) For D4 Clinical Operative Competencies:
Operative Competencies: (10% of final grade). These four competencies must be completed by the end of the D4 year and graded as a part of DENS 752 Clinical General Practice Dentistry.
1.Class II amalgam or Class II composite restoration -conventional or slot preparation {2.5% of final grade - completed during the D3 or D4 year}
2.Class III composite restoration (2.5% of final grade - completed during the D3 or D4 year)
3.Class IV composite restoration (involving the incisal edge}. A direct composite facial veneer may be substituted (2.5% of final grade}.
4.Cuspal coverage restoration (2.5% of final grade) Remediation plan: A grade of Fail or "0" automatically requires remediation.
Regardless of the outcome for a passing remediation, the only grade a D4 Student may receive is a "Meets expectations" or "3". If the D4 fails the 1st remediation, they must then remediate it a 2nd time. If they pass the 2nd remediation, the grade will have to be a "Meets expectations" or "3". If the D4 fail the 2nd remediation (which means they failed 3x including the 1st plus the 2 remediation events), they must now work under the direct supervision of only their assigned Group Leader and be required to complete 10 manikin simulations of the same preparation and restoration (e.g. Class II Resin) which they failed repeatedly (3 times previously in a patient care setting) before they would be allowed to then attempt another remediation by their Group Leader for an actual patient again. At this point the Group Leader would place a referral to APC. Once the student has completed 10 AxiUm documented manikin simulations under the student's Group Leader (only), then the student may be selected to then return to patient care for this competency and once again must pass with a grade of 3.0 as the only possible passing grade.
The remediation maximum passing grade, regardless of the grade given by the Group Leader, cannot ever exceed a 3.0 and must be a 3.0 to pass and meet CODA requirements.
Those who were approved by Dr. Boyd in DENS739 to begin Competencies, through their Group Leaders, and actually completed a competency and received their grades in the prior format, will still keep their grades. Competency grades that were entered into AxiUm prior to the Summer Semester of 2019 (i.e.: Spring 2019 -pre-approved rising seniors), will keep their grades as an average. They will remain as graded. This keeps those who were advanced from having to re-do any competencies completed prior to the corrected format with only Preparation and Restoration as graded items on the 0, 3, 5 Scale.
Competency Retake information is for those who did pass the first time. One final change is

that the students who want to repeatedly "retake" a competency, even if they passed it the first time, the highest grade cannot exceed a 3.0, since this is a retake by choice. Retakes cannot raise a grade. In other words, once the competency is completed, the measured grade is final, unless there is a failure, and remediation is required. Retakes cannot, in other words, be taken over and over and over again to attempt to achieve a perfect score of 5.0. Competency retakes, if choosing to do them again, will only result in a 3.0 regardless of score(s) on the voluntary retakes.
Basically, if one passes, there is NO Need to keep retaking.

Dental College of Georgia

GA-1: What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your PRE-CLINICAL Operative/Restorative courses?
Score the answers using the following scale: 1 - 5 * see below for rating criteria

1. Student course attendance issues- absenteeism, coming late, leaving early
2. Student time management issues- lack of organization or preparation for the lab session, frequent/prolonged absences during the lab, too much socializing interfering with achievement
3. Maintaining students' attention and engagement during lectures or demonstrations (competing with surfing the web, texting, talking, etc.)
4. Student openness to receiving feedback or, resistance to asking for feedback in the lab
5. Motivating students to practice for enhanced skill proficiency (e.g. more emphasis on practicing for more than just minimum competence, and less emphasis on just getting projects signed-off)
6. Providing enough structured time and supervision for students to practice prior to practical testing
7. Finding enough time for student remediation of failed lab practical exams
8. Scheduling make-up didactic/written testing opportunities when students miss the original test
9. Students' inability to follow detailed sequential instructions (not doing some things at all or doing other multi-step procedures out of order). Unintentional- a lack of concentration or attention to detail.
10. Students willfully refusing to follow directions. Intentional / insubordination
11. Students giving more respect or credence to non-faculty sources (e.g. upperclassmen, videos from other schools or sites) of course information or protocols than from course faculty
12. Students not meeting or missing course/lab deadlines
13. Students chronically failing to complete their lab work during the scheduled session
14. Student demands on faculty time outside of normal lecture/lab times (e.g. when students come to a faculty's office with a dentoform in hand wanting a sign-off or wanting personal instruction/tutoring)
15. Student cheating, dishonesty regarding course projects or testing
16. Granting accommodations to students with disabilities or handicaps
17. Balancing the pace of the course: to keep the students that achieve competency faster from being bored, and to keep the students that take longer to become competent from stressing out.
18. Getting students to take the sim lab experience seriously and approaching it like clinic (e.g. work space organization, mirror use, proper operator posture, and relevant manikin head position)
19. Other: specify _____

The questions and responses were grouped into related categories (Time, Engagement, Testing, & Compliance) and presented in a table format for anonymity. The number of schools reporting a 1-5 score appear in the rows with a shortened version of the question in the left column.

*** Rating Scale** (5 = significant challenge, 1 = a non-issue)
The rating reflects how the challenge interferes with student success, course progress, or faculty effort.
5 = a very highly significant/common/regular issue
4 = significant but less critical and/or common than #5
3 = an important issue but not very critical or common (less than #3)
2 = low importance but it can create minor problems/hassles when it occurs
1 = not an issue for our program

What are the biggest Student-related Pre-Clinical Challenges (question categories)

- **Time:** Questions- 1, 2, 12, 13, 14
- **Engagement:** Questions- 3, 4, 5, 17, 18
- **Testing:** Questions- 6, 7, 8, 15, 16
- **Compliance/Professionalism:** Questions- 9, 10, 11

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your PRE-CLINICAL Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 17.7)

Time	1	2	3	4	5	Total
1. Attendance	3	3	1	1		16
2. Time Management	3	4	1			14
12. Missing Deadlines	3	3	2			15
13. Fail to complete lab work during the session	3	2	3			16
14. Demands on faculty time	3	3	1	1		16

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your PRE-CLINICAL Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 17.7)

Engagement	1	2	3	4	5	Total
3. Maintain attention during lectures or demos		3	1	2	2	27
4. Openness to feedback	2	5	1			15
5. Motivating students to practice for enhanced skill		4	4			20
17. Balance pace of course for all student skill levels	1	4	3			18
18. Approach sim lab like clinic	2	3	2		1	19

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **PRE-CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 17.7)

Testing	1	2	3	4	5	Total
6. Practice prior to practicals	1	3	4			19
7. Time for remediation of failed practicals	1	3	2	2		21
8. Scheduling make-up written exams		4	4			20
15. Cheating: projects or tests	2	5	1			15
16. Granting accommodations	3	2	2	1		17

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **PRE-CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 17.7)

Compliance/Professionalism	1	2	3	4	5	Total
9. Inability to follow detailed directions (unintentional)		2	5	1		23
10. Refusal to follow directions (insubordination)	6	2				10
11. Giving other students or external sources more credence than faculty	2	3	1	2		19
Avg. score all questions = 17.7						

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **PRE-CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 17.7)

Top Issues	1	2	3	4	5	Total
3. Maintain attention during lectures or demos E		3	1	2	2	27
9. Inability to follow detailed directions (unintentional) C/P		2	5	1		23
7. Time for remediation of failed practicals T	1	3	2	2		21
5. Motivating students to practice for enhanced skill E		4	4			20
8. Scheduling make-up written exams T		4	4			20

GA-2: What are the biggest <u>STUDENT-RELATED</u> challenges for course directors and course faculty in your <u>CLINICAL</u> Operative/Restorative courses?
Score the answers using the following scale: 1 - 5 * see below for rating criteria

1. Student attendance/poor use of available chair time
2. Students missing scheduled appointments (student no-shows)
3. Student reluctance to schedule patients (clinic anxiety- e.g. lack of confidence or doubts about skills)
4. Students struggling to handle the interpersonal aspects of patient management (poor social or communication skills)
5. Student openness to constructive criticism or resistance to asking for help or guidance
6. Students coming to clinic technically/mentally unprepared for the planned procedure that session
7. Student lack of organization, i.e. anticipation of needed supplies and equipment (wasting time during the appointment getting items that should have been secured before treatment was initiated)
8. Students performing planned treatment out-of-sequence
9. Student insubordination (not following faculty directions or clinic protocols)
10. Students failing to follow / maintain infection control protocols
11. Student struggles with getting / maintaining effective local anesthesia
12. Students wasting clinic materials and supplies
13. Students misusing materials (e.g. bonding agents) or equipment (e.g. light-curing units); due to poor or careless technique, lack of understanding about consequences.
14. Students not routinely finishing their procedures on time running into lunch hour or running late at the end of the day (due to- e.g. late starts or unreasonably slow progress, or lack of preparedness)
15. Student incivility (disrespect) towards staff
16. Student incivility / unprofessional conduct towards patients (e.g. disrespect or engaging in inappropriate personal contact- too friendly)
17. Students failing to maintain patient charts/records up-to-date
18. Student cheating or dishonesty during clinical treatment (competency exams or misleading faculty regarding the status or sequence of routine treatment)
19. Other: specify _____

The questions and responses were grouped into related categories (Time, Professionalism, Compliance, & Technical) and presented in a table format for anonymity. The number of schools reporting a 1-5 score appear in the rows with a shortened version of the question in the left column.

*** Rating Scale** (5 = significant challenge, 1 = a non-issue)
The rating reflects how the challenge interferes with student success, course progress, or faculty effort.
5 = a very highly significant/common/regular issue
4 = significant but less critical and/or common than #5
3 = an important issue but not very critical or common (less than #3)
2 = low importance but it can create minor problems/hassles when it occurs
1 = not an issue for our program

What are the biggest Student-related Clinical Challenges (question categories)

- **Time:** Questions- 1, 3, 7, 14
- **Professionalism:** Questions- 5, 9, 15, 16, 18
- **Compliance:** Questions- 2, 8, 10, 17
- **Technical:** Questions- 4, 11, 12, 13

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 18)

Time	1	2	3	4	5	Total
1. Attendance, use of chair time	2	3	3			17
3. Reluctance to schedule pts.	2	6				14
7. Lack of organization in clinic		3	3	1	1	24
14. Not routinely finishing clinical procedures or on-time		3	3	1	1	24
Avg. score all questions = 18						

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 18)

Compliance	1	2	3	4	5	Total
2. Missing scheduled pt appts	3	5				13
8. Perform tx out of sequence	1	2	2	2	1	24
10. Infection Control	2	3	2	1		18
17. Pt. records up to date	1	3	1	3		22

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 18)

Technical	1	2	3	4	5	Total
4. Pt social/communication skills	1	6	1			16
11. Local anesthesia success		6	2			18
12. Wasting clinic materials		2	1	3	2	29
13. Misuse of materials &/or equipment		4	3	1	1	26

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 18)

Professionalism	1	2	3	4	5	Total
5. Open to criticism, ask for help	1	6		1		17
9. Insubordination to faculty (not following directions)	2	3		1	1	17 *
15. Incivility to staff	3	4		1		15
16. Incivility, inappropriate contact with patients	4	4				12
18. Cheating, dishonesty- comp exam or misleading faculty RE tx	3	1	2	2		19

What are the biggest STUDENT-RELATED challenges for course directors and course faculty in your **CLINICAL** Operative/Restorative courses?
Rating Scale: 1 = Not an Issue to 5 = Significant / Common Issue (avg. 18)

Top Issues	1	2	3	4	5	Total
12. Wasting clinic materials Te		2	1	3	2	29
13. Misuse of material/equip Te		4	3	1	1	26
7. Lack of organization in clinic Ti		3	3	1	1	24
14. Not routinely finishing clinical procedures or on-time Ti		3	3	1	1	24
8. Perform tx out of sequence C	1	2	2	2	1	24

GA-3: Do you have a Scope of Practice Policy or similar rules and protocols that defines and regulates the range of allowable dental treatment in student clinics? The intent of such a policy or practice would be to define the limitations of student treatment and describe when referral of a student program patient for treatment by a resident or faculty or private practitioner is recommended or mandated. The types of patients regulated by such a policy would have very complex dental and/or medical issues.
YES or NO?

IF YES-
How long has it been in effect?
How do you monitor compliance with it?
Which patient conditions or needed procedures are most rigidly adhered to per your policy (i.e., would usually, always trigger a referral out of the student program)?
Do you have exceptions to the non-treatment by students list of procedures? How are they managed?

ECU – No

UF – It is revised every year, but it has been similar philosophy for many years
Faculty calibration, orientation meetings. Q&A student meetings, department meetings.
Highly esthetic cases are referred to the Grad Operative, but the student dentist work with the resident.
N/A
Graduate operative program
If you have such a policy, can you share it as an attachment to your response?

GA – Yes
Informally, for years; formally, since July 1, 2019
Axium, still developing our monitoring process
Excessively complex medical/psychiatric conditions, Patient Esthetic demands exceed the scope of student capability, significant changes in Vertical Dimension required, Excessive occlusal attrition, Limited opening/active TMD
Exceptions would almost exclusively occur in the Senior General Dentistry Program. Two faculty are assigned to those patients and all treatment must occur under their supervision.

UK – No
Here is what we have:
As for Scope of Practice Policy, to my knowledge each division sets its own parameters based on what the faculty are comfortable managing. For example, endo is changing its classifications with the addition of the new scholar's program so that we can treat more complex cases without the need to refer to faculty practice. The Implant Manual categorizes what classifies as a student implant case vs. what gets referred. When the students are in Comp Care during fourth year, each team will stretch based on the comfort level of the team leader. Allison, for example, will do simple perio surgeries with fourth year students when she is comfortable with the case to give the students

the experience normally reserved for residents. There is a lot of variability based on the situation, the patient's needs, and the covering instructor's/team leader's training and comfort level.

UL – The process of screening and assigning the patients to a "D3 or D4 Virtual Bank" occurs soon after the initial Admissions/Screening appointment. If the patient requires a Medical Consult, the patient is assigned to the "Medical Consult virtual Bank" and the assignment decision is delayed pending consult results. If the patient is considered a non-teaching case and not suitable for the DMD program, the patient would be assigned to the "GPR or the GRAD PROS virtual Bank "due to Medical Complexity and/or Dental Complexity. If the patient is considered to be a teaching case and suitable for the DMD program, the patient is assigned to a DMD student. During the comprehensive exam and information gathering appointments, it is the discretion of the Team Leaders to determine if the patient is too complex for the DMD student or if they should continue with treatment. If they deem the patient too complex for treatment in the DMD Clinic, they can fill out a referral form for GPR or GRAD PROS.
This process has been ongoing since 2010.

Compliance has improved over the past couple of years but is still difficult to monitor. Most of the time this is due to different philosophies by the Team Leaders and what they feel comfortable allowing to be done in the clinic setting by a student.

ASA Type IV patients and many ASA Type III patients (depending on medical consult results) would trigger a Medical Complexity referral usually to GPR. A severe occlusal plane

discrepancy, a patient with multiple implants already in place, extensive crown and bridge with recurrent caries, edentulous atrophic ridges, full mouth reconstruction cases, large esthetic cases, and sometimes patients whose expectations are too demanding.

Sometimes the exceptions to the no-treatment by students list of procedures can be managed by the student being overseen by a PROS faculty in the OHR Clinic. This is on a case by case basis usually.

If the PROS faculty in OHR decide that the case is too complex for the student, the patient is usually referred to the GRAD PROS program, GPR, Faculty Practice, or outside Private Practitioner**.**

MMC – No, 2nd Molar or complex surgical Endodontics, Oral Surgery, Orthodontics, Pediatric Cases, Surgical Periodontics are referred out to Specialty Clinics or GPR based on the judgment of the TEAM Leaders. No exceptions to the non – treatment by students list.

NOVA - It is in effect for a long time but there has been a long time since there has been a standardization training and we have a high turn around in faculty. Therefore standardization is key.
We have steps such as data collection and treatment that we catch it if the patient does not belong in that clinic. However, standardization is in process to prevent patient referrals in stages later than screening.

The number of indirect restorations needed is usually the main referral reason for restorative dentistry. The other common reasons are severe perio patients.
We do not let students do more than 6-8 indirect units in the predoc, no upper overdentures are allowed, we do not increase vertical dimension of occlusion. These protocols are well known among faculty but there is not yet one single document that lists it all. It is in the works.

UNC –
At least for the last 10 years
Outlined in the operative clinical manual. Copy of the manual made available to all faculty. Any changes or updates are discussed at department meeting before the manual is edited.
Depends on the complexity of the case. Most often the patient is referred to a Graduate Operative, Perio or Pros clinic and the dental student is given the choice to work alongside a graduate student provider.

MUSC – Yes, recently in effect, Responsibility of faculty during the screening, intake of patients to the College. If the screening faculty determine that the case would be too complex for the undergraduate student to treat. If appropriate to our AEGD program or our faculty practice

VCU – No. Potential patients enter the system through Screening with designated faculty and are chosen based on their suitability of being a teaching case for a student. Patients also enter the school through general screening in the student groups or the Urgent Care Clinic, where the decision to accept a patient is based on the Attending, once again with the premise that it's a suitable student case. Sometimes a case will be determined more suitable for the AEGD residents while initially in the pre-doctoral clinic and will be referred to them.
Additionally, restrictions in treatment are specialty driven. Examples would be molar endo and anterior restoration of implants. We follow the CODA requirements of skills needed by an entry level general dentist. We define these skills under the guidelines of Standard 2-24 a-o.

What is the most common referral destination for these patients?
If you have such a policy, can you share it as an attachment to your response?

ECU – They are referred to AEGD, GPR and Faculty Practice
UF –
GA – GPR, AEGD, or Pros. Residencies
UK –
UL – See above answer
MMC – Specialty Departments within the School (Oral Surgery/Pediatric Dentistry/Orthodontics and to the GPR program. Referral to these areas does not guarantee treatment by that service and may be referred to the private sector.
UNC – Graduate Pros, Operative and Perio clinic.
It is a standard referral form with listing of clinical findings and faculty approval for referral.
MUSC – I am not able to at this time.
VCU –

If NO-
Are you considering implementing such a policy?
If you are not considering such a policy, how do you manage the treatment of very complex patients in your pre-doctoral student program?

ECU – They are referred to AEGD, GPR and Faculty Practice
UF –
GA –
UK – Not at this time
UL – See answer above
MMC –
UNC –
MUSC –
VCU – See answer above

GA-4: "Entrustable Professional Activities" (EPAs) is a new framework for assessing overall competency and readiness for practice. (Selected references linked below for your edification)
http://www.jdentaled.org/content/82/11/1123?rss=1
https://onlinelibrary.wiley.com/doi/full/10.1111/tct.12436
https://onlinelibrary.wiley.com/doi/full/10.1111/imj.12914

Is your school currently using EPA's in any portion of your pre-doctoral competency curriculum? YES or NO?

ECU – Our competencies are written to include (1) basic knowledge, (2) applied knowledge/clinical reasoning skills, (3) surgical skills, and (4) application of evidence. Our assessment techniques include - basic didactic exams (MC/TF), applied didactic exams (OSCE), quantitative skills assessments, qualitative skills assessments, portfolios, and PBL. Different competencies use different variations of the same techniques.

I.E. For the cardiovascular system competency, we make the student demonstrate that they know how to manage a myocardial infarction in the dental chair. For operative, we make them demonstrate their capability to perform each operative technique.

Technically all of our competencies use the EPAs, during all 4 years.

We use many different assessment techniques, and apply the correct types and number based on each of the very different competency themes.

UF – No

GA – No

UK – No

UL – Not by that name. According to JDE (Nov. 2018), "EPAs are observable units of practice that require multiple competencies to perform." Given that definition, we are at least somewhat using this framework in operative since we employ multiple competency exams over time; not just one and done. This is present in all four years. However, since I am not totally knowledgeable about EPA, maybe I'm missing the point. If I am missing the point, then more information is needed and evidence of efficacy of the concept.

MMC – No. It appears to be used at the Medical School.

UNC –

MUSC – Yes

VCU

If YES-
How long have you been using it?
For which competencies?
During which years (e.g. D1, D2, D3, D4)?
What is your opinion or judgment of the outcomes associated with it?
Provide at least one detailed example of an EPA competency in your curriculum –

ECU –

UF –

GA –

UK –

UL – We have never employed the concept that passing one competency exam means that the student is competent, and no other exams are needed.
All competency exams in operative. All – All years

MMC – Since before I arrived at the College three years ago. All areas of dentistry. Very good. It gives the student a sense of accomplishment and can prepare them for the "real world". Each student must complete C&B, restorative procedures, etc. have them signed off by two different faculty members on two different procedures in order to have their "competency" card punched.

UNC – No

MUSC –

VCU – No

If NO-
Are you aware of / familiar with this new competency format?
Do you have plans to adopt it for your program?
If NO to adopting it, why not?
ECU –

UF – Yes. A group of Faculty in UFCD is learning more about EPAs and how to use them in the DMD. Yes, we do**.**
GA – Yes, theoretically.
It is being considered as part of an overhaul of competency exams in our school

UK –
Yes
Not at this time
We have current assessments like the comprehensive OSCE, Case presentations, and CDS 843 "final exam" that incorporate multiple competencies in a summative format. We are considering this concept. Faculty time to implement this is a constraint.

UL –

MMC –

UNC – yes, yes

MUSC – We are familiar but not very knowledgeable with this format. In the 2 treatment planning course we have a similar exercise that counts as an important portion of the students' grade.
That is similar to what we are planning to implement with clinical treatment planning competency. It is in the works.

NOVA -

VCU – Some in the school are, however I was not. EPAs have not been looked at.

Meharry Medical College School of Dentistry

MMC- 1: How many courses in your curriculum are devoted to teaching Operative Dentistry?
In what year and what semester?
What is covered in each course?
What is the general sequence of the broad topics? (Composites, amalgam, ceramics, etc.)

ECU – 2
Starts in the 2nd semester of their first year. It runs until the end of their 2nd year
Basic knowledge (instruments/preparation) / Materials / Cariology
(Composites, amalgam, ceramics, etc.)
Basic knowledge (instruments/preparation) / Materials / Cariology
Class 1,2,3,5 and 4. (Amalgam and composite are taught at the same time)
Advanced Operative (Cad-Cam; Onlays; Esthetic Dentistry; etc.…)

UF –

GA – D1. Operative dentistry: OPER I and OPER II. 44 sessions total
D2. Sophomore block (2 semesters)- rotate through a number of areas in clinic. In Operative, step up from natural teeth in dentoform head in clinic chair to simple class 1, 5, 3 Oper on patients
D3. Esthetic course (1 semester)

UK – This depends on what you include under the umbrella of Operative Dentistry. We have 2 courses for Operative if we are not including crowns.
Composite is taught first, followed by amalgam, followed by GI.

Course	Semester Offered	Material Inclusion
RSD 810 Restorative Dentistry I RSD 814 Preclinical Restorative Dentistry I	Fall/Spring Year 1 Fall/Spring Year 1	Composite, Amalgam, GI, Liners and Bases
RSD 823 Restorative Dentistry II RSD 824 Preclinical Restorative Dentistry II	Fall Year 2	Posterior Single Tooth Crown Preparations and Provisionals
RSD 825 Restorative Dentistry III RSD 826 Preclinical Restorative Dentistry III	Spring Year 2	Anterior and Posterior Crown Preparations and Provisionals Inlay/Onlay Preparations and Provisionals Post and Cores

UL – - Dental Anatomy (D1): lecture and lab – D1 fall

- Preclinical Operative Dentistry 1 (D1): lecture and lab – see content above; D1 spring

- Preclinical Operative Dentistry 2 (D2): lecture and lab – see content above

- Operative Dentistry 3 (D3): lecture only – review basic preparations, new caries detection technology and treatment, review liners, more details of adhesives, review Class 2 posterior resin composite. This course places major emphasis on literature reviews performed by the students on assigned clinical scenarios and/or clinical scenarios of their choosing. D3 – 7 weeks

- Clinical Operative Dentistry 1: D3 – summer, fall, and spring

- Clinical Operative Dentistry 2: D4 – summer, fall, spring

- What is Covered – See above in ECU 1

- What is the general sequence of broad topics? Preclinical Operative Dentistry 1 – generally, amalgam is taught first and then resin composite with more emphasis on resin composite. Preclinical Operative Dentistry 2 – this course is 90% esthetic dentistry; only one pin retained amalgam; everything else is resin composite restorations. Ceramic onlay prep only, not restored. Prep is digitally scanned in another course.

MMC – 2 courses are devoted to teaching operative dentistry During D2 Year, fall and spring. Yes, along with bioactive materials, bases and liners, direct and indirect pulp capping with these materials.

NOVA - We teach operative dentistry in the D1 year starting around mid October. Amalgam as a biomaterial, class 1 amalgam, class II amalgam, bonding, composite as a biomaterial, class I composite, Class II composite, complex amalgam(with cusp replacement), onlay. Crowns are in the D2 year with the fixed course.

UNC – Three: Conservative operative dentistry (COD), Advanced operative dentistry (AOD) and Clinical Operative dentistry.
-COD in DDS-1, AOD in DDS-3, Clinical operative dentistry in years 2-4.
-COD – Adhesive Dentistry, Composite restoration, Amalgam restorations, Fabrication of bleaching trays, Selective caries removal, Pulp protection
AOD – Advanced adhesive dentistry, Ceramic inlays/onlays, Veneer preps and restorations, Shade matching, Light curing

MUSC – See response to Alabama. Composites, amalgam, ceramics etc.

VCU – There are currently 2 pre-clinical Operative Dentistry Courses the D1 Year (Lecture and Lab, both continuous courses from Fall through Spring). In the D2 Clinical Skills courses, Operative is a review/reinforcement of previously taught principles and practice performing mannequin-based procedures in Clinic.

Does your school teach composite technique before amalgam technique or amalgam technique before composite technique?

What are the reasons or justifications for doing this?

ECU – We teach both at the same time

UF – We started with resin-based composite, then amalgam, then back to resin based-composite

GA – YES. In changing to a disease-based approach, we teach ICDAS category and then move from least invasive (sealant, PRR) to more invasive with composite and amalgam.

UK – We teach Composite first then Amalgam. We want to present the most conservative approaches and techniques first. This helps the student consider minimally invasive concepts first and foremost.

UL – Amalgam before resin composite. More emphasis is being placed on resin composite as this is the trend in general practice and the regional licensing boards

MMC – Amalgam before composites. To develop basic concepts of the more precision driven procedures

NOVA - We teach amalgam before composite because amalgam prep is more structured and the material is less forgiving so it is easier to learn the more structured one and loosen up.

UNC – Preparations for composite restorations are taught before preparations for amalgam preparations to introduce the concept of conservative preparations which can be modified to a mechanically retentive amalgam preparation.

MUSC – That is how I "found it" when I arrived here.

VCU – We currently teach amalgam before composite. I think it is good to teach amalgam first, as the preparations are more difficult, and I think it help develop psychomotor skills.

How many restorations is each student required to do in the pre-clinical classes/laboratories?

ECU – About 5x amalgam/5x composite restorations for Class 1s and 2s each; about 6x class 5s and class 3s and 4x class 4s not counting mock/skills assessments.

UF – There is an average of 20-30 exercises that are required in each course.

GA – No requirement. We use skill assessments (practicals). Student are given a lab worksheet that has a minimal number of practice procedures, but they can do more on their own. We encourage them to have all preparations and restorations reviewed by a third party (Staff or tutor) vs. just repeating the prep or rest.

UK – 20 – 25

UL – Preclinical Operative Dentistry 1
Class I amalgam – 3
Class 2 amalgam – 3 plus a practical exam on the prep and restoration
Provisional – 1
Class 2 resin (traditional) – 3 plus a practical exam on the prep and restoration
Class 2 resin (box only) – 3 plus a practical exam on the prep and restoration
Class 3 resin – 3 plus a practical exam on the prep and restoration
Class 5 resin – 3 plus a practical exam on the prep

Preclinical Operative Dentistry 2
Class 3 resin – 3 plus a practical exam on the prep and restoration
Class 2 resin (box only) – 2
Class 2 resin core – 1
Class 4 resin – 3 plus a practical exam on the prep and restoration
Class 2 pin retained amalgam core – 1
Class 4 diastema closure – 1
Class 2 ceramic onlay prep – 1
Veneer prep – 2
Veneer provisional – 2

MMC – About 40 encompassing 75 surfaces not including redo's.

NOVA – Around 25 Projects

UNC – About 25-30 exercises (preparations and restorations)

MUSC – They have a specific number of tooth restorations to do in each section of the course, at least three practical's to help determine abilities of these procedures and at least one OSCE Final Exam in each course to help put these skills into critical thinking perspective.

NOVA - Minor ones are implemented at the discretion of the course director and major ones go through curriculum committee.

VCU – For Pre-Clinical Operative Lab, per the Course Syllabus, "Approximately 35 laboratory projects". It is not broken down in the Syllabus as to how many preparations and restorations, but there are more preparations preformed than restorations, although not a large number, as that is how the students begin the course, with preparations only at first.

How do you incorporate recent technological advances in Operative Dentistry into your curriculum?

ECU – Updating lecture content and managing the course hours if a lab/hands on exercise is needed.

UF – We create workgroups, and then is presented to the division for discussion. If it is approved by the division, then is presented to the department for calibration and the disseminated to the students, and administration.

GA – Through the section of Operative Dentistry and the Associate Dean for Academic Affairs or Curriculum Committee when changes are significant

UK – We incorporate these based on evaluation of research and we often have faculty trial new equipment in the Faculty Practice Clinic before introducing to students.

UL – Digital dentistry is incorporated in Preclinical Operative Dentistry 2 via scanning the only preparation. In clinic, students are being introduced to digital scanning and milling on a limited basis

MMC – This included in our D3 advanced restorative curriculum.

NOVA - Minor ones are implemented at the discretion of the course director and major ones go through curriculum committee.

UNC – We use the MARC simulation head for training students proper light curing and awareness of its importance.
We use of VITA EasyShade and Rite Lite instruments to help the student evaluate instrumental vs visual shade matching process.
MUSC – I feel that if I am not aware of and comfortable with my understanding of these new technologies, how can I teach these. I regularly attend courses to continue to stretch my limits

VCU – Usually the advances are more with materials/material techniques, so it is usually incorporated into pre-clinical operative lecture, performed in lab, and then in the Clinics. However, sometimes the Clinics will start using a new material and then we will change in pre-clinical operative and teach it there.

What does your school teach for the longevity of different restoration types? What is the supporting evidence

ECU – At the beginning or end of each lecture a few slides are devoted to speaking about longevity of the given technique. When a new paper comes out is usually added to the list of references.

UF – We have a lecture of amalgam vs composite, where we discussed the longevity, indications, contraindications, risks factors and the evidence

GA – It is covered incidentally in various lectures on dental materials and restorative techniques.

UK – We base this on research and also patient specific factors.
Clinical Longevity of Restorations Evidence Selection:

D Angerame & M De Biasi, Do Nanofilled/Nanohybrid Composites Allow for Better Clinical Performance of Direct Restorations han Traditional Microhybrid Composites? A Systematic Review. Oper Dent 2018;43(4): E191-E209
Beck, et al. Survival of direct resin restorations in posterior teeth within a 19-year period (1996–2015): A meta-analysis of prospective studies. Dent Mater 2015; 31:958-985.
DeMarco et al. Longevity of posterior composite restorations: Not only a matter of materials. Dent Mater 2012; 28:87-101.
Demirci et al Five-year Clinical Evaluation of a Nanofilled and a Nanohybrid Composite in Class IV Cavities. Oper Dent 2018; 43:261-271.
Dietz et al. Longitudinal micromorphological 15-year results of posterior composite restorations using three-dimensional scanning electron microscopy. J Dent 2014; 42:959-969.
Fennis et al. Randomized Control Trial of Composite Cuspal Restorations: Five-year Results. J Dent Res 2014; 93:36-41.
Gordan et al. A clinical evaluation of a giomer restorative system containing surface prereacted glass ionomer filler. Results from a 13-year recall examination. J Am Dent Assoc 2014; 45:1036-1043.
Heintze & Rousson Clinical effectiveness of Class II restorations A meta-analysis. J Adhes Dent 2012; 14:407-431.
Heintze et al. Clinical effectiveness of direct restorations—a meta-analysis. Dent Mater 2015; 31:481-495.
Lempel et al. Retrospective evaluation of posterior direct composite restorations: 10-Year findings. Dent Mater 2015; 31:115-122.
Lynch et al. Guidance on posterior resin composites: Academy of Operative Dentistry - European Section. J Dent 2014; 42:377-383.
Opdam et al. Longevity of Posterior Composite Restorations: A Systematic Review and Meta-analysis. J Dent Res 2014; 93:943-949.
Van Dijken & Pallesen. Clinical performance of a hybrid resin composite with and without an intermediate layer of flowable resin composite: A 7-year evaluation. Dent Mater 2011; 27:150-156.

UL – Amalgam – 15+ years
Resin composite – 15+ years
Ceramic – 15+ years

Longevity of posterior dental restorations and reasons for failure. Eur J Oral Sci 2012; 120: 539–548.
Longevity of Restorations in Posterior Teeth and Reasons for Failure. J of Adhe Dent. 2001, Vol. 3 Issue 1, p45-64.
Longevity of posterior composite restorations: a systematic review and meta-analysis. J Dent Res. 2014 Oct;93(10):943-9.
The ultimate guide to restoration longevity in England and Wales. Part 4: resin composite restorations: time to next intervention and to extraction of the restored tooth. Br Dent J. 2018 (12):945-956.
The ultimate guide to restoration longevity in England and Wales. Part 2: Amalgam restorations - time to next intervention and to extraction of the restored tooth. Br Dent J. 2018 (10):789-800.

MMC – Amalgams 15-20 years and anterior composites 10-12 years. Posterior composites 5-7 years. See articles.

NOVA - We go by textbooks and literature but I need to speak to the course director on which material they use as references.

UNC –

1. Bernardo M, Luis H, Martin MD, Leroux BG, Rue T, Leitao J et al: Survival and reasons for failure of amalgam versus composite posterior restorations placed in a randomized clinical trial. J Am Dent Assoc 2007; 138: 775-783.
2. Soncini JA, Maserejian NN, Trachtenberg F, Tavares M and Hayes C: The longevity of amalgam versus compomer/composite restorations in posterior primary and permanent teeth: Findings from the New England Children's amalgam trial. J Am Dent Assoc 2007; 138: 763-772.
3. Kovarik RE: Restoration of posterior teeth in clinical practice: Evidence base for choosing amalgam versus composite. Dent Clin North Am 2009; 53: 71-76.
4. Demarco FF, Correa MB, Cenci MS, Moraes RR and Opdam NJM: Longevity of posterior composite restorations: Not only a matter of materials. Dental Materials: 2012; 28: 87-101.

MUSC – We do our best to always use the scientific literature to base our teaching and materials we use. The current NIDCR findings on composite restorations always leaves me concerned with the longevity of these restorations, especially if they are "sloppy" in the applications. I strive to help bring these concerns to my students and hopefully help them hold these concerns in high regard as they treat their patients.

VCU – We utilize Sturdevant 7th ed., and have cited that text, as well as journal articles/studies.

MMC-2: What changes to your Operative Dentistry Course Curriculum have been made to prepare for the new structure of the National Boards?

ECU – We have not changed the curriculum based on the new INDBE. Several of our CIE's and test questions already have a similar format to what the INDBE will be.

UF – The Operative courses are rearranging the sequence of lectures and labs in order to integrate better with Cariology and Biomaterials. Also, the idea is to create more critical thinking exercises to integrate the contents.

GA – Comprehensive Oral Exam- single student, two faculty, 25 minutes. Using a real case, and questions on O Med, Endo, Perio, Oper, and basic Phase 3 options. Based on U of FL Gateway model- we also do two high-stakes Practicals on dentoforms.

Scenario-based Practicals- Patient CRA and appearance of lesion given as a scenario to guide selection of restoration in practical.

UK – We have not made definitive changes currently.

UL – Including box-type integration questions in Preclinical Operative Dentistry 1 and 2.

MMC – Questions are being requested to be formatted in the new concept.

NOVA – Nothing has been changed yet

UNC – We have workshops set up for faculty to better understand how the content needs to be delivered and in preparing questions that are similar to INDBE.

MUSC – We are in the process of updating as needed what is taught for this purpose and to help them be successful

VCU – I have been changing the format of my test/quiz questions to better reflect the INDBE format. In addition, I am working towards eliminating T/F, all of the above and none of the above distractors in multiple choice examinations. We have also been offered instruction on this topic at multiple Faculty Retreats. Clinical Faculty have also been offered C.E. credit to attend lectures presented by the Basic Science Faculty. Clinical faculty are expected to give feedback to the basic science faculty with dental examples/correlations and then to incorporate relevant biomedical information in their teaching, later in the students' development.

The Medical University of South Carolina

MUSC1: Please indicate the manufacturer/product used for each category of material listed, device used, technique experienced, or faculty ratios requested

School Name:	
Primary dentin bonding agent	
Secondary dentin bonding agent	
Primary resin composite	
Secondary resin composite	
Primary base/liner	
Secondary base/liner	
Primary pulp capping agent	
Primary Liner under amalgam	
Primary luting cement	
Secondary luting cement	
Primary impr material (castings)	
% of students that use or have experience with CAD/CAM clinically	
Primary Indirect provisional material	

Have lasers in clinic? Type?	
Posterior Amalgam/Composite ratio	
Total Students this year D1 / D4	
Faculty/Student ratio in Clinic	
Faculty/Student ratio in Lab	

School Name: ECU	
Primary dentin bonding agent	Optibond / Kerr
Secondary dentin bonding agent	ScotchBond MP / 3M
Primary resin composite	Grandioso - VOCO
Secondary resin composite	NA
Primary base/liner	Vitrebond
Secondary base/liner	Dycal
Primary pulp capping agent	MTA
Primary Liner under amalgam	Gluma / Vitrebond
Primary luting cement	RelyX- 3M
Secondary luting cement	Variolink- Ivoclar
Primary impr material (castings)	Aquasil
% of students that use or have experience with CAD/CAM clinically	30 to 40%
Primary Indirect provisional material	Integrity
Have lasers in clinic? Type?	Yes
Posterior Amalgam/Composite ratio	Depends on the situation and Faculty covering
Total Students this year D1 / D4	52 per class = 208 total
Faculty/Student ratio in Clinic	Ideally no more than 1 to 6
Faculty/Student ratio in Lab	1 to 10

School Name: UFL	
Primary dentin bonding agent	Optibond FL, Kerr
Secondary dentin bonding agent	Clearfill SE Bond 2, Kuraray
Primary resin composite	Filtek Supreme Ultra, 3MESPE
Secondary resin composite	
Primary base/liner	Vitrebond, 3MESPE
Secondary base/liner	
Primary pulp capping agent	Dycal, Caulk
Primary Liner under amalgam	Gluma, Caulk
Primary luting cement	Fuji Cem, GC
Secondary luting cement	

Primary impr material (castings)	Aquasil, Dentsply
% of students that use or have experience with CAD/CAM clinically	100
Primary Indirect provisional material	Snap, Parkell
Have lasers in clinic? Type?	We used to have it
Posterior Amalgam/Composite ratio	10:90
Total Students this year D1 / D4	93 per class
Faculty/Student ratio in Clinic	1:6
Faculty/Student ratio in Lab	1:8-10

School Name: GA	
Primary dentin bonding agent	Optibond FL
Secondary dentin bonding agent	
Primary resin composite	Harmonize, Kerr
Secondary resin composite	
Primary base/liner	Ultrablend, Dycal
Secondary base/liner	Vitrebond
Primary pulp capping agent	Ultrablend, Dycal
Primary Liner under amalgam	none
Primary luting cement	Rely X (3M) RMGI
Secondary luting cement	UniCem (3M)
Primary impr material (castings)	Reprosil (Destsply)
% of students that use or have experience with CAD/CAM clinically	100% in/by the senior year
Primary Indirect provisional material	Integrity (Dentsply)
Have lasers in clinic? Type?	no
Posterior Amalgam/Composite ratio	Dispersalloy/Tytin. Harmonize (Kerr)
Total Students this year D1 / D4	Average of 95
Faculty/Student ratio in Clinic	Junior year: 6/1
Faculty/Student ratio in Lab	10/1

School Name: UK	
Primary dentin bonding agent	Optibond FL, Kerr Dental
Secondary dentin bonding agent	Clearfil SE, Kuraray Dental
Primary resin composite	Filtek Supreme Ultra, 3M
Secondary resin composite	IPS Empress Direct, Ivoclar Vivadent
Primary base/liner	Fuji LC, Dycal
Secondary base/liner	Base=Equia Forte

Primary pulp capping agent	Dycal, Dentsply Caulk
Primary Liner under amalgam	Fuji Lining LC, GC America
Primary luting cement	RelyX Unicem 2, Ivoclar Vivadent
Secondary luting cement	Variolink Esthetic, Ivoclar Vivadent
Primary impr material (castings)	Aquasil Ultra, Dentsply Sirona
% of students that use or have experience with CAD/CAM clinically	75%
Primary Indirect provisional material	Telio, Ivoclar Vivadent
Have lasers in clinic? Type?	No
Posterior Amalgam/Composite ratio	5%, 95%
Total Students this year D1 / D4	1:65, 2:65, 3:65, 4:70
Faculty/Student ratio in Clinic	6:1 for 2nd year, 8:1 4th year
Faculty/Student ratio in Lab	10:1

School Name: UL	
Primary dentin bonding agent	Ivoclar ExciTE-F
Secondary dentin bonding agent	none
Primary resin composite	Ivoclar EvoCeram
Secondary resin composite	none
Primary base/liner	3M VitraBond Plus (liner)
Secondary base/liner	Dycal (liner)
Primary pulp capping agent	Dycal
Primary Liner under amalgam	VitraBond Plus (only if near exposure)
Primary luting cement	3M RelyX Luting Plus (RMGI)
Secondary luting cement	3M RelyX Unicem
Primary impr material (castings)	Aquasil
% of students that use or have experience with CAD/CAM clinically	Probably <10%
Primary Indirect provisional material	Jet or Integrity
Have lasers in clinic? Type?	No
Posterior Amalgam/Composite ratio	60-70% resin composite (estimate)
Total Students this year D1 / D4	120/118
Faculty/Student ratio in Clinic	1:6
Faculty/Student ratio in Lab	Varies 1:10 to 1:18

School Name: Meharry Medical College	
Primary dentin bonding agent	Prime and Bond NT
Secondary dentin bonding agent	Prime and Bond Elect
Primary resin composite	Esthet-X HD Capsules

Secondary resin composite	Esthet-X Flowable
Primary base/liner	Dycal
Secondary base/liner	Limelite/Vitrebond Light Cure
Primary pulp capping agent	Dycal
Primary Liner under amalgam	Copalite/Limelight
Primary luting cement	Fujii Cem 2 Automix
Secondary luting cement	GC Fujii IX
Primary impression material (castings)	Aquasil (Thermaclone Ultradent)
% of students that use or have experience with CAD/CAM clinically	40%
Primary Indirect provisional material	JET acrylic
Have lasers in clinic? Type?	Yes
Posterior Amalgam/Composite ratio	Dispersalloy/Esthet-X HD
Total Students this year D1 / D4	D1: 62 D2: 62 D3: 62 D4: 58
Faculty/Student ratio in Clinic	20:1
Faculty/Student ratio in Lab	15:1
Provisional Cement	Tempbond/Fynal

School Name: NOVA	
Primary dentin bonding agent	Optibond FL
Secondary dentin bonding agent	
Primary resin composite	Filtek Supreme
Secondary resin composite	Premise
Primary base/liner	Fuji lining LC
Secondary base/liner	VLC Dycal
Primary pulp capping agent	MTA but will be changed to Biodentine soon.
Primary Liner under amalgam	Fuji lining LC (we do not use liners unless need to)
Primary luting cement	Variolink esthetic DC
Secondary luting cement	Multilink automix
Primary impr material (castings)	Impregum, Aquasil
% of students that use or have experience with CAD/CAM clinically	100
Primary Indirect provisional material	Coldpac
Have lasers in clinic? Type?	Yes, Picasso II diode laser but seldomly used
Posterior Amalgam/Composite ratio	Composite(Amalgam for abutment tooth & Saliva iss)
Total Students this year D1 / D4	125 per year (500 in total)
Faculty/Student ratio in Clinic	1/5 in theory. Much more in reality.
Faculty/Student ratio in Lab	15/1

School Name: UNC	
Primary dentin bonding agent	Clearfil SE Bond 2
Secondary dentin bonding agent	3M Scotchbond Universal
Primary resin composite	Filtek Supreme Ultra
Secondary resin composite	
Primary base/liner	Vitrebond
Secondary base/liner	
Primary pulp capping agent	Dycal/MTA
Primary Liner under amalgam	Vitrebond
Primary luting cement	Rely X Luting Plus and Rely X Unicem
Secondary luting cement	
Primary impr material (castings)	Aquasil Heavy and light body
% of students that use or have experience with CAD/CAM clinically	40%
Primary Indirect provisional material	PMMA
Have lasers in clinic? Type?	Not in student clinics/ Refer to Grad clinics
Posterior Amalgam/Composite ratio	Yes
Total Students this year D1 / D4	82-84/yr
Faculty/Student ratio in Clinic	1:6
Faculty/Student ratio in Lab	1:6

School Name: MUSC	
Primary dentin bonding agent	All Bond Universal (Bisco)
Secondary dentin bonding agent	Adhese Universal (Ivoclar)
Primary resin composite	Clearfil Majesty ES-2(currently) (Kurray)
Secondary resin composite	
Primary base/liner	Lime Light Enhanced (Pulpdent)
Secondary base/liner	
Primary pulp capping agent	BioDentine (Septodont)
Primary Liner under amalgam	Lime Light Enhanced (Pulpdent)
Primary luting cement	RelyX Luting (3M)
Secondary luting cement	Unicem (3M)
Primary impr material (castings)	Aquasil (Dentsply
% of students that use or have experience with CAD/CAM clinically	100%
Primary Indirect provisional material	Jet Acrylic
Have lasers in clinic? Type?	Yes, Diode (CAO and AMD Laser) and Er-Yag
Posterior Amalgam/Composite ratio	Contour, Tytin/Clearfill Majesty Posterior
Total Students this year D1 / D4	75/75
Faculty/Student ratio in Clinic	1/6
Faculty/Student ratio in Lab	4/75 + 4 TA's

School Name: VCU	
Primary dentin bonding agent	Currently Optibond Solo Plus but are in the process of changing to ClearFil SE Bond 2.
Secondary dentin bonding agent	
Primary resin composite	Filtek Supreme Ultra (Nanofill)
Secondary resin composite	Currently Kerr Revolution Flowable, but in the process of changing to Filtek Supreme Ultra Flowable
Primary base/liner	Dycal when indicated, Vitrebond Plus when indicated
Secondary base/liner	
Primary pulp capping agent	Dycal
Primary Liner under amalgam	Currently sealing with Optibond Solo Plus or bonding with Scotchbond Multi-Purpose Plus or dentin desensitization with Gluma. However, in the process to using only Gluma.
Primary luting cement	Fuji Cem II for most everything except Resin Fiber Posts, which would use NX3
Secondary luting cement	Panavia SA
Primary impr material (castings)	Aquasil
% of students that use or have experience with CAD/CAM clinically	100% by graduation will have completed at least one CAD/CAM restoration
Primary Indirect provisional material	Integrity
Have lasers in clinic? Type?	No; Carbon laser in Perio to use instead of electrosurge
Posterior Amalgam/Composite ratio	
Total Students this year D1 / D4	101/102
Faculty/Student ratio in Clinic	As scheduled, can vary from 1:6 or 1:8. However, that can sometimes be less if patients do not show, or more if a Faculty is ill, etc.
Faculty/Student ratio in Lab	Can vary widely. Sometimes 1:10 but can also be greater.

MUSC2- Does your school provide all typodont teeth for student practice or does your school make the students buy their own?

ECU – We provide the initial teeth for each exercise or skills assessments; extra practice teeth are purchased by the student.

UF – The school provides all the teeth necessary for the lab practice. Usually the students are responsible for extra practice teeth.

GA – Both (depending of the course)

UK – We provide some teeth and the students but some of the teeth.

UL – Our school provides all dentoform teeth

MMC – The students buy their typodonts.

NOVA - They buy their own. We provide teeth for exams sometimes. Especially for waxups or complex restorations.

UNC – For operative dentistry courses, it is included in the student fees.

MUSC – Currently we are "experimenting" with providing a specific # of teeth and extra are purchased by students. The jury is out on this system.

VCU – Students have to buy their own.

University of Florida

UF- 1: Does any of the school apply the EPA (Entrustable Professional Activities) model in the clinical scenario?

If yes, how is it used? How many EPAs does the school have?
If no, how are the schools evaluating the milestones of the student throughout Dental School? And how the notions of trust and supervision are added in the assessment equation?

ECU –

UF – No, we don't have the EPA model implemented but there is an intent to do that in a near future.
The students are expected to pass the clinical assessments and complete their requirements. There is not a measure of milestones along their clinical practice (longitudinal evaluation). The clinical assessment that does have some type of longitudinal assessment is the caries management, where the students present how they were able to control the disease (implemented actions and results from the caries risk assessment form***).***

GA – See our answer in GA-4: Currently- NO, but we are considering it.

UK – We provide some teeth and the students but some of the teeth.
We have assessments like the comprehensive OSCE, Case presentations, and CDS 843 "final exam" that incorporate multiple competencies in a summative format.

UL – No, as above (GA-4), by the definition in the JDE, we have multiple practical exams in the preclinical courses and multiple competency exams in the clinical courses.
The practical examinations and competency exams are done independently by the students. If the student is unprepared and performing poorly on a patient-based exam, the faculty intervene, and the student fails the exam.

MMC – No, FCCE passage/ OSKI, we have professional criteria that we assess as pass/fail. Three failures in pass/fail areas constitute a failed procedure.

NOVA -

UNC – No
Assessments developed by CODA standards. We have not implemented any major changes since our accreditation last year. We are considering developing/ purchasing a tracking system separate from patient records for student assessments.
In the process of developing a new curriculum

MUSC – Currently we are "experimenting" with providing a specific # of teeth and extra are purchased by students. The jury is out on this system.

VCU – No.

UF-2: What is the school policy for "cheating"? If a student is caught trying to cheat during a psychomotor, what is the consequence?

ECU – Under our Code of Professional Conduct, anyone who observes a potential infraction of the code is obligated to report the matter to the Associate Dean for Student Affairs in writing. The consequence depends on many factors. If there is a finding of violation, the Professional Conduct Committee notifies the Dean, and provides the committee's recommendation for sanction. The Dean makes the final decision about the sanction.

UF – In our school, the student would fail the Psychomotor and also receive a professional variance

GA – The process is the same for any assessment. There are strong mechanisms in place to prevent cheating in psychomotor exams: A new die or tooth marked with a divot filled with a specific color of fingernail polish is given to the student the day of the exam. The color of wax is announced the day of the exam. 2-3 proctors closely monitor during the practical. No evidence of cheating has been noted.

In other cases of cheating, the case is written up and referred to the Vice Chair of the Student Affairs Committee who convenes a Code of Conduct investigating committee of three: the Vice Chair, the school's Spokesperson ("prosecutor") and a student of the same class as the accused, usually the class president.

This committee interviews the key witnesses and the accused, who is also allowed to suggest witnesses, and determine if the complaint is valid and reaches the level of a Code of Conduct violation.

If so, the case is referred for a full Code of Conduct hearing. A panel of five randomly chosen faculty members hear the case presented by the Spokesperson and the accused defense. They determine guilt or innocence and recommends a consequence, taking into account the recommendation of the Spokesperson and the course director. This is sent to the Dean, who makes the final decision.

So far, the Dean has accepted all recommendation from the committee.

UK – No matter which course, when the academic offence (cheating) is committed, the responsible course instructor follows the procedure as outlined by University Rule below:

Initiating a Complaint

The instructor and the chair review the evidence, and the instructor determines if the evidence warrants an allegation. If so, the instructor invites the student to discuss the evidence with the instructor and chair and sets a deadline of no less than seven working days for the student's response to the invitation. Effort must be made to schedule the meeting as soon as possible.

The instructor considers the evidence and the student's response and decides whether the student committed an academic offense. Any such finding shall be made within 7 working days after the meeting with the student unless the student consents in writing to an extension of this time.

If the student fails to respond to the meeting request, the instructor may determine whether the student committed an academic offense and the penalty that should be imposed.

Determining the Penalty

A. If the instructor determines the student did not commit an academic offense, the instructor notifies student.

B. If the instructor determines the action can be construed as an academic offense but is so slight or inconsequential that it does not warrant the minimum penalty of zero on the assignment, the instructor should not treat the action as an academic offense, but as an ordinary error that may earn the student a lower grade on the assignment. The instructor shall notify the student of such a determination.

C. If the instructor finds the student did commit an academic offense, the chair shall ask the Registrar (sean.cooper@uky.edu) whether there are any prior offenses or letters of warning in the student's record and inform the instructor whether such is the case. In addition, the chair shall ask the Registrar to place a hold on the student's enrollment in the course; if the student has already withdrawn, reinstate the student in the course.

UL – Academic Honesty

Academic dishonesty is prohibited at the University of Louisville. It is a serious offense because it diminishes the quality of scholarship, makes accurate evaluation of student progress impossible, and defrauds those in society who must ultimately depend upon the knowledge and integrity of the institution and its students and faculty.
https://louisville.edu/dos/students/studentrightsandresponsibilities

Section 5.

Academic Dishonesty

The University of Louisville pursues excellence in its work to educate and serve its community with integrity. Academic dishonesty is prohibited at the University of Louisville because it diminishes the quality of scholarship, prohibits independent thought that is essential to intellectual growth and development, makes accurate evaluation of student progress impossible, and defrauds those in society who must ultimately depend upon the knowledge and integrity of the institution and its students and faculty.

Academic dishonesty includes, but is not limited to, the following:

A. *Cheating:*

1. Using or attempting to use books, notes, study aids, calculators, or any other documents, devices, or information in any academic exercise without prior authorization by the instructor.
2. Copying or attempting to copy from another person's paper, report, laboratory work, computer program, or other work material in any academic exercise.
3. Procuring or using tests or examinations, or any other information regarding the content of a test or examination, before the scheduled exercise without prior authorization by the instructor.
4. Unauthorized communication during any academic exercise. Except when otherwise explicitly stated by the instructor, examination questions shall become public after they have been given.
5. Discussing the contents of tests or examinations with students who have not yet taken the tests or examinations if the instructor has forbidden such discussion.
6. Sending a substitute to take one's examination, test, or quiz, or to perform one's field or laboratory work; acting as a substitute for another student at any examination, test, or quiz, or at a field or laboratory work assignment.
7. Conducting research or preparing work for another student, or allowing others to conduct one's research or prepare one's work, without prior authorization by the instructor.

B. *Fabrication:*

Inventing or making up data, research results, information, or procedures, including a record or any portion thereof regarding internship, clinical, or practicum experience.

C. *Falsification:*

Altering or falsifying information, such as:

1. Changing grade reports or other academic records.
2. Altering the record of experimental procedures, data, or results.
3. Altering the record of or reporting false information about internship, clinical, or practicum experiences.
4. Forging someone's signature or identification on an academic record.
5. Altering a returned examination paper in order to claim that the examination was graded erroneously.
6. Falsely citing a source of information.

D. *Multiple Submission:*

The submission of substantial portions of the same academic work, including oral reports, for credit more than once without prior authorization by the instructors involved.

E. *Plagiarism:*

Representing the words or ideas of someone else as one's own in any academic exercise, such as:

1. Submitting as one's own a paper written by another person or by a commercial "ghost writing" service,
2. Exactly reproducing someone else's words without identifying the words with quotation marks or by appropriate indentation, or without properly citing the quotation in a footnote or reference.
3. Paraphrasing or summarizing someone else's work without acknowledging the source with a footnote or reference.
4. Using facts, data, graphs, charts, or other information without acknowledging the source with a footnote or reference. Borrowed facts or information obtained in one's research or reading must be acknowledged unless they are "common knowledge." Clear examples of "common knowledge" include the names of leaders of prominent nations, basic scientific laws, and the meaning of fundamental concepts and principles in a discipline. The specific audience for which a paper is written may determine what can be viewed as "common knowledge:" for example, the facts commonly known by a group of chemists will differ radically from those known by a more general audience. Students should check with their instructors regarding what can be viewed as "common knowledge" within a specific field or assignment, but often the student will have to make the final judgment. When in doubt, footnotes or references should be used.

F. *Complicity in Academic Dishonesty:*

Helping or attempting to commit an academically dishonest act. The academic units may have additional guidelines regarding academic dishonesty. It is the student's responsibility to check with their instructors and academic units to obtain those guidelines.

Section 6.
Discipline Procedures for Academic Dishonesty

Charges of academic dishonesty shall be handled through the appropriate academic unit level procedures.

An academic unit that determines that a student is responsible for academic dishonesty may impose any academic punishment on the student that it sees fit, including suspension or expulsion from the academic unit. A student has no right to appeal the final decision of an academic unit. However, a student who believes that he or she has been treated unfairly, has been discriminated against, or has had his or her rights abridged by the academic unit may file a grievance with the Unit Academic Grievance Committee, pursuant to the provisions of the Student Academic Grievance Procedure; the Unit Academic Grievance Committee may not substitute its judgment on the merits for the judgment of the academic unit.

An academic unit that suspends or expels a student from the academic unit because the student has been found responsible for academic dishonesty may recommend to the University Provost or designee in writing that the student also be suspended or expelled from all other programs and academic units of the University. Within four weeks of receiving such a recommendation, the Provost shall issue a written decision. Neither the student nor the academic unit shall have the right to appeal the Provost's decision.

MMC – Cheating cases are referred to the Student Review Board for Disciplinary action.

NOVA - This was a very recent topic. Student handbook is open to interpretation depending on the case. A course director may choose to take the matter and resolve it internally or take it up to the student progress committee. It all depends on the severity of the case.

UNC – Honor court decides consequences. Not aware of any cheating issues with psychomotor exams.

MUSC – We enforce a professional code of conduct that is outlined in each course syllabus. There is a committee that manages this if it occurs.

VCU – Honor Code Violation. Submit an Academic Integrity Reporting Form through The Office of Student Conduct and Academic Integrity (SCAI) website, and the University determines consequences which can range typically from failing an assignment to failing a course. The School of Dentistry does not determine the consequence.

UF-3: How have they changed the preclinical and clinical curriculum to better prepare students for the INDBE? We might also want to ask how they are calibrating faculty?

ECU – We have not changed the curriculum based on the new INDBE. Several of our CIE's and test questions already have a similar format to what the INDBE will be.

UF – Some small changes are being made in the sequencing of lectures and labs for Operative Dentistry courses. No changes were made in the clinical curriculum.

GA – N/A

UK – Not at this time

UL – Preclinical: use of patient box-type questions on written examinations in Preclinical operative Dentistry 1 and 2 courses.
Preclinical: review rubrics for each class of preparation and restoration.
Clinical: Periodic faculty meetings via questions and iClicker responses; review rubrics.

MMC – We do faculty calibrations via biweekly TEAM meetings by reviewing grading and procedural policies.

NOVA - Our department is not currently working on INDBE but our curriculum committee is preparing some implementations.

UNC – Workshops for faculty to calibrate content and align questions with INDBE.

MUSC – In process of preparation of faculty as we speak

VCU – Faculty have been changing the format of their test/quiz questions to better reflect the INDBE format. Some have also used the "patient box" like the Integrated Board will use. In addition, we are working towards eliminating T/F, all of the above and none of the above distractors in multiple choice examinations. We have also been offered instruction on this topic at multiple Faculty Retreats. Clinical Faculty have also been offered C.E. credit to attend lectures presented by the Basic Science Faculty. Clinical faculty are expected to give feedback to the basic science faculty with dental examples/correlations and then to incorporate relevant biomedical information in their teaching, later in the students' development.

University of North Carolina at Chapel Hill

UNC-1: Should bulkfill composite resin be introduced to the pre-doctoral program? If yes, what technique would be encouraged; a monolithic bulkfill restoration, or a bulkfill composite base veneered by a conventional composite resin.

ECU – Yes. We've been considering adding bulkfill composite techniques but haven't yet made the leap.

UF – We introduced in the preclinical courses, but it has not been introduced to clinic. We have SDR in clinics.

GA – Not at this time

UK – At this point of bulk-fill development, bulk-fill resins are not introduced in the pre-doctoral program.

Dental students only see a limited number of operative patients, and it is recommended that they become comfortable and knowledgeable with the traditional techniques first.
As for restorations, the literature is mixed, but there are concerns regarding the physical properties of some of the bulk fill materials.
Some bulk fills do offer lower polymerization stress but the mixture between different systems (UDMA & BISGMA) suggests some potential problems when used as core materials (Lin et al, J Mech Behav Biomed Mater 2019;98:255-261).
Some of the materials have reported unfavorable volumetric shrinkage (Shibasaki et al, Oper Dent 2017;42:E177-E187.)
Some of the materials have questionable bond strength to root cervical dentin (Franz & Ozcan, J Adhes Sci Tech 2019; 33:1410-1425.)
However, early clinical results at 3 years appear to be favorable for some materials (Loguercio et al; J Dent 2019;85:93-102).
As per using bulk fill for the entire functional restoration, it would be recommended to veneer this with a regular resin composite. (Franz & Ozcan, J Adhes Sci Tech 2019; 33:1410-1425.)
We are currently not introducing these materials.

UL – There is a PowerPoint presentation on bulk fill in the Operative Dentistry 3 course and we also have the students perform a literature review in the course on the bulk fill technique. We do not perform a bulk fill restoration and there are no bulk fill restorative materials in the school.

MMC – Yes

NOVA - The use of bulkfill composites has been postponed for so long. Following the recent administrative changes, the topic will be revisited soon. An internal committee has been formed to discuss such protocols and come up with a decision after a thorough literature search.

UNC – Bulkfill composites are ready for prime time due to the multiple studies now available confirming their properties. If you are waiting for clinical trials, good luck!
The advantages of using bulkfill composites in the developing hands can lead to better outcomes vs the more challenging and technique sensitive layering of conventional composites. Students should be taught techniques that are applicable and repeatable.

MUSC – After teaching the basics, it would be appropriate to share these techniques as listed. But the benefits and limitations should be fully incorporated in the teaching.

VCU – Yes. The latter.

UNC- 2: What is the teaching experience in your school for ceramic partial coverage restorations? Material selection and cementation protocol.

ECU – Students complete a series of pre-clinical exercises (lecture, onlay preparation and resin cementation (Variolink) of a cad-cam milled onlay (IPS Empress Cad) labs.

UF – During Operative III, students learn about ceramic onlays. They have a psychomotor on onlay preparations and they have a digital project within the course. They will design and mill a restoration, which they will use for the cementation lab. We are currently using Emax, Empress and Lava for the indirect restorations and the cement of choice is the Multilink (Ivoclar). For the clinical courses, the students should assist at least 2 times an onlay prep as a requirement and after they have the clinical requirement to deliver a CAD/CAM onlay. For the clinical procedures, we have the following options for the indirect restorations: Emax, Empress and Lava. For cementing, the following materials are available: Multilink (Ivoclar), Variolink (Ivoclar) and Rely X Ultimate (3M). All the cementation protocols follow the manufacture instructions.

GA – This restoration type or category is taught in our Fixed II and Advanced Fixed **courses**

UK – We teach ceramic partial coverage restorations in the second year Restorative Dentistry III Course and we provide a lab session in the accompanying course Preclinical Restorative Dentistry III Course. Material selection is dependent upon parafunctional habits, existing tooth structure remaining, and caries risk. We teach preparation, provisional fabrication and cementation, and final cementation. We use Variolink Esthetic cement to cement these restorations. We follow the manufacturer's recommendations for cementation of these restorations.

UL – Preclinical: Preclinical Operative Dentistry 2 course has an exercise on the Class 2 onlay preparation and it is digitally scanned; no restoration at this time.
The cements for metal inlays and onlays are zinc phosphate, glass ionomer, resin modified glass ionomer and resin cements. Cements for all ceramic and resin inlays/onlays we are supposed to use resin cements (bonding).

MMC – Limited with CEREC

NOVA - e.max CAD and Variolink Esthetic DC or multilink depending on the thickness of the material in the deepest portion

UNC – Ceramic partial coverage restorations are taught in an advanced operative course for 3rd year dental students. New burs are now available to aid the students in a more predictable and simpler way to prepare for these restorations. They are taught on material selection, fabrication of provisional restoration and bonding techniques. Mostly, it is important they understand that now we can be more conservative when restoring missing cusps than crowning everything.

MUSC – We have been teaching this for quite some time, in particular in our Fixed Prosth 3 course. Retaining as much enamel to "bond to" is striven for in the technique.

VCU – Although taught didactically in lecture, clinically taught on a case-by-case basis, but will become a regular part of Curriculum in the future. Veneers, inlays and partial coverage crowns are done in the CAD/CAM Clinic, but on a case-by-case basis – not all students get the experience currently. Ivoclar Etch and Prime is their bonding system and Ivoclar Adhese Univ. System VivaPen. VarioLink Esthetic is used for cementation. For partial coverage, only e-Max is used.

University of Louisville

UL-1: Has your school implemented digital dentistry in the PRE-CLINICAL OPERATIVE Dentistry course? If yes, how?

ECU – Yes. We start in Dental Anatomy (3d scanning and digital wax-up of 2 of their projects they will complete by hand). In Operative they are exposed to cad-cam during their onlay module (prep scan and evaluation); milling, firing, staining demos as well as resin cementation of a milled restoration.

UF – The digital dentistry has been implemented in the pre-clinical Operative III course as a digital project. After learning about ceramic onlay preparations, the students have to scan, design and mill their own onlay. They have to submit the photos from their digital steps that will be evaluated by the course director and graded as an assignment

GA – We are in synch with our D2 Fixed course. D1 Operative converts a large MO Amalgam to an Inlay prep, then they make a digital impression and complete a digital lab prescription. Our Fixed II course completes the RX by milling the restorations and delivering the restoration.

UK – No, we have implemented digital dentistry in the Preclinical Dental Anatomy and Occlusion Courses.

UL – Preclinical Operative Dentistry 2 course has an exercise on the Class 2 onlay preparation and it is digitally scanned; no restoration at this time.

MMC – CEREC lectures and application

NOVA - Yes. D1 course. In the form of scanning and designing exercise using a typodont with a prepared tooth peg.

UNC – Not Yet

MUSC – Yes, this is incorporated in Freshman year, Fixed 1 course. Crown preps scanned and match to a standard and graded.

VCU – Not yet.

UL-2: Does your school teach breaking Interproximal contacts in Class II and III beyond what is necessary for carious hard tissue removal? Which, if any, is to break or to maintain?

ECU – No but in clinics a faculty might advise otherwise

UF – No, we don't

GA – This is controversial in our school, but we tend to sway towards convenience form for the benefit of the provider (finishing and sealing) and pt. (adequate homecare of the margins)

UK – We teach that breaking contact is determined in part by the material selection for the restoration. For Class II Amalgam, all contacts are broken. For Class II Composite, we teach to break the gingival contact, but breaking buccal/lingual contact is determined by caries. For all Class II, we teach to remove unsupported enamel (crab claws). For Class III/IV, we teach to break contact only when dictated by caries removal. However, we teach to remove grossly undermined enamel.

UL – Class 2 – Buccal and lingual: may maintain contact at occlusal aspect if tooth structure is solid; break contact enough to see light passing through the rest of the buccal and lingual. It is very difficult to place a sectional matrix band if the length of the buccal and lingual walls remains in contact with adjacent tooth.
Gingival: always break this contact
Class 3 – Incisal: may maintain contact if tooth structure is solid
Gingival – break this contact
Facial – break contact enough to see light passing through

MMC – We teach breaking contact for Class II amalgam preparations. We teach breaking lingual and gingival contacts for composites.

NOVA - We typically teach only the gingival contact to be broken for the composite. Gingival, buccal an lingual for the amalgam class II.

UNC – Break only when there is further need for extension for caries removal.

MUSC – Ideal amalgam yes, Ideal composite no.

VCU – For Class IIs (amalgam), we teach what is taught in the 7th ed. of the Sturdevant text:
"Convenience form includes extension of the outline form so that (1) the caries lesion may be accessed for removal, (2) the matrix may be placed, and (3) amalgam may be inserted, carved, and finished—all while maintaining resistance form." (Ritter 315)
"The objectives for the extension of the proximal margins are to (1) include all caries lesion, defects, or existing restorative material; (2) create approximately 90-degree cavosurface margins (i.e., butt-joint margins); and (3) establish (ideally) not more than 0.5-mm clearance with the adjacent proximal surface facially, lingually, and gingivally. (Ritter 341)
"Occasionally it is permissible not to extend the outline of the proximal box facially or lingually beyond the proximal contact to conserve the tooth structure". (Ritter 343), provided one is certain the walls are sound without decay, checking radiographs, clinical presentation, etc.

Class III (composites) we also teach the 7th ed. of the Sturdevant text:
"In general, the tooth preparation for a Class III direct composite restoration involves (1) obtaining access to the defect (caries lesion, fracture, noncarious defect), (2) removing faulty structures (carious tissue, defective dentin and enamel, defective restoration, base material), and (3) creating the convenience form for the restoration" (Ritter 239)
"If possible, the outline form should not (1) include the entire proximal contact area, (2) extend onto the facial surface, or (3) extend subgingivally. Extensions should be minimal, including

only the tooth structure that is compromised by the extent of the caries lesion or defect. Some undermined enamel can be left in nonocclusal stress areas, but very friable enamel at the margins should be removed." (Ritter 239)

UL-3: Caries management that conserves reserves pulp vitality:

Does your school advocate selective or partial caries removal in deep lesions?

ECU – Techniques and possibilities are presented in a lecture titled "advanced caries management", clinically it really depends on the covering Faculty but we've notice a small change toward more conservative approaches.

UF – Yes. Our current protocol is to remove up to leathery dentin on pulpal and axial walls to avoid pulp exposure**.**

GA – Yes

UK – Yes

UL – Our school tends to do more selective removal. We do not do partial caries removal in the sense of routinely leaving leathery dentin over the pulp. We may do an indirect pulp cap, leaving leathery dentin but usually, in this case, re-enter at a later time. At this time, the licensing boards do not advocate leaving leathery dentin.

MMC – Calcium hydroxide base application, No.

UNC – Yes. Please find attached a copy of the UNC selective caries removal protocol

MUSC –

NOVA - Not yet as a routine protocol in the predoc clinic due to difficulties in the follow up but we teach it in didactic courses and under the supervision and responsibility of the team leader, the students can do it on a select few cases

VCU – Yes

When should caries excavation stop? When hard or firm dentin is reached, or should leathery dentine be left close to the pulp?

ECU – In deep lesions, when trying to avoid a pulpal exposure then leathery.

UF – Our current protocol is to remove up to leathery dentin on pulpal and axial walls to avoid pulp exposure**.**

GA – Peripheral caries (approx. 2 mm) of clean margin is attained, but leathery dentine is left close to the pulp. We stress that leaving caries is preferable to compromising the pulp.

UK – We teach to stop when within <1mm of the pulp or when affected dentin has been reached. We recommend that the periphery of the cavity should be surrounded by "sound" enamel to achieve the adhesive seal. Peripheral dentin should also be hard. We teach lining with Fuji Liner, followed by the direct restoration. We teach that incomplete caries removal seems advantageous and reduces the risks of pulp exposure.
We teach to avoid the pulp exposure. We recommend sealing of the carious dentin in order to: 1) arrest the caries process, 2) promote deposition of tertiary dentin, 3) Induce mineral gain in the radiolucent zone

UL – The literature and the ADA support leaving leathery dentin. As noted above, we tend to stop at hard dentin or do an indirect pulp cap.

MMC – yes, remove infected dentin, retain and cover affected dentin.

NOVA - We leave infected dentine but can leave affected dentine. Leathery dentine is removed. The reasoning is more from an operational point of view and the fear of leaving the patients neglected rather than scientific.

UNC –

MUSC – yes

VCU – From Sturdevant 7th ed., p. 87:

> "Under normal operative clinical circumstances, in a vital permanent tooth with no symptoms or signs of pulpal pathology, the extent of the dentin caries removal (excavation) is dictated primarily by lesion severity and depth:
> • Moderate lesions (lesions not reaching the inner one third of dentin and with no anticipated risk of pulp exposure) should be excavated to a caries-free DEJ and firm dentin.
> • Advanced (deep) lesions (lesions reaching the inner one third of dentin and with anticipated risk of pulp exposure) should be excavated to a caries-free DEJ and soft dentin, following a selective caries removal (SCR) protocol.
> …The SCR protocol is a professionally recognized and accepted tooth-level caries control treatment, and it can be used on any tooth with an advanced (deep) caries lesion that is deemed restorable, and for which the pulpal and periapical areas are deemed healthy. Selective caries removal consists of complete caries removal peripherally to a sound, caries-free DEJ; axially and pulpally, caries is removed to within approximately 1 mm of the pulp within soft dentin;…"
>
> Some infected/affected dentin remains over the pulp chamber that if removed would expose the pulp and trigger irreversible pulpitis. A layer of protective material which promotes remineralization of the softened dentin is placed over the pulp. The tooth is then definitively restored.

Is there evidence to support partial caries removal?

ECU – Yes, overwhelmingly

UF – yes

GA – Yes,

1. Pedrotti D,Maltz M et al. Clin Oral Investig. **2018** Apr;22(3):1337-1343. doi: 10.1007/s00784-017-2221-0. Epub 2017 Oct 8.
   CONCLUSION: Partial caries removal (PCR) significantly reduced the occurrence of pulp necrosis when compared with stepwise removal (two visit).
   CLINICAL RELEVANCE: This study supports the PCR as a single-visit technique to manage deep caries lesions in permanent teeth.
2. Singh S Caries Res. Effect of Different Liners on Pulpal Outcome after Partial Caries Removal: A Preliminary 12 Months Randomised Controlled Trial. Caries Res **2019**;53(5):547-554. doi: 10.1159/000499131. Epub 2019 May 16.
   CONCLUSION: Partial caries excavation has a high success rate to treat deep carious lesions in permanent teeth after 12 months of follow-up, indicating that the retention of carious dentin does not interfere with pulp vitality or restoration survival. Also, the success of the treatment is independent of the lining material used over the demineralized dentin.
3. Hoefler V et al. J Dent. **2016** Nov; 54:25-32. doi: 10.1016/j.jdent.2016.09.009. Epub 2016 Sep 21. Long-term survival and vitality outcomes of permanent teeth following deep caries treatment with step-wise and partial-caries-removal: A Systematic Review.
   CONCLUSION: Successful vitality and restorative outcomes for both PCR and SWT have been demonstrated at two years and beyond in permanent teeth with deep dentine caries. Partial-caries-removal may result in fewer pulpal complications over a three year period than SWT, although claims of a therapeutic advantage are based on very few, limited-quality studies.
   CLINICAL SIGNIFICANCE: Partial-caries-removal and SWT are deep caries management techniques that reduce pulp exposure risk. Permanent teeth with deep dentine caries treated with either technique have a high likelihood for survival beyond two years.
3. Partial caries removal in deep caries lesions: a 5-year multicenter randomized controlled trial. Complete or ultraconservative removal of decayed tissue in unfilled teeth. Cochrane Collaborative. DNJ Ricketts, EAM Kidd, N Innes, J Clarkson (**2006**)
   Note: an update was published 2019, then withdrawn because of new data. Should be republished soon.
    4. Treatment of Deep Carious Lesions by Complete Excavation or Partial Removal - a Critical Review. Thompson V, JADA 139:705 (**2008**)

UK – Li et al Selective versus non-selective removal for dental caries: a systematic review and meta-analysis. ACTA Odont Scand 2018;76(2):135–140.
Schwendicke F. Contemporary concepts in carious tissue removal: A review. J Esthet Restor Dent. 2017; 29:403–408.

Schwendicke, et al. Cost-effectiveness of One and Two-step Incomplete and Complete Excavations.
J Dent Res 2013; 92(10):880-887.
Maltz et al. Conventional caries removal and sealed caries in permanent teeth: A microbiological evaluation. J Dent 2012; 40:776-782.
Bjørndal et al. REVIEW Management of deep caries and the exposed pulp. Int End J 2019; 52:949-973.
Maltz, et al. Partial caries removal in deep caries lesions: a 5-year multicenter randomized controlled trial. Clin Oral Invest 2018; 22(3):1337-1343

UL – Evidence supports partial (ultraconservative) caries removal in deep lesions. ADA Center for Evidence-based Dentistry, Critical Summary.
Long-term survival and vitality outcomes of permanent teeth following deep caries treatment with step-wise and partial-caries removal: a systematic review. J Dent. 2016; 54:25-32.
Contemporary concepts in carious tissue removal: a review. J Esthet Restor Dent. 2017; 29:403-408.

MMC – Yes

NOVA – Yes, Plenty

UNC – Please find attached a copy of the UNC selective caries removal protocol
MUSC – The literature continues to evolve but the Modified Hall technique is gaining traction and followers (including myself)

VCU – Yes

University of Kentucky

UK-1: Does your school have composite warming units in the preclinical and clinical labs? Is this part of your standard operating procedure when using composite?

ECU – Not yet but some have been ordered

UF – We do not have them in the DMD clinics. Only graduate programs and faculty practice have them**.**

GA – No, we change to Harmonize by Kerr, easy to use

UK – We do not currently

UL – We do not have warming units.

MMC – No. Just saw at the ADA meeting in SF.

NOVA - No but we utilize it in our PG Opertive dentistry clinic and in research.

UNC – No, No

MUSC – Not as of yet, but it is desired.

VCU – No.

UK-2: What exact technique do you teach for the placement of Class II Composite restorations? What term do you use to describe your technique, e.g. oblique, centripetal, or other?

ECU – Incremental (build marginal ridge/contact 1st transforming the class 2 into a class 1 then incremental placement of the occlusal aspect).

UF – We teach to build the marginal ridge first, and then remove the band, and finish the Class I. We encourage to use increment no more than 2mm. They can use SDR to bulk fill the nonstress areas. The term used in the school is incremental technique.

GA – D1. Oblique
D3. Centripetal

UK – We teach Oblique and Centripetal. For Centripetal, we teach building the proximal wall first. Curing this area extra time and then placing increments in an oblique fashion to then complete the remainder of the restoration.

UL – What is taught preclinically and in the Operative Dentistry 3 course (centripetal or building up individual cusps) is probably not what the majority of students appear to do clinically (horizontal layers and cut in a majority of the anatomy).
- place Garrison matrix and ring
- build up the proximal box incrementally
- before curing the final layer of the box, create the occlusal embrasure with an interproximal carver
- place and cure individual cusps (triangular ridges)

MMC – Layered application

NOVA - Oblique technique is the most common.

UNC – Incremental/oblique

MUSC – Incremental placement at this time.

VCU – Currently we teach using a small amount of flowable in the bottom of the box only, followed by Nanofill, and then cure that first layer and cure the first layer of Nanofill on the pulpal floor. Build up the rest of the composite (Nanofill) with the Incremental curing technique, layer by later. Cure from the buccal and then occlusal, then lingual and then occlusal, (if using a

sectional matrix). If using a full-coverage band, would cure from the occlusal by layers, and then from the buccal/lingual once the band is removed.

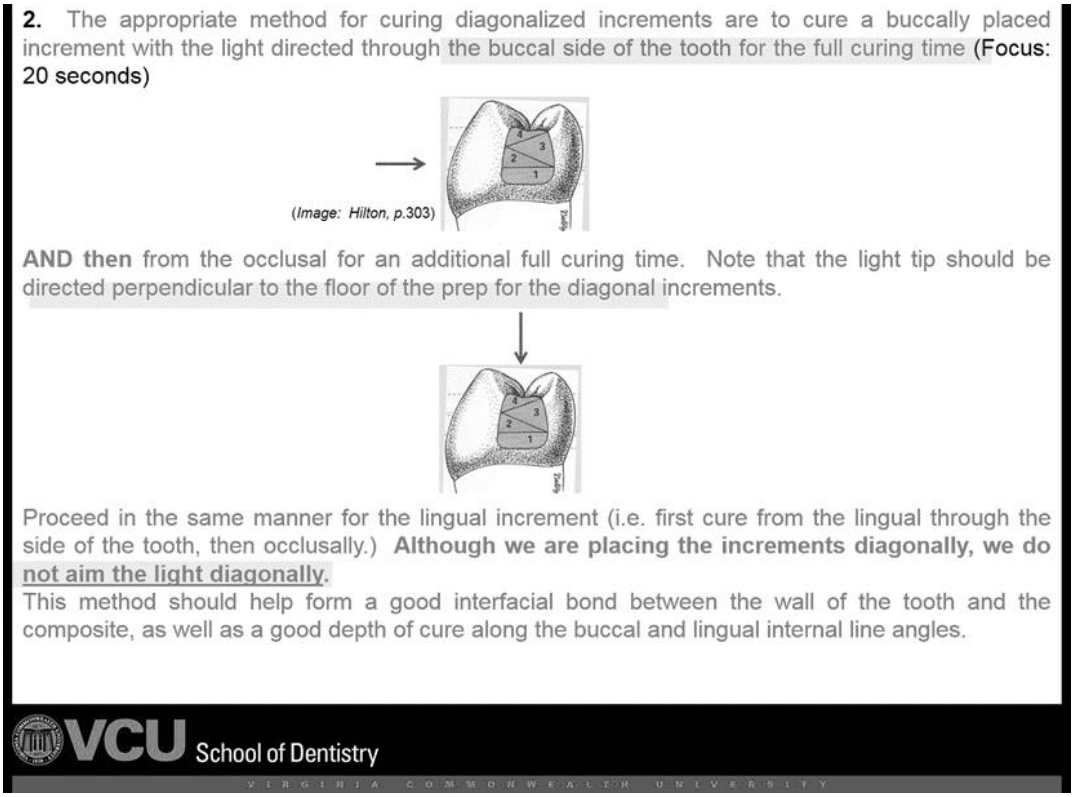
Incremental curing technique

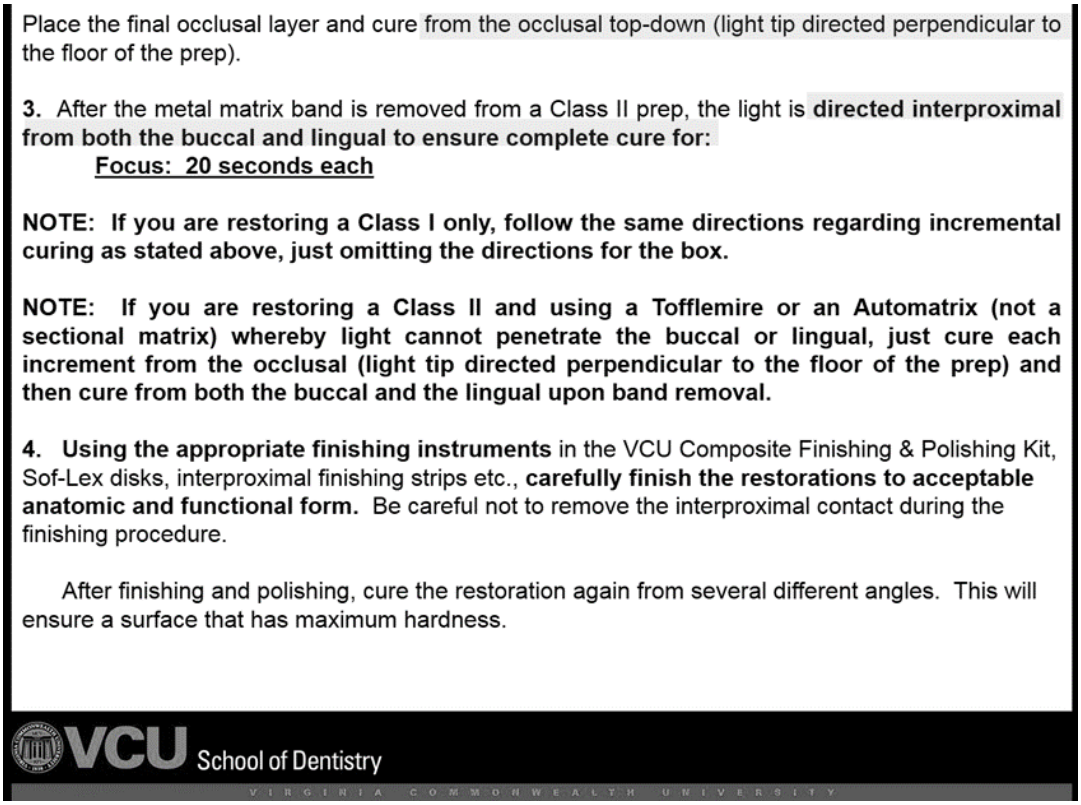
1 a. Place a thin layer <1mm of uncured flowable in the bottom of the box. Take a clean explorer or perio probe and run tip through the material, making sure it has flowed into all of the corners of the box, eliminating any air bubbles. Do NOT fill the box even close to the contact area with flowable! Do NOT cure! NOW place the 1st increment of Nanofill composite into the box and press into place using the small end of the condenser. Doing this helps to further push the flowable into all of the areas of the bottom of the box, providing for a restoration that is well-adapted to the margins, preventing or reducing microleakage. If necessary, dip the end of the condenser into a *very small* amount of adhesive to keep the instrument from sticking to the composite. AND…

b. Place a thin layer <1mm of Nanofill (NOT flowable) on the bottom of the pulpal floor and condense AND…

c. Cure the box and pulpal floors for the appropriate amount of time depending on the light source:
IQ2: 40 seconds with the light directed perpendicular to the floor of box and prep
Focus: 20 seconds with the light directed perpendicular to the floor of box and prep
Overlap with a second cure if the length of the prep is greater than 7mm mesial-distal.

d. Continue to add diagonal incremental layers of Nanofill composite <2mm thick (buccal-lingual increments diagonalized apically-occlusally) to both the box and pulpal floors and shape to anatomical form and smoothness with appropriate instruments. Each increment should be cured in the following manner:





UK-3: Which division in your institution is responsible for teaching crown courses? Does your school separate Restorative/Operative from Prosthodontics? Gold inlays/onlays are presented: Didactic only? Didactic and preclinical lab session?

ECU – The division Prosthodontics, yes we separate, They are not presented but we eventually do a few in clinics.

UF – The division of Prosthodontic is responsible for teaching single crowns. The division of Operative is responsible for teaching gold and ceramic onlays. In clinic both divisions can cover any procedure.

GA – Indirect restorations: Fixed Prosthodontics
Direct restoration and ceramic inlays (only lab): Operative

UK – The Restorative Division at our school teaches the crown courses. We do separate Restorative from Pros. Gold inlays/onlays are presented in didactic format only.

UL – Department of Rehabilitative & Reconstructive Dentistry
Yes, theoretically. The ceramic only is being taught in Preclinical Operative Dentistry 2. There are two prosthodontic preclinical courses for crowns and FPD's. Didactic only

MMC – Fixed although CEREC is taught in Operative. No. Didactic only

NOVA - These all fall under prosth. Gold inlays in didactic but as a lab exercise, we only teach the prep of it. There are few clinical cases of gold onlays that we still do.

UNC –
Prosthodontics
Yes
Didactic Only

MUSC – This is in our Restorative Division. Presented in Didactic and preclinical lab both in Fixed and Operative.

VCU – Currently the Prosthodontic Faculty in the Prosth. division of the combined GP/Prosth. Department. Beginning with the 2020-2021 Academic Year, Pre-Clinical Operative and Fixed are planned to be combined in a series of courses: Restorative I, II and III. Didactic only

UK-4: Are full-time faculty members at your institution given the opportunity to see patients outside of your institution? Are alternatives to a five-day work week available, e.g. four days with benefits? Is there a faculty practice within your institution where full-time faculty members are required to practice?

ECU – Not for full time faculty. Yes, there are alternatives, yes but not all faculty are required to see patients.

UF – No. If you were a faculty member and is facing retirement and reduce to no less than .6, you can still receive benefits.

Yes, new hires are required to practice in faculty practice and generate part of their salaries.

GA – No
In the DCG, you need to have a 75% FTE contract to have benefits
Yes, it is the only option if they choose to practice

UK – We have a faculty practice clinic. Full time faculty (5 days per week) are encourages/expected to practice in the faculty practice one day per week. No benefits are provided if you are not full time (4.5 plus days per week or more).

UL – Depends on how long they have been a faculty member. Many years ago, faculty could practice extramurally and still can if there are any of the old-timers here. Now there is a faculty practice building for faculty wishing to practice; extramural is not an option for more recent hires.
Yes. There is a 4+1 (4 days in the School and one day practice) or a 4-day faculty member. Also, there are part-time positions.
Yes (see UK-4)

MMC – Yes, yes, no

NOVA - Our four-day faculty members have benefits and can see patients outside on their off day. However, we do not offer a four-day position anymore to the new ones we will hire. We have a faculty practice clinic but only five-day faculty members are allowed to see patients there. Our five-day faculty members can choose to see patients outside in the evenings and over the weekends but if they are doing, that they cannot see patients in faculty practice.

UNC –
No, No, Yes

MUSC – Not that I am aware of. A faculty member at 60% of their time received benefits. We are not required, but may practice there if they wish

VCU – Yes. Yes, under specific circumstances. Encouraged but not required.

Virginia Commonwealth University

VCU-1: Do you have pre-clinical practical exams on composite preparations? If so, what are your rubrics?

ECU – We don't have exams, but we do have lesion driven simulated preps as formative exercises.

UF – We don't have pre-clinical psychomotors on composite preparations. All the preparation psychomotors are designed for didactic preps or amalgam preps.

GA – Yes, all our practical exams come with a rubric

UK – No

UL – Yes. There are resin composite Class 2 practical exams (prep and restoration) in the D1 Preclinical Operative Dentistry 1 course. We also have clinical competency exams on the resin composite Class 2. Performance Criteria are attached.

MMC – Yes, copy rubric

NOVA - If so, what are your rubrics? Yes we do, now we do Satisfactory, Needs improvement and unsatisfactory due to a recent change in the university's grading policy.

UNC – Yes

MUSC – Yes, Depends on the preparation. We have rubrics for Class I, II, III, IV and V.

VCU – While we currently have practical exams on both amalgam and composite restorations in Pre-clinical Operative, we only have preparation practicals on amalgam, not composite. However, in the D2 Clinical Skills course, (combination pre-clinical and clinical), there is an exam on a composite preparation on a typodont tooth. **(See attached document below)**

Criteria	EXCELLENT / IDEAL [5]	COMPETENT/SATISFACTORY (S) [YES/3-4]	UNACCEPTABLE (U) [2-1]
Rubber Dam Isolation	Proper isolation w/ Rubber Dam (RD) only.	Minor errors on RD placement, but the field of isolation is acceptable.	Poor isolation, Missing Floss on the retainer.
Outline	Outline smooth follows occlusal anatomy. Isthmus width 1.0 -1.25mm (smallest condenser head fits comfortably).	Outline slight deviation from anatomy. Isthmus width slightly < 1mm or approaches 2.0 mm.	Outline gross over/ under-extended.
Proximal & Gingival Extension	Proximal and gingival extensions are visually open (0.5mm) all the way around- tip of explorer passes.	Proximal and/or gingival extensions are slightly to moderately over/ under extended. Contact is broken.	Proximal walls and/or gingival extensions are severely overextended or still in contact.
Pits & Fissures Extension	Proper pit and fissure extension to include the proximal pit and primary/ secondary grooves.	Minor deviation in extension but not resulting in critical error	Critically over-extended or under-extended resulting in compromising health of tooth structure
Pulpal Depth	Pulpal floor 1.5 -2.0 mm and uniform. Gingival floor width m-d is approx. 1.25 -1.4 mm.	Pulpal floor is slightly shallow to moderately deep. Gingival floor width is slightly narrow to moderately deep m-d.	Pulpal floor is critically shallow (could lead to restoration failure)/ deep (likely expose pulp). Gingival floor is critically narrow/ deep m-d.
Axial Wall Form/Pulpal Line Angle	Rounded line angles resulting in optimum clinical outcome. Axiopulpal line angle gently rounded.	Minor deviation in axial/pulpal line angle. Axial wall straight or slightly concave. Internal form is generally smooth.	Major deviation in axial/pulpal line angle. Axial wall grossly concave. Internal form is rough/ sharp angles.
Cavosurface Angle	Cavosurface angles are straight to the external surface.	Minor errors in cavosurface angles, however, do not compromise integrity of tooth/restoration.	Major deviation resulting in compromises of the restoration or in undermining the tooth structure
Health of Tooth/Tissue		No damage to the teeth or soft tissue.	Major damage to the tooth or teeth. Likely requires restoration or result in abrasion of the soft-tissue.

VCU-2: What are you teaching regarding bonded amalgam and pin-retained restorations?

ECU – We have a lecture on Complex Amalgam that covers pins and amalgambond. 2 Labs in Operative allow students to practice both materials/techniques. There's more repetition (2) during a separate clinical simulation course.

UF – We teach both techniques as an informational item. We do not support either of them.

GA – We do not teach bonded amalgam, only pin-retained, or slot-retained restorations

UK – We do not teach bonding amalgam. We teach rationale and technique regarding pin retained restorations. We have students perform one preclinical lab exercise placing pins in dentoform teeth. Pins are seldom used in clinical dentistry.

UL – We used to teach bonded amalgam in the D1 Preclinical Operative course for sealing the tubules, not for retention of the amalgam. This was discontinued several years ago based on the literature. Pin-retained restorations are taught in the Perclinical Operative Dentistry 2 course and used clinically if needed

PERFORMANCE CRITERIA

PREPARATION: OUTLINE FORM/FINISH (Class 1 & 2)

POINTS	PERFORMANCE CRITERIA
3	− Ideal outline − Preparation is centered in major grooves − B & L walls and gingival floor of box just break contact with adjacent tooth (Tip of explorer passes between the teeth) − Occlusal width: 1 – 1.25mm (Approximate width of small hatchet or small condenser) − Reverse curve present, if indicated − Width of marginal ridge ≈1.5mm − Enamel walls meet external tooth surface (cavosurface angle) at 90° angle for amalgam − Enamel walls *may* meet external tooth surface at >90° angle for resin composite − Adjacent tooth undamaged
2	− Some sharp angles in outline − Occlusal width: >1.25mm but <2mm − Width of marginal ridge <1.25mm − One of the proximal contacts is not broken − B & L walls and gingival floor of box break contact with adjacent tooth more than explorer tip but less than perio probe width − Reverse curve started too soon/too late − Some rough margins − Slight damage to adjacent tooth correctable by enameloplasty
0	− Cavity ill-defined − Width of marginal ridge <1.0mm − Occlusal width: <1mm or >2mm − Perio probe passes between the teeth − Proximal wall(s) flared − Major chips or roughness of margins

Critical Error	− Width of marginal ridge ≤.75mm − Occlusal width: >2/3 of triangular ridge removed − No clearance with adjacent teeth − Excessive undermined tooth structure − Extensive damage to adjacent tooth (requires restoration)

Critical Error or Critically Deficient: The treatment is of unacceptable quality, demonstrating critical areas of lack of competence in clinical judgment, knowledge, or skill of the mechanical and physiological principles of operative dentistry. Clinically, the tooth must be temporized or the treatment plan must be altered and additional care provided in order to sustain the function of the tooth and the patient's oral health and well-being.

PERFORMANCE CRITERIA

PREPARATION: RETENTION/ INTERNAL FORM (Class 1 & 2)

POINTS	**PERFORMANCE CRITERIA**
3	− Retention catches explorer − Both B & L walls converge toward occlusal
2	− One wall (B or L) slightly divergent − One wall (B or L) slightly undercut − Minimal retention grooves
0	− Cavity is ill-defined − Both walls slightly divergent − Retention undermines tooth structure − Retention placed into axial wall only − Walls or floors have major roughness, uneven
Critical error	− B and L walls are grossly divergent or undermine tooth structure

3 = Exceptional ⇨ Satisfies all criteria
2 = Acceptable ⇨ Could be improved with minor changes
0 = Weak ⇨ Unsatisfactory and/or not correctable within tolerable limits

PERFORMANCE CRITERIA

RESISTANCE FORM/DEPTHS (Class 1 & 2)

POINTS	**PERFORMANCE CRITERIA**
3	− Pulpal floor depth: 1.5 – 2.0mm − Axial wall depth: 1.25 – 1.5mm measured at the gingival floor (able to insert large hatchet into box) − Axio-pulpal line angle is rounded − All internal line angles rounded − Gingival floor depth: breaks contact with adjacent tooth or minimum of 3mm deep

2	− Pulpal floor depth: slightly deep (>2mm but <2.5mm) or slightly shallow (<1.5mm) − Axial wall depth: slightly deep (>1.5mm but <2mm) or slightly shallow (≈1mm) − Concave axial wall − Line angles are sharp
0	− Pulpal floor depth: deep (>2.5mm but <3mm) or shallow (≈1mm) − Axial wall depth: deep (>1.75mm but <2.25mm) or shallow (<1mm) − Gingival floor depth: >4.5mm or <3mm deep − Sharp axio-pulpal line angle
Critical error	− Pulpal floor depth: >3.0mm or <1mm − Axial wall depth: >2.25mm or <.5mm − Probable exposure − Gingival floor depth: >5mm or <2.5mm

3 = Exceptional ⇨ Satisfies all criteria

2 = Acceptable ⇨ Could be improved with minor changes

0 = Weak ⇨ Unsatisfactory and/or not correctable within tolerable limits

PERFORMANCE CRITERIA

RESTORATION: OCCLUSAL ANATOMY (Class 1 & 2)

POINTS	PERFORMANCE CRITERIA
3	− Reflects natural anatomy − Major grooves present and centered − Fossa at original depth − Marginal ridge matches height of adjacent tooth − Occlusal contacts are same intensity as on surrounding teeth
2	− Marginal ridge slightly low or high or flat − Triangular ridges slightly flat or overcontoured − Fossa: slightly shallow or deep
0	− Triangular ridges overcarved − Groove displaced − No groove − Marginal ridge >.5mm lower than adjacent ridge − Occlusal contacts are inconsistent with surrounding teeth and require adjustment
Critical error	− Heavy (hyperocclusion) contacts so that restoration is only point of occlusion in the quadrant − No anatomy − Marginal ridge or other features decidedly high (only area in contact)

3 = Exceptional ⇨ Satisfies all criteria

2 = Acceptable ⇨ Could be improved with minor changes

0 = Weak ⇨ Unsatisfactory and/or not correctable within tolerable limits

PERFORMANCE CRITERIA

RESTORATION: CONTOURS AND INTERPROXIMAL CONTACT (Class 1 & 2)

POINTS	PERFORMANCE CRITERIA
3	− Embrasures reproduced and consistent with normal contours − Proximal contact re-established and correct width & height
2	− Minimal proximal contact − Embrasures somewhat closed (restoration overcontoured) but correctable − Embrasures somewhat open
0	− Embrasures cannot be adjusted properly − Contact significantly heavy but floss passes through − Lacks embrasure
Critical error	− Contact visually open − Contact prevents passage of floss or shreds floss − Contours would affect gingival health

3 = Exceptional ⇨ Satisfies all criteria

2 = Acceptable ⇨ Could be improved with minor changes

0 = Weak ⇨ Unsatisfactory and/or not correctable within tolerable limits

PERFORMANCE CRITERIA

RESTORATION: SURFACE FINISH AND MARGINAL ADAPTATION (Class 1 & 2)

RATING	PERFORMANCE CRITERIA
3	− Smooth surface, free of scratches − Imperceptible transition from tooth to restoration − No excess beyond preparation margin − No contamination of resin (no stains, discoloration, or inclusions)
2	− Slight roughness but could be easily corrected − Areas of perceptible transition − Too burnished (shiny) – amalgam − Not burnished enough – amalgam − Not polished adequately – resin composite − Minor contamination of resin not affecting durability or esthetics
0	− Margins decidedly thick − Surface deeply pitted, scratched − Contamination of resin requiring correction
Critical error	− Void, porosity − Not cured – resin composite − Submarginal areas – not correctable − Flash or overhang – not correctable − Open margin − Excessive contamination of resin requiring replacement of restoration

3 = Exceptional ⇨ Satisfies all criteria

2 = Acceptable ⇨ Could be improved with minor changes

0 = Weak ⇨ Unsatisfactory and/or not correctable within tolerable limits

UL – We teach them both.

MMC –

NOVA - We teach both didactically but do not have a preclinical exercise anymore. We used to up until 4-5 years ago. In the clinic we still keep pins and amalgam bonding in the inventory because we have one or two faculty members who still like to do that but soon there will be a set policy to limit procedures that are outliers.

UNC – Bonded amalgam is a myth! We teach pin retained restorations in preclinical lab

MUSC – We teach pins but not bonded amalgam.

VCU – We have taught bonded amalgam in the D1 Pre-Clinical Operative course, but it does not seem to be utilized much in Clinic. We still teach pin-retained restorations, on a select basis.

End of Regional Agenda Responses

National CODE Questions

2019 National CODE Agenda

I. Curriculum:

a. How is your curriculum changing in preparation for the new Integrated National Board Dental Examination (INBDE)? *(It starts in August 2020)*

b. How many attempts do students get to "remediate" an exam, a clinical procedure, and a course?
Define remediation (not all concepts include re-testing or the chance to improve a grade)
Does remediation apply to didactic-only courses, pre-clinical courses and clinical courses?

c. Within the preclinical laboratory courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? If you have more than one pre-doctoral program with separate patient pools and screening processes, please list them- e.g. Sophomore Block, Discipline-based Care (traditional clinic), Comprehensive Care (general dentistry clinic), Pre-doc Pediatric Dentistry and Orthodontics, Internationally-trained Dentist programs, etc.
    i. If not, what do you contribute your success to?
    ii. If so, please describe the issues

e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed to progress and graduate without sharing patients among students?

i. What types of experiences are the most difficult to find in your patient pool? Describe experiences by discipline/procedure (Removable, Fixed, Endo) and/or by competency exam (Class II, Crown, Extractions).

g. Describe your screening/patient admissions process? *If there is more than one type- e.g. for Pre-doc, Residents, Pedo, Ortho, etc. please list & describe all appropriate.*

h. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?
    i. If so, please describe?

i. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? *If applicable, describe the type of mid-level providers relevant to your state- e.g. Expanded Function DA. Expanded Dental Hygienists, Dental Aide Therapists, Community Dental Health Coordinators*
    i. If your state **has** MLP's, who is responsible for the education? Please describe?

ii. Do the students, faculty, and local dental community embrace the concept?
iii. Would your institution be willing to provide this instruction?

II. Cariology:

a. What terminology does your school use to define and categorize dental caries?

b. How does your school calibrate its faculty for caries diagnosis?

c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

III. Materials and Techniques:

a. What does your school teach in terms of cusp replacement in composite resin?

b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…
   i. Class V composite resin?
   ii. Sandwich (GIC/composite) technique? Open &/or Closed Sandwich?
   iii. Bulk fill composite restoration technique?
   iv. Resin Modified Glass Ionomers (RMGI)?
   v. Amalgam?
      1. *Specify amalgam use at your school as a* % of *all* direct restorations?
      2. *Are the amalgams placed at your school mostly/always* bonded or unbonded?
   vi. *Pre-doctoral student use of* Air abrasion? Yes, No, Indications?

c. Are you doing more milled partial coverage restorations as a result of the scanning and milling capability? (e.g., inlays and onlays)
   i. Has it replaced gold in your clinic?

d. Who performs molar endo? *(identify appropriate provider categories and % of all molar endo procedures performed by each)*
   i. Pre-doc students %, Endo Residents %, Endo Faculty %

e. Do you utilize bond strength testing exercises? *Specify- for Research, Teaching Dental Biomaterials, and/or testing new adhesives prior to introduction to clinic?*
   i. Who supervises?

f. Do you use electric handpieces in the simulation laboratory? In the clinic? In addition to or in place of air-driven handpieces?
   i. If no, why not?
   ii. If Yes, what system?

IV. Student Assessment:

a. Does your institution have an international dental program?
   i. If yes, does your school utilize a bench test (for program admissions decisions)? Please describe.
   ii. If yes, how many students are enrolled?

b. Do you evaluate *pre-doctoral* students using OSCE's? *What courses, what levels/years (e.g. D-1, D-2), in place of other more traditional exams, and how long have you used them?*

c. Describe your primary *(most frequently used)* didactic testing methodology
   i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)
   ii. Pros/cons to the one you are primarily using?
   iii. Are you investigating other methods?
      1. If yes, which one(s)?

V. <u>Administration:</u>

a. What is your policy on pre-doctoral student attendance? Describe any differences between didactic-only, pre-clinical laboratory, and clinical courses.
   i. Please provide the actual attendance policy statement. ii. Who is responsible for tracking attendance?
   iii. How effective is your policy?

b. What is your policy for managing student complaints about grades?

c. What is your policy on student absences?

d. Regional licensure exam
   i. What exam(s) does your school host?
   ii. What's the general consensus towards *regarding* the benefits of the exam? *Since the obvious "benefit" is it's required for licensure, offer some "benefit" examples- is it sufficiently discriminating regarding student abilities, or does it test relevant procedures, or is it really accomplishing the goal of protecting the public from incompetent practitioners?*
   iii. What's the general <u>consensus</u> on the elimination of the exam? By Faculty, By Students?
   iv. What are the alternatives?

e. Discuss opinions on realigning the CODE regions.
   i. Are there schools you feel should be in your region that are not?

f. Discuss and describe suggestions for improving CODE.

2019 National Agenda

I. Curriculum:

a. How is your curriculum changing in preparation for the new Integrated National Board Dental Examination (INBDE)? (It starts in August 2020)

ECU – We have not specifically changed the Operative curriculum based on the new INDBE. Several of our CIE's and test questions already have a similar format to what the INDBE will be

UF – The curriculum committee has put together a workgroup to discuss the changes and approaches that we would be taking. We have already implemented mandatory box questions in every exam and discipline.

GA – Recently, we implemented a comprehensive oral exam in the sophomore year. Additionally, in D1 and D2 preclinical dental courses we introduced scenario-based practicals where singular facts must be assessed and combined to successfully reach the desired outcome

UK – We are conducting a gap analysis to determine areas that need to be addressed with the upcoming changes to the board exam.

UL – Patient boxes are used in Preclinical Operative Dentistry 1 written exams.
Note: We are changing Preclinical Operative 1 to a one semester course (D1 spring semester) to include Class I, II, and V. Preclinical Operative 2 will be a D2 course to include Class III, IV, auxiliary retention, and esthetic dentistry (diastema closure, veneer, ceramic only prep, diagnostic wax-up).

MMC – All course directors are being encouraged to create questions utilizing INDBE concepts.
We are updating competencies to be integrated with biomedical and clinical sciences.
We are implementing Uniform Syllabus Template Software to map curriculum.
We are updating our Biomedical Integration Course.
We are promoting Clinical Faculty to teach lectures in Basic Science courses and vice versa.

UNC – We are developing a new curriculum that will be rolled out in Summer of 2020. In regard to INDBE, workshops will be set up to help faculty understand how the content will be tested and to help make necessary changes to their course and exams.

MUSC – So far, it isn't.

VCU – Faculty have been changing the format of their test/quiz questions to better reflect the INDBE format. We have also used the "patient box" like the Integrated Board will use. In addition, we are working towards eliminating T/F, all of the above and none of the above distractors in multiple choice examinations. We have also been offered instruction on this topic at multiple Faculty Retreats. Clinical Faculty have also been offered C.E. credit to attend lectures presented by the Basic Science Faculty. Clinical faculty are expected to give feedback to the basic science faculty with dental examples/correlations and then to incorporate relevant biomedical information in their teaching, later in students' development.

I. b. How many attempts do students get to "remediate" an exam, clinical procedure & course? Define remediation (not all concepts include re-testing or the chance to improve a grade) Does remediation apply to didactic-only courses, pre-clinical courses and clinical courses?

ECU – Written Exam – After 2 attempts, recommendations to the Student Progress Committee are made to consider alternative actions including repeating a year or dismissal.
Pre-clinical courses – 4 attempts with academic probation, holds, temporary Dp and only get 40 % of the maximum passing points subject to SPC.
Clinical procedure – after 3 attempts, DP and likely dismissal or repeat the year.

UF – Just one time.
Remediate the course means that the student should challenge the failed exams and re-take them.
Apply to all the courses

GA – Freshmen year: (Practical remediation is performed to bring the student up to the floor of clinical acceptability. This occurs agnostic of course lab score. A cumulative failing (<75%) practical score will lead to course failure and the potential to repeat the year. Determination of repeating is reviewed/finalized by committee under the Asst. Dean for Academics. Dr. Jeter)
Sophomore year: twice
Hands-on skill review and practice. Practice will include one on one work and potentially retesting. Retesting does not alter the original score but is an evaluation that the remediation was successful. (D1 year)
Re-testing with no chance to improve grade (sophomore year)
All of the above

UK – Remediaton at UK includes improving performance due to a failed exam, it is not utilized to improve a grade. Remediation applies to didactic, pre-clinical, and clinical courses.
In the Operative Course (Restorative Dentistry I), failure of a Practical Exam requires a remediation project followed by retaking the Practical. The failing grade and the retake are then averaged. Failure of 3 or more Practical Exams results in failure of the course.
For clinical courses, remediation and skills assessment re-takes are determined by the course director

UL – One attempt within the laboratory course for Preclinical Operative Dentistry 1.
- Clinical Operative, student has to complete a remediation process based on the nature of failure prior to re attempting an exam or a competency. In clinical operative student is allowed a maximum of 2 attempts to replace a failing one
For Preclinical Operative Dentistry 1, remediation is repeating the procedure within the course to attempt an acceptable outcome. It does not affect the grade. If remediation is not successful within the course, the situation is referred to the academic performance committee.
-The remediation in clinical operative is a step that follows a failing attempt by students. An outlined remediation plan is defined and designed around the nature of failure. Student will follow the steps identified by the course director that focuses on the missing skill. This

Process allows students the time to practice the area of weakness to reach competence prior to re attempting a competency examination.
-Students are allowed to re attempt the competency twice until passing. Failing to do so will result in a referral to the Academic Progress and Performance Committee.
For Preclinical Operative Dentistry 1, remediation applies to the lab portion; we do not remediate the lecture portion within the course. If the lecture portion is failed, the situation is referred to the academic performance committee.

MMC – 1 attempt. Remediation is to begin as soon as a faculty course director identifies a student who is struggling to meet course objectives or skill sets and must be implemented before the course ends. It applies to all courses.

UNC – A decision to allow the student to remediate needs to be approved by the Academic Performance Committee (APC). The remediation guidelines are usually customized to the student's needs and circumstance by the APC and implemented by the course director. Applies to all

MUSC – One

VCU – This varies by Instructor and Course. For Pre-Clinical Operative Dentistry Laboratory, one Practical Exam is allowed to be re-taken at the end of the of the year to replace any previous exam. The highest grade is taken (in case the student should end up scoring lower on the re-take). The Re-Take is every student's chance to replace one grade. For students who are struggling in the laboratory course, tutoring is offered outside of class time. For Pre-Clinical Operative Dentistry Lecture, Remediation with a tutor is also offered to struggling students with the goal of improvement on the subsequent Exam(s). However, no re-takes are offered for the lecture course. This form of Remediation during the pre-clinical operative dentistry courses do not include re-testing.
In the school, any student that does not pass a course must remediate that course in some format. This can vary by format and circumstance (i.e. repeating all or part of a year, remediating portions of a course or all of a course, etc.) This is determined on a case by case basis by the APC.

I. c. Within the preclinical laboratory courses, do the faculty rotate among the students during the course (e.g. weekly, by project)?

ECU – Yes Faculty rotate every lab session and by project.

UF – In Operative we rotate every week to a new group of students. Our ratio is 1:8-10

GA – Yes, weekly

UK – Yes, the faculty rotate. Each course director determines the specifics of the rotation schedule. Rotation typically occurs every 2-3 weeks.

UL – Dental Anatomy and Preclinical Operative Dentistry 1 – faculty rotate by project.

MMC – We do not assign faculty to students**.** All faculty assigned to pre-clinical courses will work with all students in the class which is usually broken up into two groups to accommodate our limited SIM lab space.

UNC – Yes, rotation on a weekly basis.

MUSC – No, or at least very little. We have only four faculty for 75 students and very often only three faculty.

VCU – Yes. For Operative, the faculty are rotated by session, as we meet multiple times per week. For some other Pre-clinical courses that do not meet as frequently as Operative, faculty are rotated by Project.

I. d. Are you having difficulty attracting patients to any of your pre-doctoral teaching programs? If you have more than one pre-doctoral program with separate patient pools and screening processes, please list them- e.g. Sophomore Block, Discipline-based Care (traditional clinic), Comprehensive Care (general dentistry clinic), Pre-doc Pediatric Dentistry and Orthodontics, Internationally-trained Dentist programs, etc.

d i. If not, what do you contribute your success to?

ECU – Lots of need in our underserved areas.

UF – We have a good pool of patients, but the requirement quality or educational values is low. We have three different pools (DMD predoctoral program, Post-doctoral program and faculty practice) each of them have their own screening process.

GA – We have difficulties, because we have almost 100 students per class and Augusta is small city. We only have one patient screening program/process

UK – No, our pre-doctoral program does not have difficulty attracting patients. Currently our screening time is booked out 8+ weeks.
UK is the largest Medicaid provider of dental services in our area, however this only accounted for 11% of the pre-doctoral clinic patient base. A majority of our patients are uninsured patients that have little access to affordable care. Geographically, our location services a considerable portion of central and eastern Kentucky, as well as Tennessee and West Virginia.

UL – N/A

MMC – Yes. We are competing locally with other post-graduate schools in the area and free and low-cost dental operations (eg. Interfaith Dental Clinic)

UNC –

MUSC – Yes

Our patient screening system is broken and has been for years. We have a tendency to admit patients that are too complicated for undergraduate students. We do no advertising. Our "high-ish" fees do not encourage "typical" dental patients to sacrifice the time involved in undergraduate dental education

VCU – Patients are brought into the school by many methods. Board Screening brings in over 100 per year.

d ii. If so, please describe the issues

ECU –

UF –

GA –

UK –

UL –

MMC –
UNC – Yes. The difficulty is in recruiting patients and assigning the right cases based on student's level of progression within the curriculum.

MUSC –

VCU –

I. e. Do you have enough patients to supply each pre-doctoral student with the essential experiences needed to progress and graduate without sharing patients among students?

ECU – yes

UF – We have limited patients due to the school location. We have not made a good ad campaign to promote the school.

GA – No

UK – We strive to maintain continuity of care wherever possible. In most situations, we can do this without extensive "sharing" of our patients.

UL – Sharing occurs for Operative Dentistry Competency Examinations indications. Questionable without sharing. D3/D4 integration seems to help.

MMC – Yes but see d.

UNC – yes

MUSC – No

VCU – Yes

I. e. i. What types of experiences are the most difficult to find in your patient pool? Describe experiences by discipline/procedure (Removable, Fixed, Endo) and/or by competency exam (Class II, Crown, Extractions).

ECU – Endo and Board Lesions

UF – Endodontics. Our pool of patients are financially compromised.

GA – No
All removeable Pros.

UK – Most of the "sharing" for our patients comes from competency needs, particularly finding the appropriate patient for SRP quadrants for competencies. Endo is a similar situation, but there were adjustments made to the clinical requirements this year for this course. We have previously not had trouble with removable pros, but keeping patients throughout the long process of fabrication often leads to the need to transfer patient care should a student have a patient fall through before graduation. RPD's are hard to supply for every student, but we still have relatively high success with exposing the student to removable partial dentures

UL – Class III Operative procedures
- RPD

MMC – Describe experiences by discipline/procedure (Removable, Fixed, Endo) and/or by competency exam (Class II, Crown, Extractions). Complete dentures, Non-restored anterior restorations. Endodontics that patients are willing to pay for.

UNC – Removeable Pros

MUSC – Endo, fixed bridges

VCU – Pedo, Endo, Complete dentures

I. f. Describe your screening/patient admissions process? If there is more than one type- e.g. for Pre-doc, Residents, Pedo, Ortho, etc. please list & describe all appropriate.

ECU – If you need a regular family dentist and are considering the ECU School of Dental Medicine as a care provider, the first thing you'll need to do is make an appointment in our

Screening Clinic by calling **252-737-7834 between the hours of 8:00 a.m. and 5:00 p.m. Monday through Friday**.

Because we are a teaching program, we will spend more time with you for each visit, and we may ask you to make a few extra visits to complete your dental care. We think you will enjoy our compassionate care, affordable fees, and friendly environment.

Screening Clinic

The purpose of the screening appointment is to gather information about your overall health, dental treatment needs, and to determine if treatment in our student clinics is right for you. We regret that all patients screened cannot be accepted for dental care in our student clinics. We will offer alternative treatment options if that is the case. Screening is not a treatment planning appointment, and no treatment other than a limited examination/diagnosis will be performed at the screening appointment.

Fees and Payment

There is no charge for the initial screening appointment except for fees incurred for dental x-rays. Patients will be charged for dental x-rays and treatment during future visits.

The cost of dental care in student and resident clinics is less than at most private dental offices. Medicaid and most private dental insurance plans are accepted. We accept cash, credit cards, and personal checks. As a patient, you will receive detailed information concerning our financial policies.

UF – Potential patients call and/or fill out paperwork from our website, which is mailed in to initiate their desire to be part of the Pre-doctoral dental program. Potential patients are then scheduled for a screening appointment. They are mailed a detailed medical and dental history document to fill out prior to this appointment.
At the screening appointment, they are checked into the school with all appropriate consents regarding privacy and patient's rights and responsibilities. A dental student on the screening rotation welcomes them and escorts them to the screening clinic.
A faculty member is present in the screening clinic to oversee the evaluations and make the final decisions. Patients are required to sign a "Screening Consent Form" prior to starting with the evaluation. They are told that the screening appointment is not a full dental examination but an overall examination to determine if they are suitable for a dental student and if they meet the requirements for the pre-doctoral dental program.
Once the patient consents to be screened, his or her vitals are taken, including an optional blood glucose test. If vitals are stable, the student reviews and enters the patient's complete medical history into axiUm and obtains the patient's signature.
An overall extra-oral and intra-oral cancer screening is completed. Upon faculty evaluation and confirmation of the findings, a panoramic radiograph is taken, if appropriate.
Once a gross evaluation of the radiograph is complete and the patient's chief complaint is considered, his or her potential dental needs are recorded. The patient is then informed of the findings and whether he or she is accepted as a patient into the pre-doctoral dental program or given appropriate referrals as needed. The patient is then required to sign the "Screening & Patient's Needs Form" in axiUm.

If it is determined that further radiographs are necessary, they are immediately ordered and attempt to be taken the same day.
The patient is then escorted to the Radiology Department to complete any additional radiographs (if necessary) and is given a "Checkout Sheet". This form is generated from the "Screening & Patient's Needs Form" summarizing what was done and discussed at the screening appointment along with the reminders of the expectations and policies of the pre-doctoral dental program.

Once accepted into the Pre-doctoral program, the new patients are assigned to a DMD student according to their needs. These patients are scheduled to return for their Comprehensive Oral Examination and treatment planning appointment.

Residency programs at UFCD accept patients according to each separate programs' criteria overseen by program directors and often via referrals.

GA – For the pre-doctoral program our screening process is very simple. Patients can apply in two ways, by calling or completing the application found on the web page https://www.augusta.edu/colleges/dentalmedicine/patientservices/documents/ps1840-screenapp-web-au-20170328.pdf .
Once the patient is scheduled for a screening appointment, they are evaluated to see what their dental needs are to assure that their needs fit within the scope of care for the pre-doctoral program and to what level (junior/senior student). The evaluation is completed by two faculty through a limited oral exam (tongue blade) and associated x-rays (full mouth, PA's or Panoramic Radiograph). After examination and radiological interpretation is completed the faculty will do one of two things. First, determine if patient fits the teaching needs of the pre-doctoral program. If the patient is too complex either dentally or medical for the student program, they are sent a letter providing information on how to reach other programs within the school. Second, the patients that have dental needs that fit within the scope of care for the pre-doctoral program are need-coded within the Axium software system and placed in the screening pool. Assignments to students are made to by faculty after a review is conducted with the assigned PCC to ensure audit and compliance is in order of the students' already existing patient population. Students will then place a needs request in Axium based upon certain dental experiences they still need to complete. When a needs match is made between the patient needs code and student request the patient then becomes assigned to that student provider. (L. Simmons)

UK – 1. Screening-prospective patients are screened by team leaders and radiographs are ordered. If the patient is deemed acceptable for the students, they are brought back in to meet their student and start diagnosis and treatment planning.
2. Endo-Only: patients that have a primary provider but are seeking care for only root canals can be seen, evaluated, and treatment planned by a student in one visit. The root canal will be completed, and the patient will be referred back to the primary provider for further care.
3. Dental Hygiene School/BCTC-When patients get their teeth cleaned at the nearby hygiene school, they are referred to us with any restorative needs. They are treatment planned by a student and work is completed.
4. Diagnosis, Wellness, and Prevention Clinic-scheduled through Call Center. Patients are directed based on insurance type in some cases.

5. UCC-Patients not of record but with urgent needs can be seen on a first-come first-served basis in our Urgent Care Clinic. After the care is provided, if a patient wishes to seek comprehensive care in the student clinic, they are assigned to a student for evaluation.
UL – This is copied from Clinical Manual:

ADMISSIONS CLINIC PROTOCOL
1.Patient checks in at reception desk and completes check-in process.
2. Patient is assigned to student(s) on Rotation. Staff or student brings patient into the clinic. Student takes vital signs, enters data into Medical History part of Admissions/Triage Form and presents case for Oral Medicine Faculty review.
OM Faculty confirms ASA class and any medical consults needed.
a. If a medical consult is needed, the student adds the Medical History-All Clinics form and completes the first page (This will allow the medical consultation to be comprehensive. Student should get the patient's MD info as well). The medical consult form can be added and the patient's signature should be captured on the consult form. Code D0093E is added and approved (at time of #3 below). If patient is so medically complex
ULSD Clinic Manual – Section 2 – Page 19
that he/she is not suitable for DMD, the options for GPR or FPP are explained.
b. If the patient is suitable for DMD without med consults, proceed to #3.
3. Code D0190 (Screening of a Patient) and Panoramic x-ray are added and approved. Patient signs Admission/Triage MHx form in AxiUm (Restorative faculty may approve MHx if they see there are no issues that need to be addressed by OM Faculty).
4. Patient is taken for radiographs and school policies are discussed. Be sure to include radiographic codes (i.e.: D0330) for the panograph or D0274 for bitewings or other appropriate coding.
5. Student reviews radiographs, completes oral cancer exam and reviews dental needs.
6. Restorative Faculty is consulted, completes oral exam, and confirms dental needs. Form is completed in AxiUm with assignment (D3, D4, GPR, etc.)
7. Student dismisses patient with info about process: patient will be contacted within~2-8 weeks. Student writes PARTS note and writes the med consult if indicated.
If a medical consult is needed, the OM faculty will approve and sign the med consult. Student will print out the consult form and give to OM faculty. The PARTS note should indicate to whom the med consult(s) was written.
Example (in the T section of the PARTS note)
1. To Dr. John Smith (PCP) regarding status of diabetes 2 and Hb A1c;
2. To Dr. Robert Jones regarding status and control of atrial fibrillation and INR flow sheet;
3. To Dr. Mary Martin (nephrologist) regarding severity, status and medical control of chronic kidney disease.
8. Restorative Faculty completes/approves all other codes, forms, notes.
When a patient needs a med consult, he or she will be assigned to the AMED code in AxiUm. Once the info from the MD has returned and the patient is suitable for DMD, the

patient will be moved to Dr. Daugherty's Team for assignment.
The student who receives this patient will see the patient for comprehensive examination. It is necessary for the assigned student to review the medical consultation results with the OM faculty after completing the comprehensive examination but before the completion of the treatment plan. This student will have completed the narrative note, a separate note with the significant medical information from the MD, and have indicated any treatment modification on the MH-All Clinics form. Code D0093E will be completed by OM faculty

MMC – Oral Diagnosis does our screening program. A patient comes to orientation first to assess a patient's willingness to comply with school policy and standards and then will be screened for appropriateness of undergraduate care and then is assigned to a student doctor.

UNC -

1. To become a patient of the dental school, patients (to-be) will register online at Patient Admissions Registration Form. The registration may be completed on desktops/laptops, tablets, or cell phones. Patients that prefer to call to book their initial appointment may do so by calling the Patient Admissions Clinic front desk at (919) 537-3997.
2. The clinic is staffed by professionals from different areas emphasizing our commitment to inter-professional care and education. Oral Medicine, Restorative, Dental Hygiene, and Radiology faculty will be present. Students from both DDS and DH programs will rotate in the clinic.
3. The clinic will operate from Monday through Thursday, 10-1 and 2-5, and on Fridays 10-1. There will be a total of 9 sessions/week.
4. The summary of each examination will be entered in the Admissions Exam Summary form, which is available at Admissions Exam Summary Form. Paper forms will no longer be used.
5. The clinic will see all new patients and patients that have discontinued their care in our clinics for more than 2 years. That includes patients seen in Urgent Care and in the Grad Clinics who wish to become patients in the pre-doctoral clinics. Such patients must go to the Patient Admissions Clinic on the ground floor for an initial evaluation. We will accommodate patients the best way possible to avoid a second visit.
6. The Family & Friends program will not be changed with the exception of the new (Admissions Summary Exam) form that will have to be completed. The form can be found in EPR (AES tab). A password available at the front desk will be necessary.
7. This is a new system with new forms, new welcome letter, new consent form, new progress note template, etc.

MUSC – Forty patients show up on Tuesday mornings. Each patient is screened by two faculty (rotating basis). The process is being re-worked this semester and should improve.

VCU – For Screening for the Pre-doctoral Group Practices (D3 and D4 Students), patients are screened by designated faculty (Pros and GP) on Wednesday afternoons and are then assigned to students. Students may also screen patients through clinics with designated full time faculty or Group Leaders. All complete dentures and cast metal RPD patients must be screened by Pros faculty. There is also a process for rescreening once ODCT is completed. All implant cases

must be screened by pros and then assigned to either Perio or OS for implant placements. At the initial IOE is where we make the determination if Perio can be addressed in GP or Graduate clinics. Patients are also screened though the Urgent Care Clinic.
Screening implies comprehensive care. The only residency that does comprehensive care is AEGD and they are assigned their patients through our regular screening process.

I. g. Is your institution planning any changes to the protocols for screening/patient admissions for your pre-doctoral program?

i. If so, please describe?

ECU – N/A

UF – The screening process was recently changed in May 2019 to a centralized screening program with the intent of evenly distributing the patients among the students so that each student presents with the necessary types of cases to complete their clinical requirements as well as receiving a well-rounded clinical experience. The patient selection criteria was reviewed to avoid assigning complex patients to the pre-doctoral dental students for the benefit of our patients' care and students learning experience.

GA – No changes to the current screening methods.

UK – Not at this time

UL – Yes, a committee has been formed and made recommendation for changes.

MMC – Our program is under constant review

UNC – The process listed above was implemented on 9/2/2019

MUSC – Yes, and they are underway.
1) So far, the only change is in the forms used.
2) Additional changes are planned soon that will greatly shorten the process of getting a patient assigned to a student based on the student's needs. These changes are scheduled to be fully implemented by the end of the Fall semester.

VCU – N/A

I. h. Does your state have, or are they investigating the incorporation of mid-level providers as part of the oral health care team? If applicable, describe the type of mid-level providers relevant to your state- e.g. Expanded Function DA. Expanded Dental Hygienists, Dental Aide Therapists, Community Dental Health Coordinators

i. If your state <u>has</u> MLP's, who is responsible for the education? Please describe?

ECU – No

UF – It has not been approved by legislation.

GA – Only, Dental Hygienists, they are in our building but not in our school (allied Health) Georgia does not have expanded D. Hygienists

UK – No.

UL – EDDA, are utilized in most private practices as needed. Not sure about others.

MMC – Currently the University of Tennessee Dental School and Meharry Medical College provide organized instruction programs

UNC – No

MUSC – Absolutely not

VCU – N/A

I. h. ii. Do the students, faculty, and local dental community embrace the concept?

ECU –

UF – There are some faculty members who support the MLP. The school does not support the MDL.

GA – N/A

UK – Some do and some don't
UL – Yes

MMC – The state has given its approval for expanded function dental assistants and for dental hygienists to administer local anesthesia.

UNC –

MUSC – No (but there a few of us who believe this could work, given proper legislation and implementation.)

VCU – N/A

I. h. iii. Would your institution be willing to provide this instruction?

ECU –

UF – I do not think so

GA – N/A

UK – Unlikely at this time

UL – Institution is offering the training and willing to share more info.

MMC – We have recently been approved by the state to teach an expanded dental assistant program at Meharry.

UNC –

MUSC – Maybe, but space and faculty would be an issue.

VCU – Our state does have expanded function DAs. Our school investigated training but it is not economically feasible.

II. Cariology:

a. What terminology does your school use to define and categorize dental caries?

ECU – ICDAS, ADA and CAMBRA

UF – "Dental caries: what is it?", which is a summary of the summary of Chapter 2 of the textbook "Dental Caries: The Disease and its Clinical Management. Fejerskov, Ole, Bente Nyvad, Edwina Kidd; 3rd Edition; Wiley-Blackwell, 2015". Attached document.

GA – On the first 3 years ICDAS for pit and Fissures and White spot/cavitated, D1-3 smooth surface/interproximal.

UK – Both ICDAS and ADA classification systems are introduced in Cariology course and ADA is encouraged to be used in clinic. However, coding of caries lesion is not always implemented in oral diagnosis clinic session.

UL – Incipient, caries, arrested, recurrent.

MMC – We use both GV Black and Cambra

UNC – ICDAS classification

MUSC – We use the terminology in Axium.

VCU – ICDAS to define/assess caries lesions; CAMBRA is used to manage caries infections.

II. b. How does your school calibrate its faculty for caries diagnosis?

ECU – Calibration sessions and faculty pre-session huddles.

UF – By attending the Cariology lectures, literature reviews, calibration sessions (lecture and lab formats), and faculty meetings when the topics are discussed

GA – In the first 3 years, we have caries continuum labs for the students, where they use extracted teeth to diagnose caries and then remove caries, but it is mandatory for the faculty to attend.
The Operative 1 course has a wedge of instruction introducing caries from normal tooth structure thru the continuum to pulpal exposure. ICDAS, CRA and multiple, increasing detail caries labs occur in the first 9 sessions. Faculty attends these labs as well as present these labs. Lectures are posted at least 4 days in advance for review, Faculty is peer reviewed and we normalize each session during a faculty huddle.

UK – There is no formal calibration established for faculty. Occlusal caries diagnosis seems more subjective than proximal caries. The direct visual assessment with an orthodontic tooth separator is encouraged for determination of cavity status.

UL – Incipient, caries, arrested, recurrent.

MMC – The faculty participate in the yearly mock board calibration and we have biweekly TEAM meetings where we provide clinical calibration.

UNC – Faculty orientation for new hires include concepts and content from pre-clinical courses along with an overview of assessments and other details related to the course. Existing faculty are apprised of any changes during department meetings, lab sessions and classes.

MUSC – No, Not yet

VCU – We have an online Bb course we must take and pass every two years. Prior to that and still on occasion, we had/have Faculty Seminars/C.E. Courses.

II. c. Does your school have a separate cariology curriculum or is it integrated into the operative course and/or other courses? Please describe.

ECU – We have a cariology course that starts in fall of D1 year and continues with operative into summer of D1 year. 10 lectures, 2 seminars, 2 clinic sessions, 2 lab sessions.

UF – The Cariology and Preventive Dentistry course that was introduced during the Spring of 2017 and is separate from the Operative course. The course is directed by Dr. Marcelle Nascimento and offered to 1DNs in their 2nd semester of the UFCD DMD program. The course introduces fundamental concepts related to dental caries, its prevention, diagnosis and appropriate management. Emphasis is also placed on the preventive aspects of other oral diseases and

nutritional sciences; all using a disease management philosophy that is evidence-based and patient-centered. The course is comprised by 17 lectures, 3 preclinical laboratories and 5 clinical sessions.

GA – Operative 1 presents gross visible caries prevention, dx and mitigation, and our basic sciences faculty presents the microbiology and histologic aspects of the curriculum. This will be the first year that operative has cariology fully integrated. In addition, it is also through and has been through microbiology.

UK – There is a Cariology course that is provided in Fall semester for D1 consisting of 15 sessions, 1 hour per session

UL – Cariology is integrated into the Preventative course in the D1 year

MMC – We do not have a separate cariology course. It is incorporated into preclinical Operative Dentistry courses 1,2, and 3

UNC – We have a separate cariology course in D-1 year.

MUSC – Cariology is integrated into our Operative I and Operative II Courses.

VCU – We have a separate Cariology course currently in the Fall of the D2 Year. However, some Cariology is incorporated into other courses such as Operative and Clinical Skills.

III. Materials and Techniques:

a. What does your school teach in terms of cusp replacement in composite resin?

ECU – Direct (highly operator-dependent), semi-direct, and indirect (CAD-CAM/pressed onlays for any cusp replacement configuration).

UF – We teach a module of complex composites (cusp replacements) during operative II, this entailed 2 weeks of practice and a psychomotor on it. The techniques varies because we teach two different techniques; from complex to a Class I or building the marginal ridges

GA –Composite may be used for replacement of a cusp in certain limited situations, depending on the age of the patient, the caries risk assessment, the occlusion, the amount of sound enamel or decalcification elsewhere on the tooth, plus the functional and esthetic needs of the patient. However, often times this treatment is an interim restoration for a future crown.

Generally non-functional cusps, such as the lingual of a mandibular first premolar, as well as small functional cusps like the disto-lingual of the maxillary molar will remain in composite, especially in a young patient. A short mandibular molar with loss of the disto-lingual cusp may be indicated due to lack of appropriate wall height for a full crown. Even replacing a portion of

the facial cusp of a maxillary premolar in a patient with canine/anterior guidance may be appropriate. Large cusp fractures often involve the use of pins for composite retention as a precursor for using this restoration as a foundation for a future crown. (Dr. V Haywood)

UK – We teach that this is an option. We teach that it is more optimal for non-functional cusps. We also teach that the material choice is determined based upon patient factors such as parafunctional habits and caries risk. We teach that cuspal coverage with a crown/onlay may also be indicated or recommended.

UL – A minimum depth of 1.5 mm for the resin composite material. Auxiliary retention (pots or pin) is considered when it is deemed necessary (more than one missing cusp). In most cases, bonding without auxiliary retention is adequate for retention. No beveling of enamel margins.

A Randomized clinical trial of cusp-replacing resin composite restorations: Efficiency and short-term effectiveness

The International journal of prosthodontics 19(4):349-54 · July 2006
Direct and indirect cusp-replacing resin composite restorations. Fifty-four direct (Clearfil AP-X) and 52 indirect (Estenia) resin composite restorations were placed. Postoperative sensitivity within 1-week post-treatment was reported for 11% of the direct restorations and for 13% of the indirect restorations, but decreased to 4% and 6%, respectively, after 1 month (chi-square, $P > .05$). The results of this study suggest that in the short term, both direct and indirect adhesive techniques are adequate to restore the morphology and function of premolars presenting with Class II caries lesions and a missing cusp.

Randomized Control Trial of Composite Cuspal Restorations: Five-year Results. JDR Vol 93, Issue 1, 2014
176 restorations were made to restore maxillary premolars with Class II cavities and one missing cusp. Ninety-two direct and 84 indirect resin composite restorations were placed by two operators, following a strict protocol. five-year survival rates were 86.6% (SE 0.27%) for reparable failure and 87.2% (SE 0.27%) for complete failure. Mode of failure was predominantly adhesive. The results suggest that direct and indirect techniques provide comparable results over the long term.

Clinical evaluation of direct cuspal coverage with posterior composite resin restorations. J Esthet Restor Dent. 2006;18(5):256-65; discussion 266

Twenty patients, 18 years or older, were included in this clinical trial restoring 25 vital molar teeth with one or two missing cusps. Teeth were restored using a combination of Ultra-Etch 35% phosphoric acid, PQ1 adhesive system, and Vit-l-escence microhybrid composite resin (Ultradent Products, Inc., South Jordan, UT, USA). Microhybrid composite resin demonstrated excellent clinical performance in direct cuspal coverage at completion of a 30-month evaluation. CLINICAL SIGNIFICANCE In selected clinical situations, cuspal coverage direct posterior composite restorations may represent a valid alternative to conventional indirect restorations.

MMC – We recommend amalgam or cast or porcelain coverage.

UNC – Case selection is key. Some important factors to take into consideration are remaining sound enamel, occlusion, parafunctional habits, age, caries risk etc

MUSC – We teach that cusp replacement is done with amalgam or castings.

VCU – The guidelines presented in the 7th edition of the Sturdevant text are taught, "A cusp must be reduced and covered with composite if loss of supporting dentin is severe enough to leave the cusp in a weakened, fracture prone state. Reducing and covering a cusp with composite usually is indicated when the occlusal outline form extends more than two thirds the distance from a primary groove to a cusp tip….
should provide enough clearance with the opposing tooth to result in approximately 1.5 to 2 mm of composite material to restore form and function. (Ritter 237)

III. b. For the following, describe what is being taught, indications, materials used, frequency of use, etc…
i. Class V composite resin?

ECU – Composites, sandwich technique

UF – N/A

GA – YES, when surrounded by enamel

UK – We teach that composite has better longevity with enamel margins. We also teach that composite can be lined with a glass ionomer.

UL – EvoCeram resin. ExciTE F adhesive. No bevels. Diverging walls, especially at mesial and distal. Retention grooves at incisal and gingival. Many Class V lesions are restored with RMGI (Fuji II LC).

MMC – We recommend in the aesthetic zone only or supragingivally in the posterior quadrants.

UNC – Composite resin with low modulus of elasticity, RMGI and GI

MUSC – Clearfil Majesty composite or Voco Iono lux or Iono molar

VCU – We teach to place a bevel on enamel and utilize a nanofill composite. Composites are used more often than amalgam in general, but I do not know the frequency between Class Vs that use CR vs. RMGI since they are both coded the same.

III. b. ii. Sandwich (GIC/composite) technique? Open &/or Closed Sandwich?

ECU – Based on the case

UF – N/A

GA – Yes (which- Open, Closed, both?)

UK – We teach open and closed sandwich. We teach open vs. closed is determined by remaining enamel and esthetic zone evaluation.

UL – Closed sandwich technique with Class V only in deep lesions. RMGI liner (VitraBond Plus). Dycal if near exposure and covered with VitraBond Plus.

MMC – Open

UNC – Case selection is key!! Open sandwich with GI and composite if the patient insists on tooth colored restoration in areas where isolation is less than ideal. Large Class I restorations recommend bulk fill composite (SDR) topped with conventional composite resin
MUSC – Voco Iono Molar plus composite

VCU – Closed sandwich when the RDT indicates it. An Open Sandwich for deep boxes extending onto the root surface. Utilize a RMGI (not a pure GI) and fill up the most gingival portion with RMGI until the level of a normal gingival floor is achieved. Then restore as usual with composite.

III. b. iii. Bulk fill composite restoration technique?

ECU – Presented in lecture

UF – N/A

GA – We discuss the issue. We present the literature. We do not recommend it and we don't teach it as a viable long-term solution

UK – Not at this time

UL – Bulk fill technique: taught in Operative Dentistry III course along with the students being assigned a lit review but not used clinically. We teach EvoCeram Bulk Fill. No capping layers. High intensity light curing for 40 seconds minimum.

Bulk-fill Resin-based Composites: An In Vitro Assessment of Their Mechanical Performance. Operative Dentistry: November/December 2013, Vol. 38, No. 6, pp. 618-625.
Bulk-fill RBCs revealed similar flexural strength values as the class of nanohybrid and microhybrid RBCs, and significantly higher values when compared to flowable RBCs. The modulus of elasticity (Eflexural), the indentation modulus (YHU), and the Vickers hardness (HV) classify the bulk-fill RBCs as between the hybrid RBCs and the flowable RBCs; in terms of creep, bulk-fill and the flowable RBCs perform similarly, both showing a significantly lower creep resistance when compared to the nanohybrid and microhybrid RBCs.

Bulk-fill resin-based composite restorative materials: a review
BDJ volume 222, pages 337–344 (10 March 2017)
The majority of these light-cured bulk-fill materials are still limited to being used in increments of 4–5 mm. There is mixed evidence regarding the manufacturers light-cure times. Some studies have suggested that recommended light-cure times for bulk-fill materials cannot be advocated, with longer curing times being required. If the increment depth is too large uncured resin may remain at the base, which may result in post-operative sensitivity, marginal leakage, caries and mechanical failure of the restoration. Overall, the bulk-fill materials have been shown to have similar volumetric shrinkage to conventional RBC controls, which may suggest there is no overall benefit to using these materials. When looking at marginal gap formation and adaptation, studies are not conclusive. Some have shown no statistical difference between a number of bulk-fill materials compared to conventional RBC, whereas some literature suggests there is an improvement of the marginal seal with bulk-fill materials compared with conventional layering. However, there is very little clinical (in vivo) research on the long-term outcomes of these materials and so caution is needed as to their efficacy.

MMC – It is taught

UNC – SureFill and SonicFill used according to manufacturer recommendations. Clinical trial led by our faculty, in progress on 3M's bulk fill material.

MUSC – Not taught

VCU – Described/taught in lecture and considering introducing to the Clinic.

III. b. iv. Resin Modified Glass Ionomers (RMGI)?

ECU – Vitrebond- liner, Fuji ii

UF – N/A

GA – Yes

UK – We teach this and recommend this material for areas in the mouth that are difficult to isolate, on root structure, have no enamel remaining, or for patients with high caries risk

UL – Lining: for deep lesions, VitraBond Plus alone or with Dycal in near-exposure cavities
Restoration: Fuji II LC used in many Class V cavities

MMC – yes

UNC – Fuji II LC for mostly Class V restorations. VitreBond as liner.

MUSC – Voco Iono Lux and Iono Molar

VCU – Non-carious Cervical lesions (abrasion/erosion), Class V restorations in older adults with root caries, Class Vs where esthetics are less important, patients with a high risk of caries. No bevel.

III. b. v. Amalgam?

1. ***Specify amalgam use at your school as a % of all direct restorations***?

ECU – About 20 percent

UF – N/A

GA – 4%
More resin composite restorations than amalgam are placed up to date

UK – 1% or less

UL – Use is declining; maybe 30% of restorations.

MMC – 50% of posterior restorations.

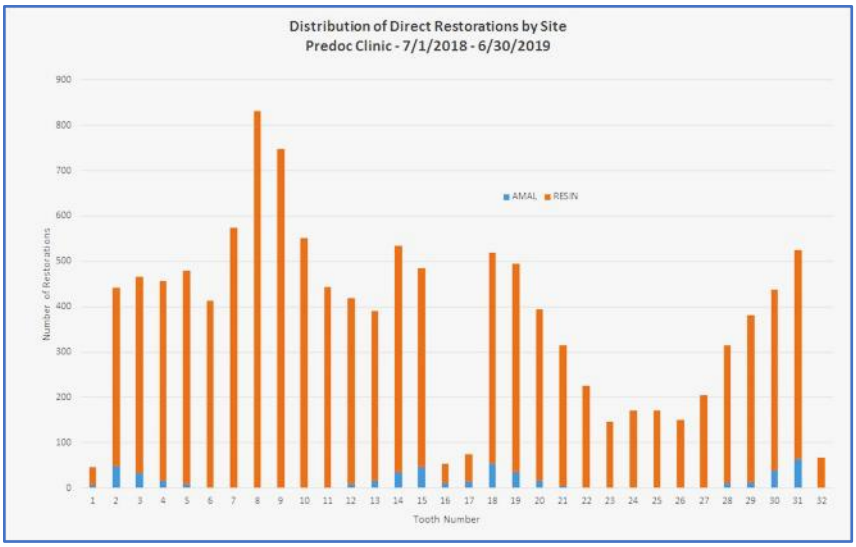
UNC – About 30-35%

MUSC – 21% so far this year.

VCU – See chart below

Direct Restorations - Predoc Clinic
7/1/2018 - 6/30/2019

Code	Count	% of Total
D2140	147	1%
D2150	177	1%
D2160	106	1%
D2161	61	1%
AMAL TOTAL	**491**	**4%**
D2330	1123	9%
D2331	1446	12%
D2332	802	7%
D2335	1262	11%
D2391	2627	22%
D2392	2589	22%
D2393	1138	10%
D2394	466	4%
RESIN TOTAL	**11453**	**96%**
GRAND TOTAL	**11944**	**100%**



[Charts courtesy of J. Donnie Parris, Director, Clinical Business Services]

III. b. v. Amalgam?

2. Are the amalgams placed at your school mostly/always bonded or unbonded?

ECU – Unbonded
UF –
GA – Unbonded
UK – Never bonded
UL – Not bonded
MMC – Unbonded
UNC – Unbonded
MUSC – Unbonded
VCU –

III. b. vi. Pre-doctoral student use of Air abrasion? Yes, No, Indications*?*

ECU – No
UF –
GA – No
UK – In very limited situations
UL – Not taught or used in Operative Dentistry
MMC – No
UNC – No
MUSC – No; but we are acquiring some air abrasion units. Perhaps we will be using this by Spring 2020.
VCU – It is mentioned/described in lecture, but not performed in clinic.

III. c. Are you doing more milled partial coverage restorations as a result of the scanning and milling capability? (e.g., inlays and onlays)

i. Has it replaced gold in your clinic?

ECU – Yes and yes

UF – Students are required to do a milled restoration in the DMD clinic. We encourage to do more than one.
Not really. We are still doing a few gold crowns and onlays.

GA – The D1-D3 have an expanding wedge of instruction on digitally informed restorations. D1 students' digital block converts a large Class II amalgam to a class II inlay. That Inlay is then scanned and a digital prescription for fabrication is completed. Those skills are built upon in D2 Fixed Pros II where the students actually will mill a restoration and cement it on a typodont. A D3 milled restoration is being developed for clinic. D4 students have a 2-unit requirement for milled restorations. No requirement in the junior clinic
No, gold is still an option

UK – yes

UL – Milled partial coverage – not done in-house in undergrad clinics that I know about. We are integrating digital dentistry into more courses and limited use in full crown fabrication in the clinic.
Ceramic restorations are increasing but have not replaced gold

MMC – Yes. No, gold is still an option

UNC – Not yet but when we get the digital lab functional, we speculate some rise in number of milled restorations.
No

MUSC – Yes, yes it has replaced gold

VCU – Yes. We do, inlays, onlays, and partial coverage crowns.

III. d. Who performs molar endo? (identify appropriate provider categories and % of all molar endo procedures performed by each)

i. Pre-doc students %, Endo Residents %, Endo Faculty %

ECU – Mostly residents and endo faculty

UF – According to the Endo Department at UFCD, O\our predoctoral students perform root canal therapy in molars. Our philosophy is that we need to teach students to feel comfortable performing uncomplicated root canal therapy so they will have the foundation knowledge to treat these cases and hopefully understand the principle related to when a patient should be referred to a specialist due to the complexity of the case.

We follow the AAE case difficulty assessment form:
https://www.aae.org/specialty/wpcontent/uploads/sites/2/2019/02/19AAE_CaseDifficultyAssessmentForm.pdf

GA – Residents and faculty

UK – 90% Pre-doc students and 10% Endodontic Faculty (We only have two Endodontic Faculty Members)

UL – Ceramic restorations are increasing but have not replaced gold

MMC – The students in the predoc clinic do 100 % but complex cases and all second molars are referred to the private sector

UNC – We have separate patient pool for each clinic.

MUSC – Pre-doc students 0%, Endo Residents 95%, Endo Faculty 5%

VCU – Pre-doc students 8%, Endo Residents 92%, Endo Faculty 0%

III. e. Do you utilize bond strength testing exercises? Specify- for Research, Teaching Dental Biomaterials, and/or testing new adhesives prior to introduction to clinic?

ECU – No

UF – We have an exercise in the Simlab during the Bonding to enamel lecture. For this exercise, the students will treat enamel with different bonding systems (Optibond FL & Cleafil SE Bond). In some situations, they use the complete and correct sequence. In others, they skip one step. After performing the bonding, the student builds up a composite specimen and light cure. Following, they break the specimen and fill a questionnaire in which they will judge the "strength" needed to break the adhesion. This exercise is used for teaching purpose and not for research. The supervision is made by the Operative Dentistry Faculty in the lab that day.

GA – Yes, dental materials faculty supported by Operative faculty. This is done both in D1 Operative dentistry I and in D2 dental materials for teaching.

UK – No, not at this time

UL – Yes, no, no

MMC – No

UNC – Dental Materials research group makes recommends on products based on current research. The materials committee constantly reviews materials used in the school.

MUSC – No

VCU –

III. e. i. Who supervises?

ECU – N/A
UF –
GA –
UK – N/A
UL – N/A
MMC – no
UNC –
MUSC –
VCU – Research, Dr. Abdulmajeed

III. f. Do you use electric handpieces in the simulation laboratory? In the clinic? In addition to or in place of air-driven handpieces? If no, why not?

ECU – Yes, both

UF – We use Bien Air electric handpieces for both clinics and Sim Lab. Some preclinic, clinical sessions may get air if that is what is requested by faculty, which is mainly when they only need the straight attachment for a prophy cup.

GA – The freshmen class will start using electric hand pieces this year. The plan is that in two years, we will only have electric hand-pieces throughout the DCG

UK – We use electric handpieces exclusively in the simulation lab and in the student clinic

UL – Expense although units are capable of supporting electric handpieces

MMC – no
Tradition and cost

UNC – Yes to both

MUSC – yes in both, Brassler

VCU – Yes. Eventually but not yet in clinic.

III. f. ii. If Yes, what system?

ECU –

UF –

GA – BienAir

UK – Bien Air Motor and Brasseler Attachments

UL –

MMC –

UNC – Bien Air electric hand-pieces. We are phasing out the air-driven hand-pieces. The Class of 2020 will be the last ones to own air-driven hand-pieces.

MUSC – Brassler

VCU – BienAir

IV. Student Assessment:

a. Does your institution have an international dental program?

i. If yes, does your school utilize a bench test (for program admissions decisions)? Please describe.

ECU – No

UF – UFCD have two options for international students. We have a 2-year AEGD program for international educated students in Hialeah. 12 students are enrolled every year. We also have the 4-year DMD program for international educated students in Gainesville, in which 2 students are enrolled per year. There is no bench test for admissions decisions.

GA – No

UK – No

UL – No

MMC – No

UNC – We will start in 2020. They are required to complete a crown prep on anterior tooth for all-ceramic crown, crown prep on posterior tooth for full cast gold crown and an MOD preparation on a molar, in 3 hours.

MUSC – No

VCU – Yes, The bench test, conducted in our simulation laboratory, includes a Class II prep and restoration (composite or amalgam), Class IV restoration, and a crown prep and provisional and an additional Class II prep.

ii. If yes, how many students are enrolled?

ECU –
UF – (see above)
GA –
UK –
UL –
MMC –
UNC – We will enroll 4 qualifying applicants.
MUSC –
VCU – Historically 10 students are enrolled in the D2 year.

IV. b. Do you evaluate pre-doctoral students using OSCE's? What courses, what levels/years (e.g. D-1, D-2), in place of other more traditional exams, and how long have you used them?

ECU – YES, > 7 years

UF – We don't have OSCEs being used to evaluate the pre-doctoral students. We have a clinical entry exam which has an oral exam component and a psychomotor component. The clinical entry exam has been used for 3 years now.

GA – Freshmen year in the operative dentistry course. (Not in Dental Anatomy?)

UK – Several courses use OSCE's. PER 821 and 831 gives 2nd and 3rd years OSCEs respectively. This includes instrumentation and diagnosis principles. This has been part of the curriculum for 10+ years. Endodontics has utilized an OSCE for 10+ years in END 822 (changing to END 826). Content includes identification and use of endodontic armamentarium, evaluating access preparations on extracted and plastic teeth, radiographic interpretation of working length and obturation root morphology and anatomy, diagnosis and pulp testing. CDS 833 provides a comprehensive OSCE to help prepare 3rd years for part II of the National Board. This has been given for 6 years and is currently being revised to incorporate the Integrated Board.
The Prosthodontic Division only administers one OSCE during early spring semester of 4th year. This only includes removable prosthodontics.
Course: PRO 841
Content: Instrumentation (timed stations in D611)
Years administered: 15+

UL – True OSCE – No

MMC – We use OSCE's in preclinical Operative classes for instruments and preparation identification and in Removable Prosthodontics as a final FCCE and in Ortho.

UNC – N/A

MUSC – Yes

VCU – They are used in the Clinical Prosthodontics course the D3 year in the Mannequin Simulation Laboratory. This OSCE has been in place for over 5 years.

IV. c. Describe your primary (most frequently used) didactic testing methodology
i. Which method? (e.g. pen/paper-hand graded, ScanTron sheets, digital assessment program such as ExamSoft or eMedley, other…)

ECU – EXAM MASTER

UF – The primary didactic testing methodology is Examsoft. At the moment we are looking at Canvas, our current course platform and using it for all the other types of assignments, quizzes, etc.

GA – ExamSoft
UK – We use pen/paper-hand graded for limited situations, primarily ScanTron and ExamSoft are utilized.

UL – Methods – Scantron, Blackboard, ExamSoft, possible some hand graded, especially for essay style. Scantron is probably most used.

MMC – Faculty have the academic freedom to choose how they want to test. We have some who use hand-grading, some who use ScanTron sheets, and others who are using the computer laboratory through Blackboard.
The pros for hand-grading is that it offers a more personal assessment of the student's work. The cons are it labor intensive and can prove to be less black and white.
The pros for ScanTron is that it is easy but the cons are the systems technology can be non-operational resulting in pen and paper reassessment and the questions have to be formatted to the technology.
The pros for the computer lab is that it is easy once questions have been entered and the grades can be automatically entered into Blackboard. The cons have to do with system operations failure and formatting.

UNC – We are in the process of transitioning to eValuate.

MUSC – ExamSoft,

VCU – Most Course Directors utilize ExamSoft. I currently utilize written exams with scantrons, and occasionally paper hand-graded (for quizzes). I am very interested in eventually converting all of my exams to ExamSoft.

IV. c. ii. Pros/cons to the one you are primarily using?

ECU –

UF – N/A

GA – Software not intuitive- difficult to add test questions. Allows questions/answers to be randomized, reducing cheating potential, and the instant statistical analysis is very helpful. Allows instant regrading of all tests if you wish to allow a response, throw a question out, etc. Overall, it's a plus.

UK – Pros of ScanTron-predictable and easy to implement. Cons of ScanTron-outdated and questions are not interchangeable. Pros of ExamSoft-Cheating minimized, good metrics provided, question banks. Cons of ExamSoft-Time needed to implement, IT Support needed, and students have expressed negative feedback

UL – Scantron and Blackboard are rapid turn-around and provide stats

MMC –

UNC – Too early to tell

MUSC – ExamSoft is very difficult to use and adds considerable time for faculty compared to the SacanTron we used previously

VCU –

IV. c. iii. Are you investigating other methods?
1. If yes, which one(s)?

ECU – No

UF –

GA – No

UK – We are gradually switching to ExamSoft as the primary testing method.

UL – Not at that we are aware of

MMC – We have purchased ExamSoft and planned launch is 2020. The Biomedical Sciences are using ExamSoft.

UNC – N/A

MUSC – No

VCU –

V. Administration:

a. What is your policy on pre-doctoral student attendance? Describe any differences between didactic-only, pre-clinical laboratory, and clinical courses.

i. Please provide the actual attendance policy statement.

ECU – 100% Class co-ordinators and PCC

UF – Our attendance policy varies by course. Some courses have mandatory attendance, while others do not.
"Students are expected to attend class during school hours (7:25 am - 4:55 pm). Course directors can require attendance in their classes on all days officially scheduled on the annual academic calendar. For any deviation from this policy, the procedures described below must be followed. Any student not following this policy will be considered having an unexcused absence. Students with an unexcused absence for didactic and/or laboratory classes will be subject to grade penalties imposed by the course director or in accordance to policy stated in the course syllabus. Students who have an unexcused absence for clinical rotations or mandated special education events will be subject to the Policy Regarding Unexcused Absence from Clinical Rotations or from Required Attendance Educational Events. Students who develop a reoccurring history of unexcused absences will be referred to SPEC."

GA – Students are expected to attend all scheduled classroom, laboratory and clinic sessions. Students are expected to attend all scheduled classroom, laboratory and clinic sessions. https://www.augusta.edu/dentalmedicine/policies/excused-absence.php

UK – This is the policy for the Operative Course (Restorative Dentistry I) taken from the Syllabus:
Attendance Policy
Attendance is required for each session and will be monitored.

Excused Absences
Senate Rules 5.2.4.2 defines the following as acceptable reasons for excused absences: (a) significant illness, (b) death of a family member, (c) trips for members of student organizations sponsored by an educational unit, trips for University classes, and trips for participation in intercollegiate athletic events, (d) major religious holidays, (e) interviews for graduate/professional school or full-time employment post-graduation, and (f) other circumstances found to fit "reasonable cause for nonattendance" by the instructor of record. Students should notify the professor of absences prior to class when possible.

If a course syllabus requires specific interactions (e.g., with the instructor or other students), in situations where a student's total EXCUSED absences exceed 1/5 (or 20%) of the required interactions for the course, the student shall have the right to request and receive a "W," or the Instructor of Record may award an "I" for the course if the student declines a "W." (Senate Rules 5.2.4.2.1)

(If an attendance/interaction policy is not stated in the course syllabus or the policy does not include a penalty to the student, the Instructor cannot penalize the student for any unexcused absences.)

Verification of Absences

Students may be asked to verify their absences in order for them to be considered excused. Senate Rule 5.2.4.2 states that faculty have the right to request appropriate verification when students claim an excused absence due to: significant illness; death in the household, trips for classes, trips sponsored by an educational unit and trips for participation related to intercollegiate athletic events; and interviews for full-time job opportunities after graduation and interviews for graduate and professional school. (Appropriate notification of absences due to University-related trips is required prior to the absence when feasible and in no case more than one week after the absence.)

Unexcused Absences

If you anticipate being absent, you must contact the Office of Admissions and Student Affairs and the course director. Each student is granted one unexcused absence per semester, after that, each unexcused absence will result in the reduction of one point from the student's course average. Three unexcused tardies or early departures not identified as excused will be considered as one unexcused absence.

An unexcused absence from a quiz, or from an exam, will result in a grade of zero with no retake offered.

Religious Observances

Students anticipating an absence for a major religious holiday are responsible for notifying the instructor in writing of anticipated absences due to their observance of such holidays. Please check the course syllabus for the notification requirement. If no requirement is specified, two weeks prior to the absence is reasonable and should not be given any later. Information regarding major religious holidays may be obtained through the Ombud's website or calling 859-257-3737. (Senate Rules 5.2.4.2.4)

This is the policy for the Preclinical Restorative Dentistry I (Lab Portion of Operative Course) taken from the Syllabus:

Attendance and being on-time for each scheduled laboratory session is required and will be monitored. Absences are either excused or unexcused. Excused absences will not affect grades, but the student is responsible to make up the missed work and master the skills and complete the projects on time. Any makeup of a missed practical examination due to an excused absence must be arranged with the course director within 2 days of return and must be taken within 10 days of the missed examination.

If you anticipate being absent, you must contact the Office of Admissions and Student Affairs and the course director. Each student is granted one unexcused absence per semester, after that, each unexcused absence will result in the reduction of one point from the student's course average. Three unexcused tardies or early departures not identified as excused will be considered as one unexcused absence.

Unexcused absence from an in-class project will result in a zero with no retake available. Unexcused absence from a practical exam will result in a zero with no retake offered.

All preclinical and clinical courses require attendance at UK.

UL – A policy is required in all syllabi. Individual courses may supplement their own policies.
Attendance Policy and absences
(Add specific attendance policy)
The faculty of this course assume a major responsibility to you, the School, other faculty, colleagues, and dental patients to provide dental students with the opportunity to develop clinical skills, knowledge, and judgment in the area of Operative Dentistry. This objective is hampered by poor attendance in either the lecture or the laboratory.

Attendance is required for lecture and laboratory examinations unless circumstances prevent attendance. Students who know that they will be absent should contact the course director prior to the examination.

As students in a health studies environment, dental students are responsible to patients and to the profession of dentistry. They must possess the highest personal integrity and ethics. Meeting these standards requires a commitment to self-discipline in order to fully develop the necessary competencies that lead to a D.M.D. degree.

The following policies are MANDATORY:

1. Attendance at scheduled classes, laboratory sessions, examinations, clinics, rotations, and the completion of clinical assignments on time.

2. Professional conduct towards patients, which includes responsible and methodical appointments for diagnosis and treatment, obtaining correct informed consent, appropriate consultations with faculty, and the timely completion of all commitments.

Students are expected to attend all scheduled activities. It is recognized that there will be legitimate unavoidable times when a student may be absent. This must be reported to the Office of Student Affairs at 852-5081. This office will communicate absences to the appropriate course director who will decide if the absence is excused.

MMC – Failure to attend 90% of the sessions can result in failure of the course. Tracking is the responsibility of the course director and academic dean.

UNC – The pre-clinical and didactic attendance policies are course specific as outlined by course syllabi.

MUSC – N/A

VCU – This varies by Instructor and Course. For Pre-Clinical Operative, this is the policy stated in the syllabus:
"Attendance/Absentee Policy
Attendance is required for lecture and laboratory sessions. Roll may be taken, and attendance will be a consideration in determining your final grade. If three lecture and/or laboratory periods are missed, your lecture and/or lab grade may be lowered one letter grade. If four lecture and/or laboratory periods are missed, your lecture and/or lab grade may be lowered two letter grades. More than five lecture and/or laboratory absences may result in a grade of F and may require retaking the course.
Grading Policy
Students are expected to take each lecture and laboratory exam on time. Any personal or health related problem resulting in a missed exam must be communicated in writing, with appropriate documentation, to the course director. The course director will determine if a makeup exam will be given, as well as the makeup format….
Attendance is required and will be monitored for lecture and laboratory sessions. Attendance will also be a factor in grading and may be used by the Academic Progress Committee regarding decisions concerning promotion, retention, and dismissal."
The Course Director oversees the attendance and walks throughout the lab to take attendance at least once during the lab session. If students do not notify the Instructor as to the reason for their absence, the Course Director follows up via e-mail. In general, the policy is effective.

V. a. ii. Who is responsible for tracking attendance?

ECU – Class Co- Ordinators and PCC

UF – The course director is responsible for tracking attendance in their course, clinic group leaders track clinic attendance.

GA – Course directors are responsible for tracking course attendance. The Office of Student Affairs is responsible for tracking excused absences
UK – Course directors and Team Leaders (clinical) are responsible for tracking attendance.

UL – Student Affairs notifies faculty if students are absent. Individual faculty determine if it is excused or not. Some faculty have sign-in, some have quizzes to encourage attendance, some penalize via exam scores, some faculty do not take attendance, etc.

MMC – See above comment

UNC – Academic Affairs for all pre-clinical and didactic courses. Clinical Affairs for clinical courses. Excused absences have to be submitted to Academic Affairs office.

MUSC – N/A

VCU –

V. a. iii. How effective is your policy?

ECU –
UF – Our department policy for missing quizzes and exams states that students have two days to make up the exam and the highest grade they can achieve is an 85%. That is a very effective policy.

GA –

UK – Effective but metric driven re-evaluation always prudent.

UL – N/A

MMC – Students show up

UNC – Policy is effective, process is cumbersome! Would love to hear what other schools are doing

MUSC – N/A

VCU –

V. b. What is your policy for managing student complaints about grades?

ECU –
UF – Students can discuss with the course director, if it is not resolved they meet with the division director, then the chair, then the associate dean for academic affairs. We only meet with students that fail the psychomotor exams. Other students can ask faculty to help them interpret the results. We do not change grades.

GA – Students are advised to follow protocol guidelines that include a chain of command for reporting a complaint. The chain of command steps: course director – Chair of the department – Associate Dean of Academic Affairs and Advanced Education. If a complaint progresses to the Associate Dean of Academic Affairs and Advanced Education, a meeting with the student, the Academic Dean and the Student Affairs Dean is scheduled to address the complaint.

UK – This is managed by the course director.

UL – Grade Appeal Policy - mandatory for inclusion in syllabi
A student may challenge a didactic or clinical evaluation or final course grade. The student must state in writing the reasons for the challenge and forward this information to the course director within five school days of receiving notification of the evaluation. The student should first attempt to resolve the disagreement with the course director. If unsuccessful, the student should discuss the issue(s) with the department chairperson. If still unresolved, the student should discuss the matter with the Associate Dean for Academic Affairs. The University has a formal

Grievance procedure (specified in the Student Handbook) for students if disagreements regarding academic matters cannot be resolved through the above process.

MMC – Complaints are to be managed at the lowest managerial level: ie individual faculty member then course director then department chair then academic dean.

UNC – Reach out to course directors. If there's an issue with coming to an agreement route the discussion to student life and academic affairs office.

MUSC – N/A

VCU – Students are welcome to go over their Practical Exam grade with the Course Director. That usually helps the student to understand the fairness of the grade rendered. On occasion, students may appeal a grade, for which there is a school/university procedure/policy.

V. c. What is your policy on student absences

ECU – Planned Absences

Students who know in advance that they will be absent from school (e.g., when representing the School at a professional meeting) must notify the Office of Student Affairs at least two weeks prior to the planned absence in order to discuss the impact of the planned absence on the students' academic progress.

Students with patient care responsibilities must also notify and seek approval from the Office of Clinical Affairs, the appropriate PCC, and the GPG Leader, at least two weeks in advance of the requested absence.

UF – Students are permitted personal leave days during years three and four for interviews. Planned absences must be approved five days in advance. Sick leave for more than three days requires a doctor's note. Religious holidays are always permitted.

GA – https://www.augusta.edu/dentalmedicine/policies/excused-absence.php

UK – Excused Absences
Senate Rules 5.2.4.2 defines the following as acceptable reasons for excused absences: (a) significant illness, (b) death of a family member, (c) trips for members of student organizations sponsored by an educational unit, trips for University classes, and trips for participation in intercollegiate athletic events, (d) major religious holidays, (e) interviews for graduate/professional school or full-time employment post-graduation, and (f) other circumstances found to fit "reasonable cause for nonattendance" by the instructor of record. Students should notify the professor of absences prior to class when possible.

If a course syllabus requires specific interactions (e.g., with the instructor or other students), in situations where a student's total EXCUSED absences exceed 1/5 (or 20%) of the required

interactions for the course, the student shall have the right to request and receive a "W," or the Instructor of Record may award an “I” for the course if the student declines a “W.” (Senate Rules 5.2.4.2.1)

(If an attendance/interaction policy is not stated in the course syllabus or the policy does not include a penalty to the student, the Instructor cannot penalize the student for any unexcused absences.)

Verification of Absences
Students may be asked to verify their absences in order for them to be considered excused. Senate Rule 5.2.4.2 states that faculty have the right to request appropriate verification when students claim an excused absence due to: significant illness; death in the household, trips for classes, trips sponsored by an educational unit and trips for participation related to intercollegiate athletic events; and interviews for full-time job opportunities after graduation and interviews for graduate and professional school. (Appropriate notification of absences due to University-related trips is required prior to the absence when feasible and in no case more than one week after the absence.)

Unexcused Absences
If you anticipate being absent, you must contact the Office of Admissions and Student Affairs and the course director. Each student is granted one unexcused absence per semester, after that, each unexcused absence will result in the reduction of one point from the student’s course average. Three unexcused tardies or early departures not identified as excused will be considered as one unexcused absence. An unexcused absence from a quiz, or from an exam, will result in a grade of zero with no retake offered.

Religious Observances
Students anticipating an absence for a major religious holiday are responsible for notifying the instructor in writing of anticipated absences due to their observance of such holidays. Please check the course syllabus for the notification requirement. If no requirement is specified, two weeks prior to the absence is reasonable and should not be given any later. Information regarding major religious holidays may be obtained through the Ombud’s website or calling 859-257-3737. (Senate Rules 5.2.4.2.4)

UL –

MMC – Students are to get an excuse for planned absence from the Dean for Student Affairs that forwarded to the appropriate faculty member. Illness requires notification of the Dean of Student affairs.

UNC – If it is not a medical leave, then students need excused absence to miss class or clinic.

MUSC – N/A

VCU – Please see above

V. d. Regional licensure exam
i. What exam(s) does your school host?

ECU – CITA
UF – The CDCA provides the ADEX examination.
GA – CRDTS only, Yes
UK – ADEX through CDCA
UL – No specific policy other than attendance policy
MMC – CITA
UNC – CITA
MUSC – ADEC
VCU – ADEX administered by CITA

V. d. ii. What's the general consensus towards regarding the benefits of the exam? Since the obvious "benefit" is it's required for licensure, offer some "benefit" examples- is it sufficiently discriminating regarding student abilities, or does it test relevant procedures, or is it really accomplishing the goal of protecting the public from incompetent practitioners?

ECU – Does not actually help gauge their competence.

UF – No benefit! Our students graduate from an accredited dental school and must pass the National Board Examination.

GA – Since the obvious "benefit" is it's required for licensure, offer some "benefit" examples- is it sufficiently discriminating regarding student abilities, or does it test relevant procedures, or is it really accomplishing the goal of protecting the public from incompetent practitioners?
The only practical benefit for our students is that it is the only pathway to licensure in GA.
It is not consistently discriminating between student capabilities.
The tested procedures for periodontics (scaling) and operative (ideal minimal lesions) are not that relevant for private practice.
Almost all board candidates pass all of these exams by the third try so whether or not these exams protect the public from incompetent practitioners would make for a healthy debate.

UK – We agree that the minimal requirements of the lesion selection are over treatment by today's standard of care. This testing modality will test a student's ability on that given day, at that given time. However, poorly performing students have good days and excellent students have bad days. This is a small snapshot of a very atypical day in patient care. We are not confident that this exam alone is a good way to protect the public.

UL – ADEX
Not sure about our "official" position. Personally, it is not discriminating and overall is not accomplishing the goal of protecting the public. Every good student can have a bad day and every poor student can "luck out" on any given day, particularly on a small "ideal" procedure.

MMC – CONSENSUS IS NOT UNIFORM.

UNC – It is an exercise in testing the student's resilience, more than their competence.

MUSC – Clinical exams are unethical. Clinical exams must be eliminated.

VCU – Tests hand skills not evaluated on a written exam

V. d. iii. What's the general consensus on the elimination of the exam? By Faculty, By Students?

ECU – Eliminating patient-based exam.

UF – The majority would like to see it eliminated.

GA – Most faculty and students are opposed to the territorial nature of these regional board exams and the barriers state dental boards have for licensure.

UK – We would definitely like to see some alternative to live patient exams. We think the students feel the same as ASDA has been outspoken on this subject.

UL –

MMC – I am sure the students would love to forgo it. The faculty view it as necessary but inconsistent from testing site to testing site.

UNC – Faculty favor moving away from patient- based exams.

MUSC –

VCU – Live patient should be eliminated but simulated procedures necessary.

V. d. iv. What are the alternatives?

ECU – Simulation, standardization

UF – Students graduate from an accredited institution and pass the National Board Examination.

GA – One uniform national clinical exam integrated into the dental curriculum would make more sense than what we currently have.

UK – Canadian OSCE? Is Canada having incompetence issues with licensed dentists there? If not, then perhaps this is a valid alternative to live patient exams. Portfolios can be used to show a student's progression over a period of time.

UL – Submitting a portfolio; New York model; allowing the school to determine competency.

MMC –

UNC – Simulation exam, standardized preps, standardized environment

MUSC – Written exams just like physicians. Surgeons are not required to remove a gall bladder to get a license

VCU –

V. e. Discuss opinions on realigning the CODE regions.
i. Are there schools you feel should be in your region that are not?

ECU –

UF – N/A

GA – One uniform national clinical exam integrated into the dental curriculum would make more sense than what we currently have.
The first thing to consider is what is / are the goal(s) of realignment? Such as:
To facilitate travel to meetings
To combine schools that have shared patient bases (border cities)
To combine schools that are subject to the same regional licensure exams
To combine schools from US regions with similar customs and cultures

UK – No

UL –

MMC – Perhaps Tennessee and Mississippi should be in the Southeastern region.

UNC – No

MUSC – No

VCU – I welcome adding schools to our region.

V. f. Discuss and describe suggestions for improving CODE.

ECU –

UF – We would like to see more school involvement in the National questions each year.

GA – These questions should be coalesced and rolled up to the national level. Best practices should be identified at the national level and subsequently shared with the members.

Some of these questions are beyond the domain and aim of Operative Dentistry, and I get concerned that we lose focus on Operative instruction
Create an index of agenda topics by year and level (National / Regional) to avoid repeating or duplicating them from year to year and to facilitate intentionally repeating topics when the evidence-based literature clearly indicates a change or a shift in practice or materials to see if the schools have been influenced by the trends.

UK – We are looking forward to trialing the format suggested this year.

UL – Due to budget constrictions, maybe have regional meetings every two years?

MMC – Let us reflect on this some more.

UNC – Some of the schools who participate in CODE meetings have very strong graduate programs. Most of these grad students pursue a path in academia. It will great to encourage someone in their senior year, who is passionate about teaching Operative Dentistry, to join the group every year.

MUSC – N/A

VCU – I think the new format proposed by Dr. Kaur that we will try this year is a great start.

End of National Agenda responses

Regional Nominee for Presenting at the 2020 CODE Annual Meeting
(Please Include Topic)

Name	Topic	Contact Info

Please return all completed enclosures to:

Gary L. Stafford DMD
Consortium of Operative Dentistry Educators (CODE)
National Director
Senior Associate Dean for Academic Affairs
Oregon Health & Science University School of Dentistry
Office of Academic Affairs
2730 SW Moody Ave, MC: SD-AA
Portland, OR 97201
503.494.8801
staffoga@ohsu.edu

Deadline for return: 30 days post meeting

Please send the requested documents via email with attachments

CODE Regional Meeting Attendee's Form

2019 South East Region VI

October 16-18, 2019

Name	University	Phone	Email
Martha Brackett*	Augusta University GA	706-721-2881	mbrackett@augusta.edu
Kevin Frazier	Augusta University GA	706-721-8611	kfrazier@augusta.edu
Ray Jeter	Augusta University GA	706-721-2881	rajeter@augusta.edu
Jan Mitchell	Augusta University GA	706-721-2881	janmitchell@augusta.edu
Linc Conn	East Carolina University NC	252-737-7024	connl@ecu.edu
Saulo Geraldeli	East Carolina University NC	252-737-7148	geraldelis19@ecu.edu
Hanan Elgendy	East Carolina University NC	252-737-7148	elgendyh19@ecu.edu
Roopwant Kaur	East Carolina University NC	252-737-7148	kaurr@ecu.edu
Luis Schlichting	East Carolina University NC	252-737-7148	schlichtingl14@ecu.edu
Luis Sensi *	East Carolina University NC	252-737-7066	sensil@ecu.edu
Todd Watkins	East Carolina University NC	252-737-7148	watkinsr@ecu.edu
James Tyus*	Meharry Medical College TN	615-327-6125	jtyus@mmc.edu
Michael Yacko	Meharry Medical College TN	615-327-6125	myacko@mmc.edu
John Comisi*	Medical University South Carolina SC	843-792-2912	comisi@musc.edu
Jeffrey Garber	Nova Southeastern University FL	800-541-6682	jgarber@nova.edu
Evren Kilinc*	Nova Southeastern University FL	800-541-6682	kilinc@nova.edu
Deborah Dilbone	University of Florida FL	352-273-5800	ddilbone@dental.ufl.edu
Marcelle Nascimento	University of Florida FL	352-273-5800	mnascimento@dental.ufl.edu
Ana Ribeiro*	University of Florida FL	352-273-5800	aribeiro@dental.ufl.edu
Susan Bishop	University of Kentucky KY	859-323-3368	susan.s.bishop@uky.edu
Hiroko Nagaoka*	University of Kentucky KY	859-323-3368	hna226@uky.edu
Alia Eldairi*	University of Louisville KY	502-852-1238	a0elda01@louisville.edu
Joesph Haake	University of Louisville KY	502-852-1238	jahaak01@louisville.edu
Sumitha Ahmed*	University of North Carolina NC	919-537-3146	sumitha_ahmed@unc.edu
Apoena Ribeiro	University of North Carolina NC	919-537-3146	apoena@email.unc.edu
Mary Baechle*	Virginia Commonwealth University VA	804-828-2977	mbaechle@vcu.edu

* Primary CODE Contact

Region VI Group Photo at ECU School of Dental Medicine