2017 Fred & Pamela Buffett Cancer Center
Request for Applications

The Fred & Pamela Buffett Cancer Center is accepting applications seeking support for innovative, significant pilot projects in cancer research, with awards to be made of up to $50,000 for one year per grant (for single-PI proposals). **In order to encourage multi-PI and research program-type proposals, developmental awards of up to $75,000 for multi-PI projects involving two Principal Investigators and up to $100,000 for SPORE/P01/U01-type projects involving three PIs are also being offered.** This is an omnibus request for applications for projects in six "target areas" detailed in this RFA. All applications must be prepared on the forms provided at the end of this application and emailed, or provided as a file share through **Box.com**, as a single, complete PDF to kjordan@unmc.edu, by **5:00 PM on Friday, December 22, 2017**. We anticipate that the review process will be completed in January 2018, with grants awarded and funding initiated directly thereafter. In the subject line of the email, please identify the number of the target area of your proposal, followed by the last name of the Principal Investigator and the words "pilot project application". (Example: #1, Hollingsworth, Pilot Project Application). You will receive a confirmation email upon receipt and validation of eligibility.

Target Areas. The overall goal of this RFA is to help initiate pilot research projects that have the potential to develop into nationally funded high-impact translational cancer research projects in the Cancer Center. Priority will be given to projects with the highest scientific merit and that fit within established or developing programs in the Cancer Center (detailed below). Additionally, there are special opportunities for funding for unique investigator-initiated cancer concepts of high merit that do not fit within the current cancer center programs, and for early-career investigators who have no current national research funding. Programs targeted for funding include:

#1 - Molecular and Biochemical Etiology of Cancer Program
#2 - Cancer Genes and Molecular Regulation Program
#3 - Gastrointestinal Cancer Program
#4 - Cancer Prevention and Control
#5 - Investigator-Initiated Cancer Concepts
#6 - ACS – American Cancer Society Institutional Research Grant Pilot Projects

Specific target areas within these programs are discussed in a subsequent section. The planned scientific review structure and process for all pilot project applications is described below. (See "**Application Review Process**" on page 2 of this announcement.)

Eligibility

1. Membership (member or associate member) of the PI and co-PIs in the Fred & Pamela Buffett Cancer Center. If you are not currently a member of the Cancer Center, please contact Matt Winfrey (winfreym@unmc.edu) to request membership. Awards to postdoctoral fellows or graduate students are not allowed.
2. Focus on cancer-related research.
3. Programmatic Priorities and Translational Goals: Program leaders in the Cancer Center have identified priority areas that will enhance quality of translational research in the cancer center and thereby improve competitiveness for NCI funding and designation as a Comprehensive Cancer Center.
4. There is an opportunity for investigator-initiated priorities. Investigators are welcome to submit novel concepts for competitive research projects with translational potential that are not covered by the programmatic priorities.
5. American Cancer Society-supported seed grants are available to support independent, self-directed investigators early in their careers who have no current national grant support.

Criteria for Review of Applications

1. Quality of the proposal with respect to significance, innovation, and approach of the research proposed.
2. Potential impact on cancer diagnosis, therapy, or outcome.
3. Focus of the proposed research with the programs and goals of the Cancer Center.
4. Potential for future funding from national agencies.
5. Potential to lead to diagnostic or therapeutic clinical trials.

Application Review Process

The planned application review process will be similar to that employed in the previous funding cycle. In order to expedite and to ensure transparency of the review process, a single study section will be assembled. This study section will include all those who submitted an application, as well as Cancer Center senior leadership and other senior faculty with appropriate expertise. Study section participants will be required to excuse themselves from the review of applications for which they have any identified conflict of interest (e.g., serve as proposal PI or Co-I), but will be encouraged to take part in the discussion, evaluation, and voting process for all other applications. The study section will require a full-day commitment, with potential dates sent out after the application deadline as a means of identifying the one for which the greatest number of reviewers will be available. *Participation on this study section/review panel will not be required, but is very strongly encouraged.*

Focus areas of interest within each program:

#1 – MBEP (Molecular and Biochemical Etiology of Cancer Program)

- Focus on the discovery and validation of new mechanisms of cancer initiation and progression that could lead to identification/validation of new cancer biomarkers or therapeutic targets.
- Important criteria for all applications will be the likelihood of success for future funding (especially NCI funding), innovation, impact, and qualifications of the PI and co-I/PIs.
- Grants that span across the three working themes of the MBEP (Genome Integrity, Cell Cycle and Survival, and Extra-Cellular Mediators of Oncogenesis) and those with translational potential are particularly encouraged.

#2 – CGMRP (Cancer Genes and Molecular Regulation Program)

- Projects to identify and/or validate new cancer targets.
- Projects to develop and use new preclinical models for target evaluation.
- Projects to develop and test novel methods for delivery of small molecules as potential therapeutics.
- Projects to discover and develop small molecule inhibitors that perturb target function.
- Collaborative projects with other programs.

#3 – GICP (Gastrointestinal Cancer Program)

- Emphasis on research related to all GI cancers.
- Basic mechanisms of GI cancer development and progression; delineation of the metastatic program of GI cancer cells.
- Novel biomarkers for treatment decision-making in stage II/III disease colorectal cancer.
- New therapies for metastatic GI cancer.
- Novel biomarkers for detection of disease.
- New projects on colon cancer are encouraged.
- Projects with potential for clinical trials.

#4 – Cancer Prevention and Control

- Focus on population-based research in any area of cancer etiology, prevention or control.
- Grants that seek to improve the knowledge base for promoting reductions in cancer incidence, morbidity, and mortality.
- Grants that develop interventions that reduce cancer risk and incidence or complications secondary to cancer progression.
- Grants that develop interventions to manage symptoms and/or improve quality of life and survivorship.

#5 – Investigator-Initiated Translational Research

- Highly innovative translational research that uses knowledge of human biology to develop and test the feasibility of cancer-relevant interventions in humans and/or determines the biological basis for observations made in individuals with cancer or in populations at risk for cancer.
- Unique, high-impact studies directly connected to some aspect of biology of human cancer, that may encompass any form of cellular, molecular, structural, biochemical, genetic, or other appropriate experimental approach.

 # 6 – ACS (American Cancer Society Institutional Research Grant Pilot Projects)
American Cancer Society (ACS) Institutional Research Grant pilot project awards are intended to support independent, self-directed investigators early in their careers who have no current national grant support of their own.

Pilot project grants are intended to support beginning investigators in initiating cancer research projects that can generate preliminary results enabling them to compete successfully for national research grants in all areas of cancer research.

ACS Eligibility Requirements are as follows:

- University of Nebraska investigators at the rank of assistant professor or equivalent who are eligible to apply as a principal investigator for grant support from national agencies (e.g., ACS, NIH, NSF).
- The investigator must be within six years of their first independent research or faculty appointment and have a commitment from the institution for salary and space.
- Awards to postdoctoral fellows, graduate students, and senior faculty are not allowed.
- Recipients of IRG pilot project grants are not required to be United States (U.S.) citizens. However, any applicant for IRG pilot project funding who is not a U.S. citizen must hold a valid work visa that will allow him or her to remain in the U.S. long enough to complete the IRG pilot project.
- Those selected for funding must present their projects to the scientific community and potential donors if requested by the American Cancer Society or the Fred & Pamela Buffett Cancer Center. One written progress report and one written final report are also required.

☐ *If you meet the above criteria, please check this box and complete the appended biographical information form for the ACS applications. Your application will be considered for the ACS Target, as well as other identified Target Areas within this request for applications.*

Format for All Pilot Project Applications

Grant Applications should include the following:

1. A cover page (one-page limit) including the title of the project and the names, titles, and roles of each applicant investigator,
2. Abstract of up to 350 words summarizing the research question, the background of the project, the specific aims, the proposed approach, and the expected outcomes of the project.
3. Lay abstract (200-word abstract that defines the goals and outcomes of the project in lay terms),
4. A Research Plan (six-page limit) that addresses the Specific Aim(s), Background and Significance, Innovation, Preliminary Studies, Research Design and Methods, Statement of Cancer Relevance, and References (not included in page limits). Preliminary data are encouraged, but not required, and appendices will not be accepted.
5. NIH biosketch for each investigator. (See updated biosketch form page attached.)
6. Other Support information for each investigator.
7. The federal *Detailed Budget for Initial Budget Period Direct Costs Only* form (see Form Page 4 attachment), along with a detailed budget justification.
8. *ACS applications only* – Complete the attached Biographical Information form and include in the PDF.
9. *ACS applications only* – Documentation of valid U.S. work visa status, if applicable.

Other Guidelines:

1. Investigators are limited to a total of two applications, with no more than one application as PI. (One PI and one Co-PI, or two Co-PI applications, maximum.)
2. Prior approval of IRB and/or IACUC protocols is not necessary; however, it is expected that IRB or IACUC protocols will be submitted so approval is imminent at the anticipated start date.
3. Travel is allowed only for recruitment and data collection, and it must be clearly justified.
4. All requests for equipment must be **strongly** justified, and all computer purchases must be justified in the original budget.
5. Requests for faculty salaries are not allowed.
6. Kenneth Cowan, MD, PhD, Director of the Fred & Pamela Buffett Cancer Center, cannot serve as a co-investigator on any project. *Associate Directors and Program Leaders of the Cancer Center may serve as the PI or the Co-PI of a project.*

Formatting Requirements

- Font: Arial; Type size: 11-point; Type color: Black.
- Minimum of 0.5-inch margins on all sides.
- Single-spaced text.
- Space between paragraphs is strongly encouraged.

If you have any questions about this RFA, please contact Tony Hollingsworth by email (mahollin@unmc.edu) or phone (402.559.8343).

BIOGRAPHICAL SKETCH

Provide the following information for the Senior/key personnel and other significant contributors.
Follow this format for each person. **DO NOT EXCEED FIVE PAGES.**

NAME:

eRA COMMONS USER NAME (credential, e.g., agency login):

POSITION TITLE:

EDUCATION/TRAINING *(Begin with baccalaureate or other initial professional education, such as nursing, include postdoctoral training and residency training if applicable. Add/delete rows as necessary.)*

INSTITUTION AND LOCATION	DEGREE *(if applicable)*	Completion Date MM/YYYY	FIELD OF STUDY

A. Personal Statement

B. Positions and Honors

C. Contributions to Science

D. Additional Information: Research Support and/or Scholastic Performance

Program Director/Principal Investigator (Last, First, Middle):

DETAILED BUDGET FOR INITIAL BUDGET PERIOD DIRECT COSTS ONLY	FROM	THROUGH

List PERSONNEL *(Applicant organization only)*
Use Cal, Acad, or Summer to Enter Months Devoted to Project
Enter Dollar Amounts Requested *(omit cents)* for Salary Requested and Fringe Benefits

NAME	ROLE ON PROJECT	Cal. Mnths	Acad. Mnths	Summer Mnths	INST.BASE SALARY	SALARY REQUESTED	FRINGE BENEFITS	TOTAL
	PD/PI							
SUBTOTALS →								

CONSULTANT COSTS	
EQUIPMENT *(Itemize)*	
SUPPLIES *(Itemize by category)*	
TRAVEL	
INPATIENT CARE COSTS	
OUTPATIENT CARE COSTS	
ALTERATIONS AND RENOVATIONS *(Itemize by category)*	
OTHER EXPENSES *(Itemize by category)*	

CONSORTIUM/CONTRACTUAL COSTS	DIRECT COSTS	
SUBTOTAL DIRECT COSTS FOR INITIAL BUDGET PERIOD *(Item 7a, Face Page)*		**$**
CONSORTIUM/CONTRACTUAL COSTS	FACILITIES AND ADMINISTRATIVE COSTS	
TOTAL DIRECT COSTS FOR INITIAL BUDGET PERIOD		**$**

Application for a Seed Grant
American Cancer Society Fred & Pamela Buffett Cancer Center
Institutional Research Grant # IRG-13-041-01

BIOGRAPHICAL INFORMATION

Name (first and last):

Degree(s):

Academic Title

Department

School/College

Citizenship Status

- ☐ U.S. citizen, noncitizen national, or permanent resident.
- ☐ Holder of U.S. work visa valid through the proposed project period. *(Attach documentation of visa status.)*

Year last degree conferred: **Year of first independent position:**

Verification of Applicant Eligibility by Department Chair *(Applicants must be within six years of their first independent research or faculty appointment, must be salaried faculty with appropriate committed research facilities, and may not have competitive national funding active at the start date of the proposed IRG allocation.)*

Name of Department Chair

Signature **Date:**

Applicant Mentor (*Successful candidates will identify and work closely with an appropriate institutional mentor.)*

Name of Mentor

Signature **Date:**

How did you hear about this program?

- Fred & Pamela Buffett Cancer Center Email [ ]
- Fred & Pamela Buffett Cancer Center Website [ ]
- UNMC Today [ ]
- Other (please specify) _____