

The Medical Staff Pharmacy & Therapeutics (P&T) and Executive Committees recently approved a physician-directed, pharmacist-managed Renal Dosage Adjustment Protocol for Antimicrobials. The Protocol establishes evidence-based standards for the dosing of antimicrobials in patients with renal insufficiency at The Nebraska Medical Center. This protocol will allow pharmacists to automatically adjust antimicrobial dosing for renal insufficiency. The physician-directed, pharmacist-managed protocol will be included in the clinical protocol section of the Organization Policies and Procedures. **The Protocol will be implemented on June 28, 2006.**

The pharmacists will automatically adjust the doses of any of the antimicrobials included in the protocol according to the estimated creatinine clearance, using the Cockcroft-Gault equation for patients ≥ 18 years old, and the Schwartz equation for patients < 18 years old. This protocol does not include the neonatal population. The pharmacist will write a new order in the Orders section of the medical record indicating the new dosage "per protocol." The pharmacist will enter the order into Carecast as a protocol order (use "p" for protocol rather than "w", "v", or "t" for written, verbal, telephone, respectively). This will trigger an alert to be sent in Carecast to the ordering physician to inform him/her that a change has been made for a particular drug according to protocol. No physician signature will be required to authorize the revised dosing order.

The adjustments listed in the dosing guidelines will be made unless the physician writes "Do not adjust" when ordering the antimicrobial, with the exception of vancomycin, amikacin, gentamicin, and tobramycin. A pharmacokinetic consult will be performed by the pharmacist for these drugs, and the ordering physician will be contacted for dosage changes unless ordered as "pharmacy to dose." If there are no clear recommendations available in the protocol for renal adjustments, the pharmacist will consult with the physician before making any dosage changes.

This protocol was reviewed by the Antimicrobial Subcommittee and various members of infectious diseases, nephrology, and pharmacy. The protocol was approved by P&T and Medical Executive Committees.