

## Appendix 1. Hypothesized predictors of vancomycin-associated nephrotoxicity

### 1. Demographic characteristics

- Age
- Sex
- Clinical area (e.g., intensive care unit, medicine, surgery)
- Comorbidities
  - Diabetes mellitus
  - Hypertension
  - Chronic kidney disease
  - Baseline serum creatinine
- Admitting diagnosis
  - Acute renal failure
  - Sepsis
  - Infectious diagnosis

### 2. Nephrotoxins

#### i) Medications known to cause acute renal injury (excluding allergic intrinsic nephritis)<sup>14</sup>

- |                   |                                     |
|-------------------|-------------------------------------|
| • Acyclovir       | • Mannitol                          |
| • Aminoglycosides | • Mitomycin                         |
| • Amphotericin B* | • Nonsteroidal anti-inflammatories* |
| • Cisplatin       | • Penicillamine                     |
| • Clopidogrel     | • Pentamidine                       |
| • Colistimethate  | • Radiocontrast Dye                 |
| • Cyclosporine*   | • Sucrose                           |
| • Foscarnet       | • Sulfamethoxazole/trimethoprim     |
| • Gold            | • Streptozocin                      |
| • Ifosfamide      | • Tacrolimus*                       |
| • Indinavir       | • Ticlopidine                       |
| • Interleukin-2*  | • Triamterine                       |
| • Lithium         |                                     |

*\*Medications also known to cause pre-renal dysfunction*

#### ii) Medications known to cause pre-renal dysfunction (i.e., reduces volume and/or pressure of blood reaching the kidney)<sup>14</sup>

- Angiotensin-converting enzyme inhibitors (ACEI)
- Angiotensin receptor blockers (ARBs)
- Diuretics
- Interferon
- Cyclo-oxygenase 2 inhibitors
- Additional medications as listed and flagged with an asterisk in previous section

Supplementary material for Contreiras C, Legal M, Lau TYL, Thalakada R, Shalansky S, Ensom MHH. Identification of risk factors for nephrotoxicity in patients receiving extended-duration, high-trough vancomycin therapy. *Can J Hosp Pharm.* 2014; 67(2):126-32.