Prisoners need education on the appropriate use of topical antibiotic products, according to a study released today at the 39th Annual Educational Conference and International Meeting of the Association for Professionals in Infection Control and Epidemiology (APIC).

The first study to report on the widespread misuse of topical antibiotics among inmates entering correctional facilities found that, among inmates who reported having used topical antibiotics during the previous six months, 59 percent of male and 40 percent of female maximum-security prison inmates are using over-the-counter ointments, such as Bacitracin, on dry skin and lips, to grease their hair, and for shaving.

Funded by the National Institute of Allergy and Infectious Diseases*, a team of public health researchers at Columbia University conducted a study of self-reported use of oral and topical antibiotics by inmates upon entry to two maximum-security prisons, one male and one female, in New York State. Carolyn Herzig, MS, PhD candidate, and the research team interviewed 822 inmates (421 men and 401 women) over a two-year period.

Of those who reported using topical antibiotics inappropriately, the products were used in the following ways:

- For dry skin: 29 percent of men and 28 percent of women
- As lip balm: 18 percent of men and 15 percent of women
- As hair grease: 8 percent of men and 3 percent of women
- For shaving: 6 percent of men

"Alternative products, such as lotion and ointments that do not contain antibiotics, are available to inmates, so this comes down to more awareness and better education for this group of people," said Herzig. "Antimicrobial-resistant pathogens are a problem in prisons, and the misuse of antibiotics in these facilities might exacerbate this issue."

Misuse and overuse of antibiotics can lead to antimicrobial resistance resulting in the emergence of multidrug-resistant organisms (MDROs), such as methicillin-resistant Staphylococcus aureus (MRSA). MDROs cause a significant proportion of serious healthcare-associated infections and are more difficult to treat because there are fewer and, in some cases, no antibiotics that will cure the infection.

APIC and the Society for Healthcare Epidemiology of America recently issued a position paper on the importance of infection prevention professionals known as infection preventionists and healthcare epidemiologists in effective antimicrobial stewardship programs. These programs help preserve the effectiveness of antibiotics.

"Antimicrobial resistance is a growing public health concern both inside and outside of healthcare settings," said Michelle Farber, RN, CIC, APIC 2012 president. "Ms. Herzig's research highlights the need for education of all audiences about the prudent use of antibiotics, since multidrug-resistant organisms pose significant risk to patient safety in many different settings, including correctional facilities."

Provided by Association for Professionals in Infection Control