

## CLINICAL//TRANSLATIONAL

### **PUBLIC HEALTH STUDY AIMS to INCREASE HPV VACCINATIONS**

Too often, cultural, educational and demographic barriers hamper the public's use of vaccines. Among the most prominent examples is the human papillomavirus vaccine (HPV): roughly half of U.S. adolescents are not vaccinated and remain vulnerable to the virus and the cancers it causes.

"You'd have a hard time finding a parent who doesn't want to protect their child from cancer," observes **Amy Leader, DrPH, MPH**, associate professor of population science.

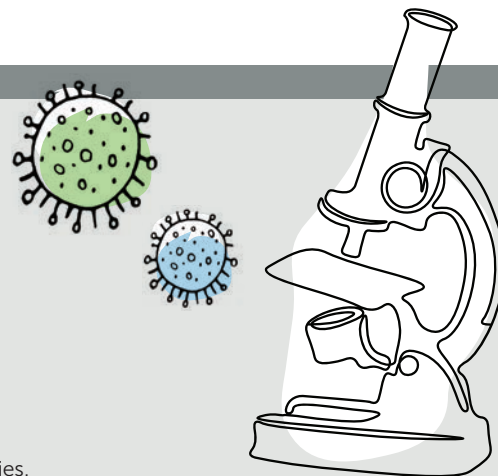
"Still, many parents are missing an opportunity to protect their children from HPV, the most common sexually transmitted infection and a leading cause of cancers."

Dr. Leader is deeply engaged in developing and studying new approaches to increase HPV vaccination rates among high-risk populations. She and her colleagues recently completed an NIH-funded study on strategies to increase HPV vaccination rates among vulnerable populations in the Philadelphia region.

The study had three aims. The first sought to identify barriers to HPV vaccination in Hispanic and African immigrant communities. The researchers found that, despite a high level of awareness of the HPV vaccine among the broader Philadelphia-area population, members of marginalized communities had much lower awareness of the vaccine's availability and effectiveness, and received far less information through media, community and public health channels.

The second aim used citywide vaccination records and data on social determinants of health to identify novel predictors of HPV vaccination; initial analyses suggest several predictors, including neighborhood-level economic stability.

The project's final aim sought to better understand the content and nature of public discourse about HPV vaccination on social media channels. The team found that anti-vaccine messaging was delivered most



often—and very effectively—through narrative communication (in other words, storytelling). In contrast, pro-vaccine messaging tended to be built around objective data, which was less compelling to many audiences.

"The data suggests that public health messaging needs to be more engaging, more focused on telling people's stories than on conveying nuts-and-bolts facts," Leader notes. To test that hypothesis, she and her colleagues are undertaking an NIH-funded randomized controlled trial that uses Twitter to communicate either science-based content or narrative messages that prompt feelings of empathy, transportation, and identification. Subsequently, they will then track the rates of adolescent HPV vaccination. ■