## Characterizing rates of gonorrhea infection at a RI STI clinic: Longitudinal trends by demographics and sexual behavior

### 2022 Lifespan Research Day Abstract

**Research Category:** Clinical & Translational

Primary Research Location: Miriam Hospital HIV STI Clinic

Funded By: P20GM121344 (pilot)

Authors(s):

Sara E Vargas, Assistant Professor, The Miriam Hospital, Brown University. Dept of Psychiatry & Human Behavior

Alexi Almonte, Staff, The Miriam Hospital. Dept of Infectious Disease

Philip A Chan, MD, Associate Professor, The Miriam Hospital, Brown University. Dept of Medicine

Δ	bstra	ct
$\overline{}$	บอแต	ıvı

# Background & Aim:

Gonorrhea is the second most commonly diagnosed sexually transmitted infection (STI) in the United States. Annual incidence of gonococcal infection (GC) has increased across the country, including a 400+% increase in Rhode Island from 2010 to 2019.

The Miriam Hospital HIV STI Clinic collected demographic and sexual behavior data at all clinical encounters from 2012–2021.

#### **Methods:**

**Results:** 

Overall, 52% of 19,429 encounters were young adults (18–29 years old). Of those that reported demographics: 53% White, 22% Black, and 28% Latinx and 75% identified male gender. Of those who had results of lab tests for urogenital, rectal, or oral GC infection, 1,065 were positive at one or more sites and the annual percent of positive cases increased over time from 2014 to 2021. Among those positive for GC, 58% were young adults. Of those that reported: 52% White, 21% black, and 25% Latinx. Consistent with national trends, 90% of those who were GC positive identified as male and 60% were men who have sex with men. Annual rates show slight trends over time toward more positive cases among those who identify as female and among those who identify as men who have sex with women. Most who tested positive for GC had 2–5 (45%) or 6 or more (46%) sexual partners in the past 12 months; 53% had a prior STI ever and 32% had a prior STI within the past year. Of those who reported, 9% had a prior positive HIV test, 25% had taken pre—exposure prophylaxis (PrEP), 4% had exchanged sex in the past year, 7% have sex with someone who had exchanged sex in the past year, and 57% had

### **Conclusion:**

past year.

Research supported by the COBRE Center for Antimicrobial Resistance and Therapeutic Discovery is continuing to examine these trends and antimicrobial resistance among GC infections in RI.

sex with anonymous partner. Of those who reported (n=356) about half (48%) had met partners online in the

Clinical Understandin Implications: transmission.

Understanding trends in GC infection rates is critical to developing public health approaches to prevent transmission