PrEP: Getting to the Tipping Point

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Continuing Medical Education Disclosure

- **Program Faculty**: Harvey Makadon, M.D.
- **Current Position**: Director, Division of Education and Training, The Fenway Institute
- **Disclosure**: No relevant financial relationships. Presentation does not include discussion of off-label products.

This Live activity, Preventing HIV with One Pill a Day: Using PrEP in Clinical Practice, with a beginning date of 04/15/2016, has been reviewed and is acceptable for up to 3.75 Prescribed credit(s) by the American Academy of Family Physicians. Physicians should claim only the credit commensurate with the extent of their participation in the activity.
PrEP: The Basics

- PrEP refers to the use of antiretroviral medication by HIV-uninfected people for the purpose of preventing HIV infection.
- Once daily, oral tenofovir-emtricitabine is the only medication currently FDA-approved for PrEP.
- CDC and WHO both recommend PrEP for individuals with a high risk of HIV infection.
PrEP scale up has been slow in the United States

2010 – Publication of first 2 studies supporting PrEP

2012 – PrEP approved by the FDA

2014 – 3,253 people have started PrEP

2015 – ~22,000 people on PrEP

HIV Diagnoses by Transmission Category, United States: 2014

- Male-to-Male Sexual Contact (MSM): 67%
- Heterosexual Contact: 25%
- Injection Drug Use (IDU): 6%
- MSM/IDU: 3%
- Other: <1%


www.lgbthealtheducation.org
HIV Diagnoses among MSM age 13-24 by Race/Ethnicity, 2005-2014

Source: Centers for Disease Control and Prevention

www.lgbthealtheducation.org
Rate of New HIV Cases by Age and Race/Ethnicity at Diagnosis (2014)

Rate per 100,000 Population

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There are approximately 50,000 new HIV diagnoses each year in the US.

Incidence among MSM and MSM/IDU increased 15% from 2008 to 2011. Young black MSM accounted for more than half of new infections among MSM aged 13-24 over this time.
Why is HIV incidence highest among black MSM?

- Sexual risk behaviors and substance use do not explain the differences in HIV infection between black and white MSM.

- The most likely causes of disproportionate HIV infection rates are:
  - Barriers to access health care
  - Low frequency of recent HIV testing
  - Delayed treatment of STIs which facilitate HIV transmission
  - High HIV prevalence in black MSM networks, especially among those who identify as gay.
Transgender Women are also at High Risk

- Estimated HIV prevalence in transgender women
  - 28% in US
  - 56% in African-Americans
  - 18-22% worldwide
- Transgender women are nearly 49 times more likely to have HIV than other adults of reproductive age
- Risk factors for HIV include
  - Social and economic marginalization
  - High unemployment, engaging in sex work
  - Limited health care access
  - Lack of familial support

Baral, 2013; Herbst, 2008; Schulden, 2008
Providers Report Barriers to Uptake

- Difficult to determine eligibility
- Adherence concerns
- Risk compensation concerns, e.g. more unprotected sex
- Possible side effects
- Uncertain about insurance coverage
- Implementation concerns – how to fit PrEP into clinical practice

Adapted from slide by Sarah Calabrese. (Adams et al. 2015; Blumenthal et al., 2015; Karris et al., 2014; Krakower et al., 2014; Mullins et al., 2015; Sharma et al., 2014)
Basic Steps to Improve HIV Prevention in Clinical Settings

Universal HIV Screening

HIV Positive
- HIV care / antiretroviral therapy / Counseling / Adherence

HIV Negative
- Safer sex
- Address STIs
- PEP or PrEP
- Counseling / Adherence

Reduce HIV Incidence

(USPSTF, 2013 and CDC, 2010)
The Tipping Point

A tipping point is the moment when the momentum for change becomes unstoppable.....