

Consultation on Global Trends of HIV Drug Resistance

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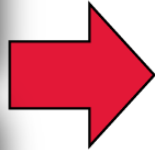
Infectious Diseases

National Institutes of Health

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**SMART Study:
Benefit of
Continuous
Treatment**

**START Study:
Benefit of Early
Treatment**

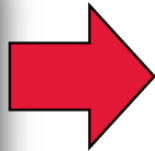


**Individual
Health
Benefit**



**Treatment for all
HIV-infected
individuals**

**HPTN 052:
Treatment as
Prevention**



**Public
Health
Benefit**



Era of Universal Treatment for HIV

GUIDELINES

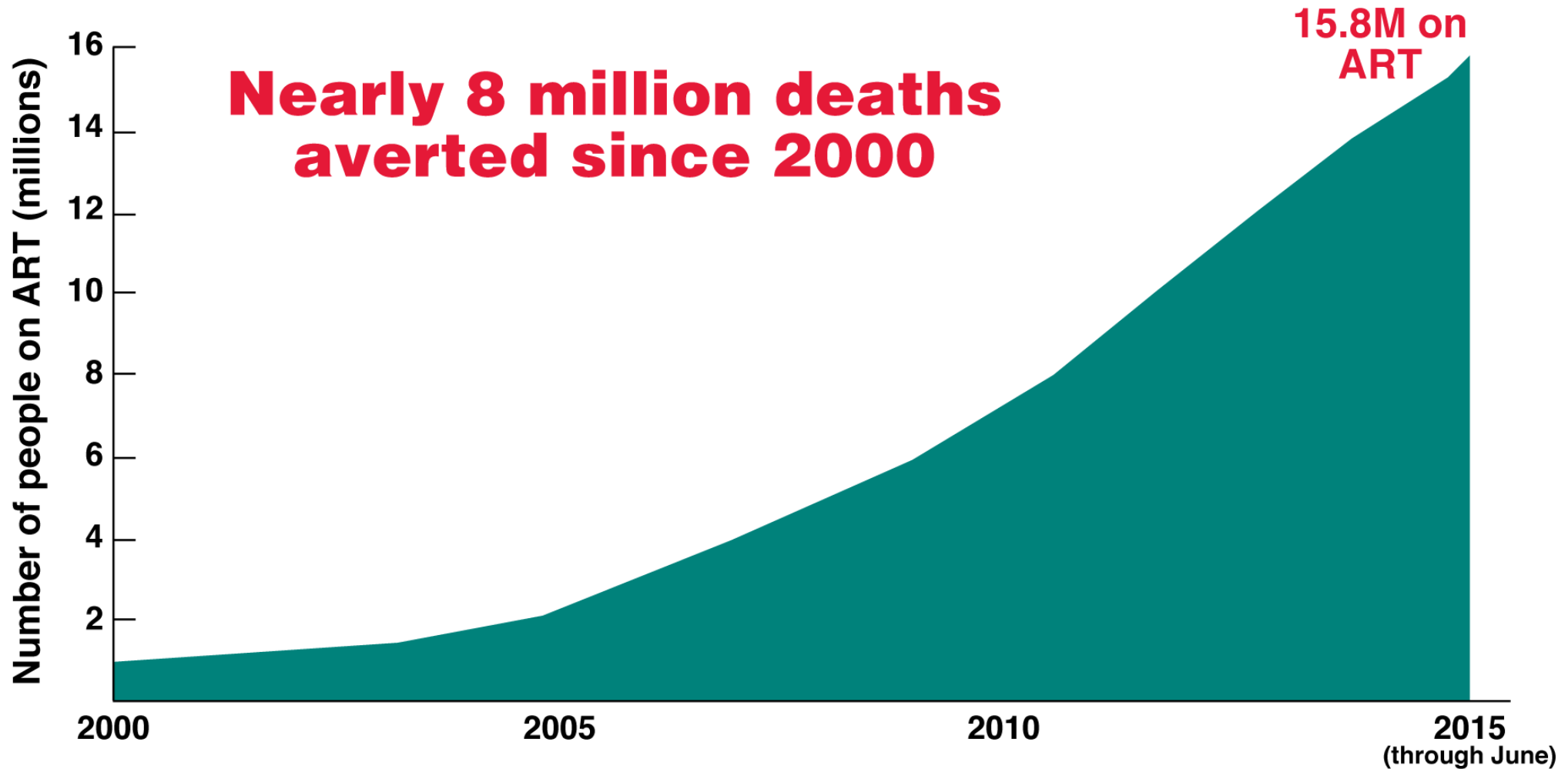
**GUIDELINE ON WHEN
TO START ANTIRETROVIRAL
THERAPY AND
ON PRE-EXPOSURE
PROPHYLAXIS FOR HIV**

SEPTEMBER 2015



**World Health Organization:
“antiretroviral
therapy (ART)
should be initiated
in everyone living
with HIV at any
CD4 cell count”**

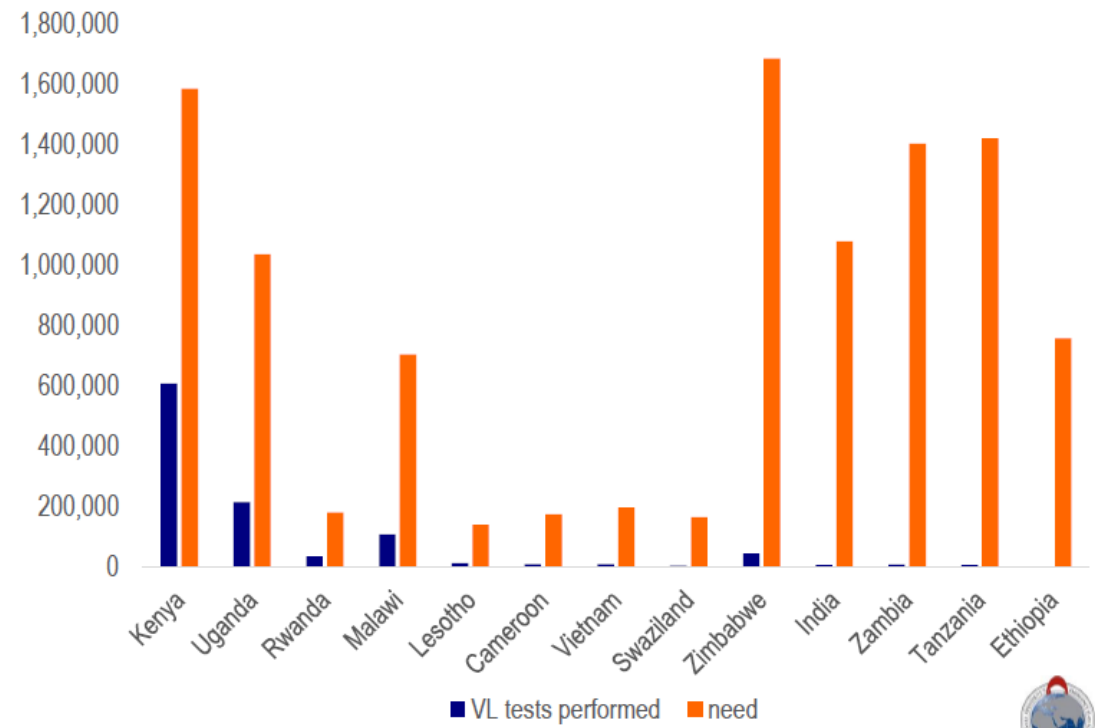
Number of HIV-Infected People Globally Receiving Antiretroviral Therapy (ART), 2000-6/2015



HIV Treatment in Low and Middle Income Countries (LMIC)

- **ART switch based on clinical and immunologic failure rather than viral load**
- **Insensitive for detecting virological failure**
- **Leads to accumulation of resistance mutations**

Actual Viral Load Tests versus Need 2015



Source: PEPFAR, 2015

What are the critical questions about HIVDR that need to be addressed?

Critical Questions to Be Addressed in Meeting Sessions

- **Current state of HIVDR monitoring in LMIC?**
 - **What do we know and what do we need to know?**
 - **What and where are the current data gaps?**
- **Do the new integrase-based drug regimens alter the concerns about HIVDR?**
- **What new technologies should be applied to HIVDR testing?**
- **What are the essential knowledge gaps in HIVDR virology?**
 - **Clade differences?**
- **How can we effectively address the implementation gaps in HIVDR testing?**
- **How can we leverage resources within existing networks for HIVDR testing?**