



# Meeting at the Crossroads of HIV and Aging

Lenny Alberts, MD.  
Lecturer, UMass/Boston  
President, New England Association  
on HIV Over Fifty (NEAHOF)

Lisa Krinsky, LICSW  
Director, LGBT Aging Project  
Fenway Health

Do not regret growing older.  
It is a privilege denied to many.  
Author unknown

J Currier, AIDS 2012, 7.27.2012



# Leonard Alberts, MD

- Disclosures: none
- Acknowledgements:
  - Renslow Sherer Jr., MD, University of Chicago
  - AIDSVu: <https://aidsvu.org>
  - [USCDC:  
HIV Among People Aged 50 and Over | Age | HIV by Group ...https://www.cdc.gov › group  
› age › olderamericans](https://www.cdc.gov/group/age/olderamericans)

# Lisa Krinsky, LICSW

- Disclosures: none

# People Aged 55 and Older with HIV in the 50 States and the District of Columbia



At the end of 2018, an estimated **1.2 MILLION AMERICANS** had HIV. Of those, 379,000 were aged 55 and older.

**9 in 10**  
people aged 55 and older knew they had the virus.

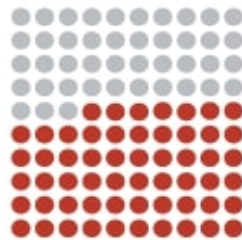


It is important for people aged 50 and older to know their HIV status so they can take medicine to treat HIV if they have the virus. Taking HIV medicine every day can make the viral load undetectable. People who get and keep an undetectable viral load (or stay virally suppressed) can live a long and healthy life. They also have effectively no risk of transmitting HIV to HIV-negative sex partners.

Compared to all people with HIV, people aged 55 and older have higher viral suppression rates. In 2018, for every **100 people aged 55 and older with HIV**:



**71**  
received  
some  
HIV care



**57**  
were  
retained  
in care \*



**64**  
were virally  
suppressed †

For comparison, for every **100 people overall** with HIV,  
**65 received some HIV care**, **50 were retained in care**, and **56 were virally suppressed**.

\* Had 2 viral load or CD4 tests at least 3 months apart in a year.

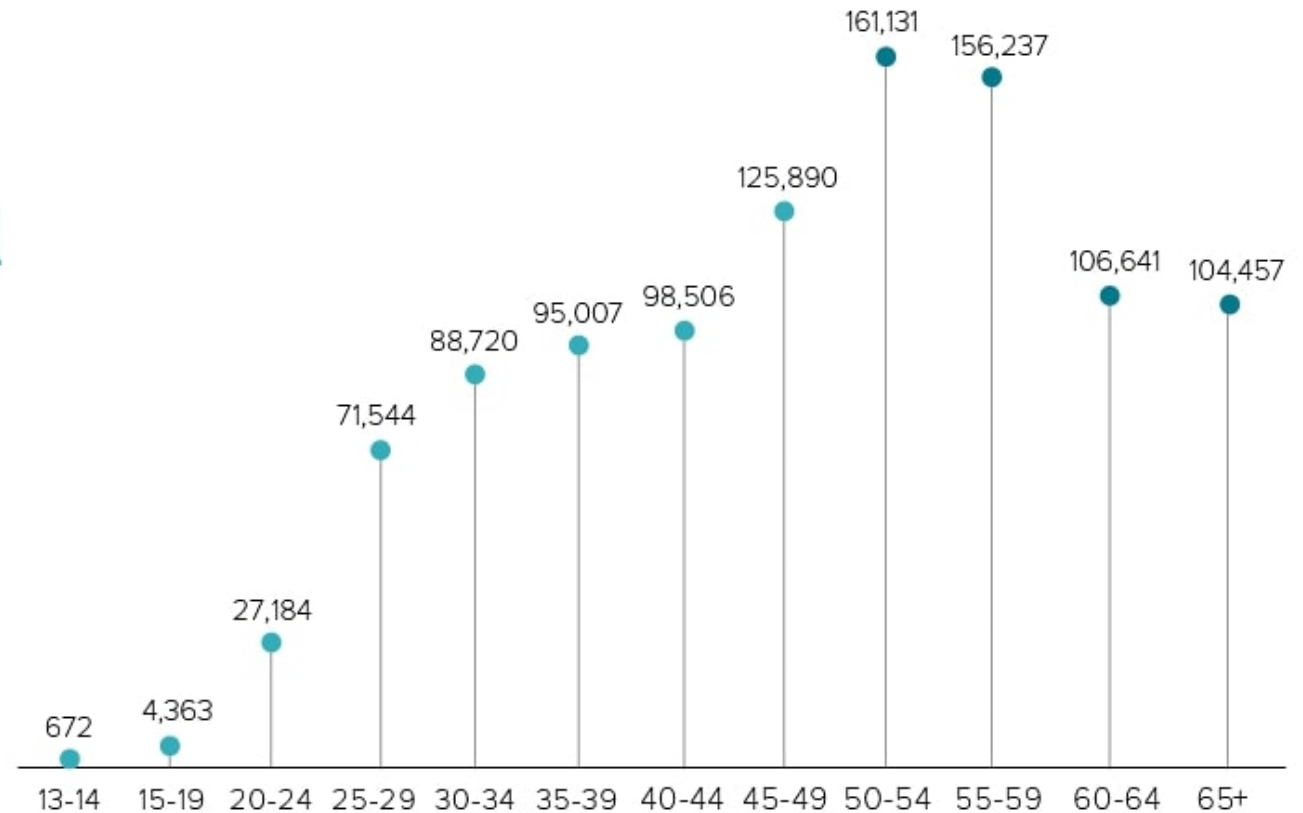
† Based on most recent viral load test.

Source: CDC. Estimated HIV incidence and prevalence in the United States 2014–2018. *HIV Surveillance Supplemental Report*. 2018;25(1).

Source: CDC. Selected national HIV prevention and care outcomes (slides).

# Adults and Adolescents with Diagnosed HIV in the US and Dependent Areas by Age, 2018

**Over half of people with  
diagnosed HIV were aged  
50 and older.**

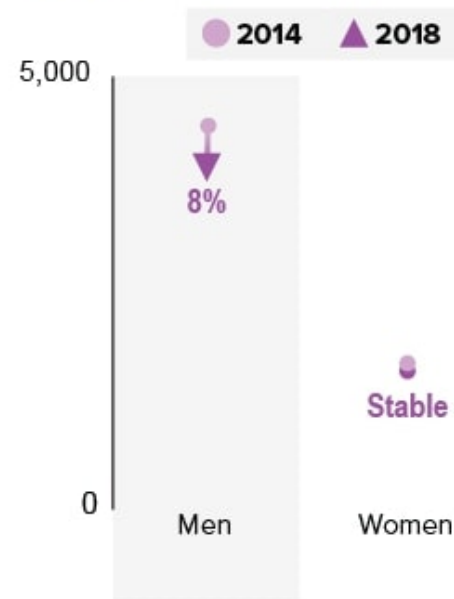


Source: CDC. Diagnoses of HIV infection in the United States and dependent areas, 2018 (updated). *HIV Surveillance Report* 2020;31.

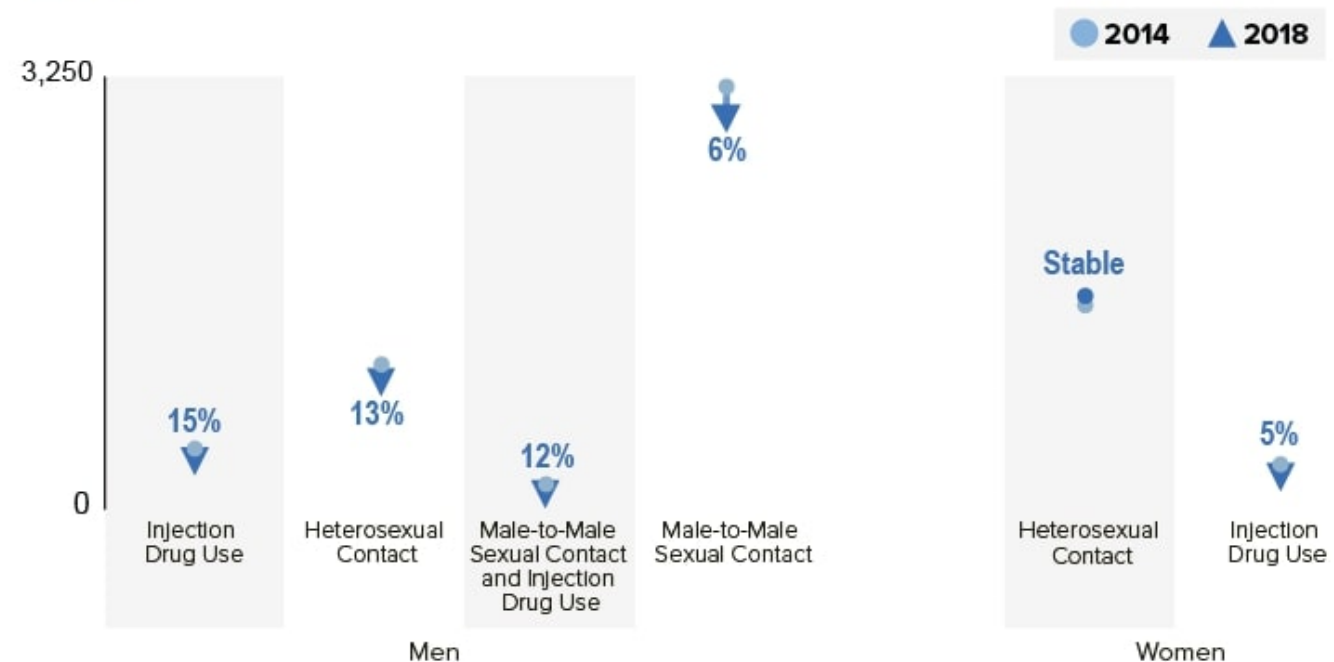
# HIV Diagnoses Among People Aged 50 and Older in the US and Dependent Areas, 2014-2018\*



## Trends by Sex



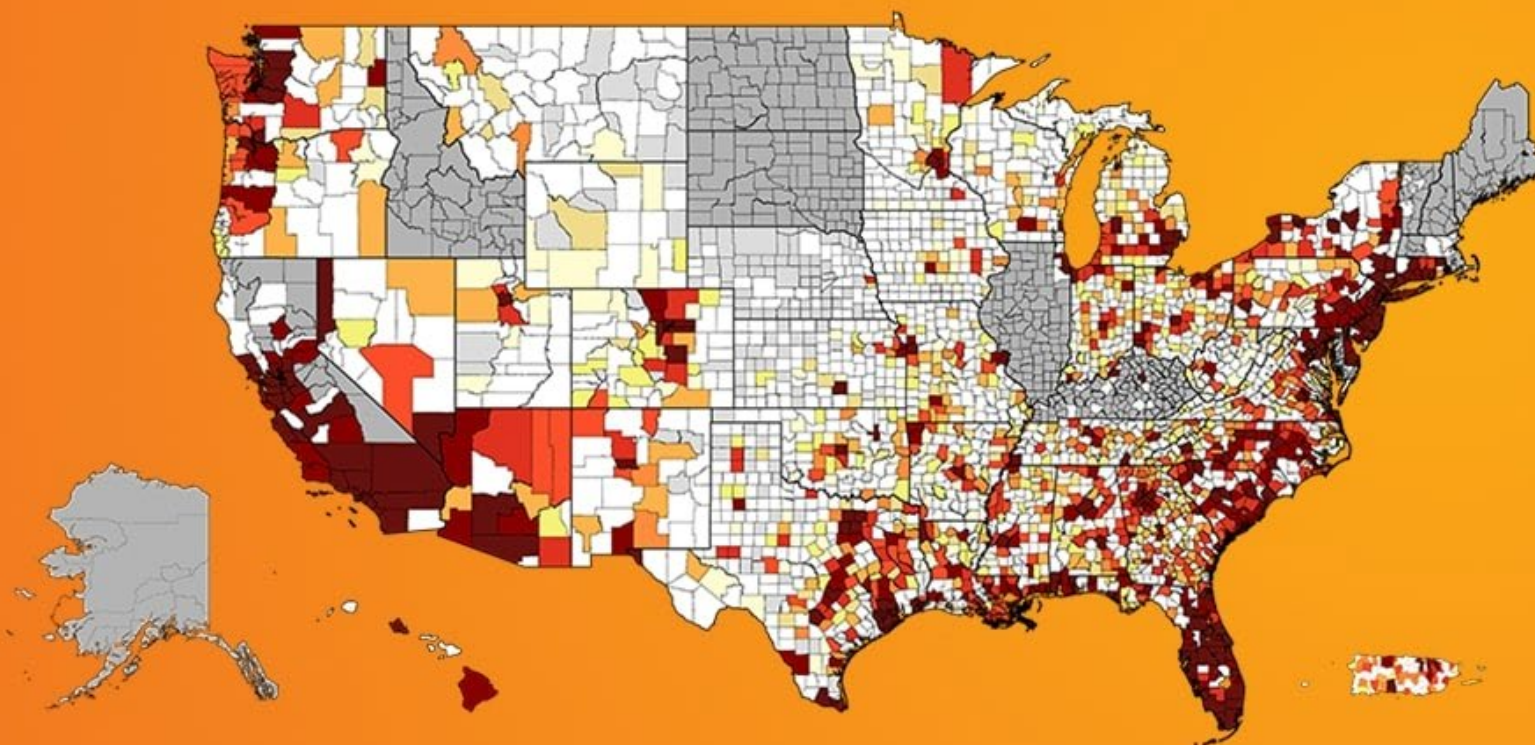
## Trends by Transmission Category



\* Based on sex at birth and includes transgender people.

Source: CDC. Diagnoses of HIV infection in the United States and dependent areas, 2018 (updated). *HIV Surveillance Report* 2020;31.

In 2018, there were **367,055** people aged **55 and over** living with HIV.  
This represents **35%** of all people living with HIV in the U.S.



Number of persons, aged 55+, living with HIV per 100,000, 2018

5 - 6

7 - 8

9 - 10

11 - 14

15 - 20

21 - 28

29 - 44

45 - 84

85 - 238

239+

AIDSVu.ORG

SOURCE: AIDSVu

AIDSVu 

2030 Ending the HIV Epidemic goal **95%**

Aged 13-24

60%

Aged 25 - 34

61%

Aged 35-44

62%

Aged 45-54

66%

Aged 55+

67%

67% of people  
living with HIV

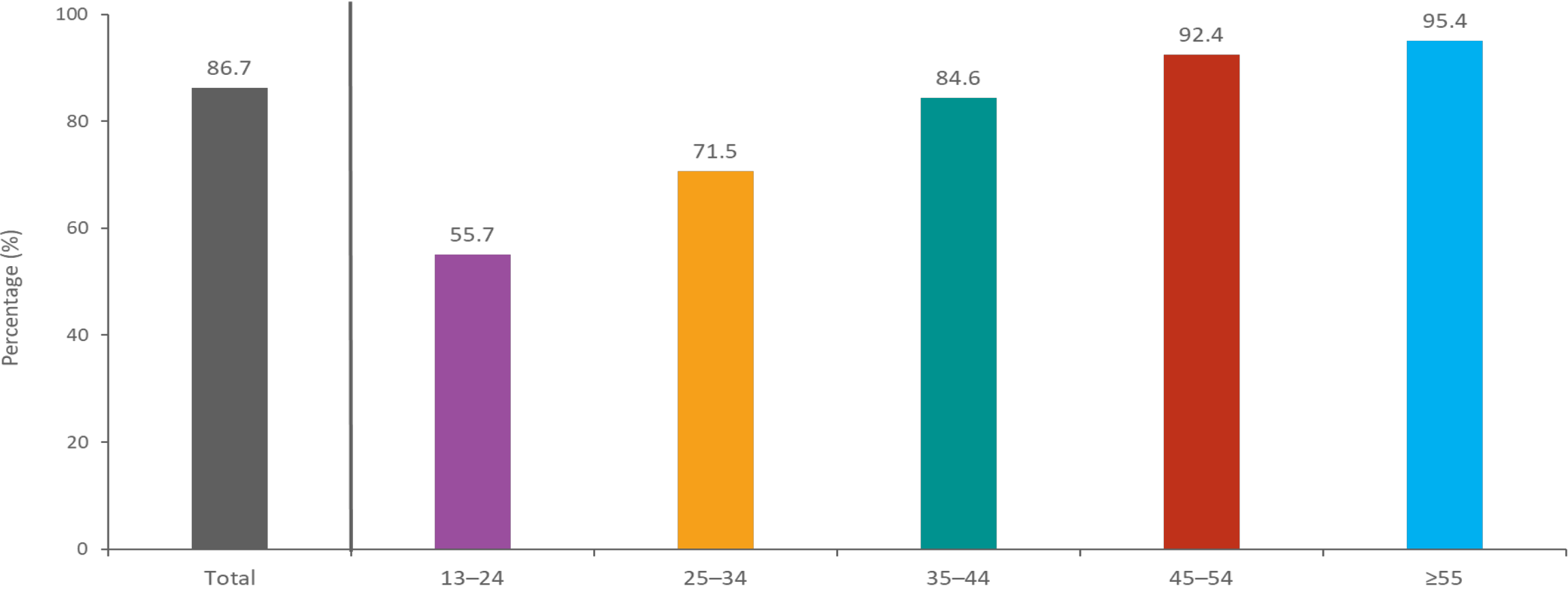
**55 and older**

were **virally  
suppressed** in  
2018 – the **highest**  
percentage of any  
age group.

0 10% 20% 30% 40% 50% 60% 70% 80% 90% 100%

Viral suppression by age, 2018

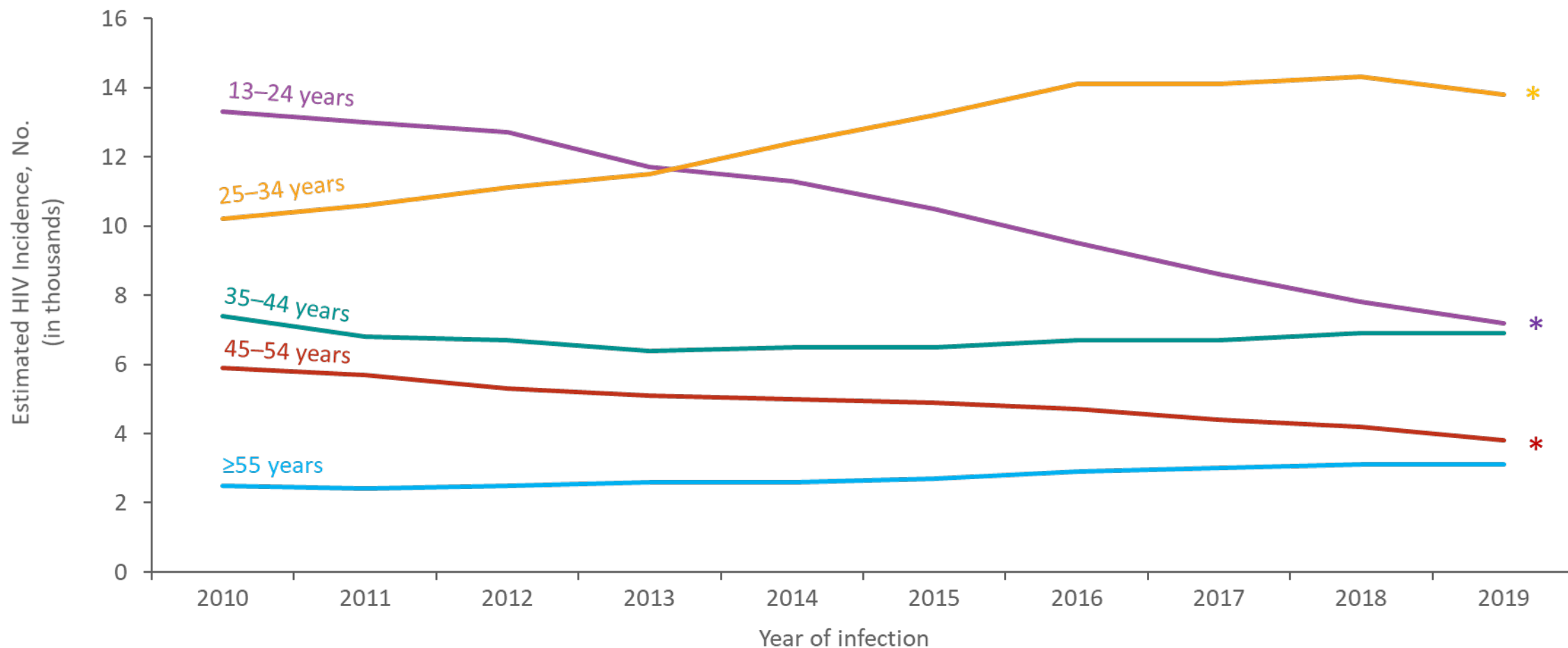
# Diagnosed Infection among Persons Aged ≥13 Years Living with Diagnosed or Undiagnosed HIV Infection, by Age, 2019—United States



Note. Estimates were derived from a CD4 depletion model using HIV surveillance data. Estimates for the year 2019 are preliminary and based on deaths reported to CDC through December 2020.



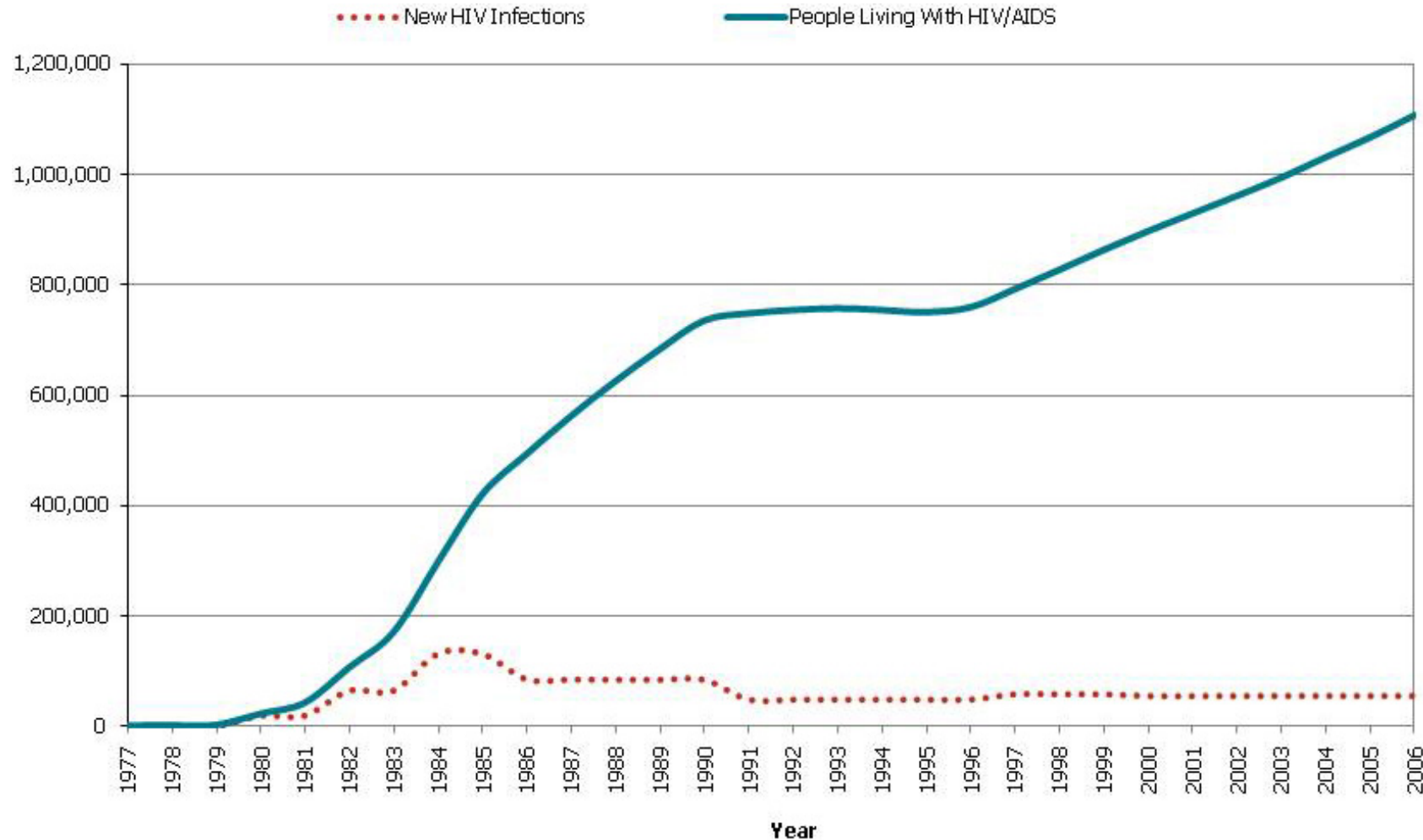
# Estimated HIV Incidence among Persons Aged ≥13 Years, by Age 2010–2019—United States



Note. Estimates were derived from a CD4 depletion model using HIV surveillance data.

\* Difference from the 2010 estimate was deemed statistically significant ( $P < .05$ ).

# More people living with HIV infection every year in the U.S.



CDC surveillance data

Each year: 56K new infections-18K deaths=38K\*

# III. Comorbid Conditions: Aging and Chronic HIV



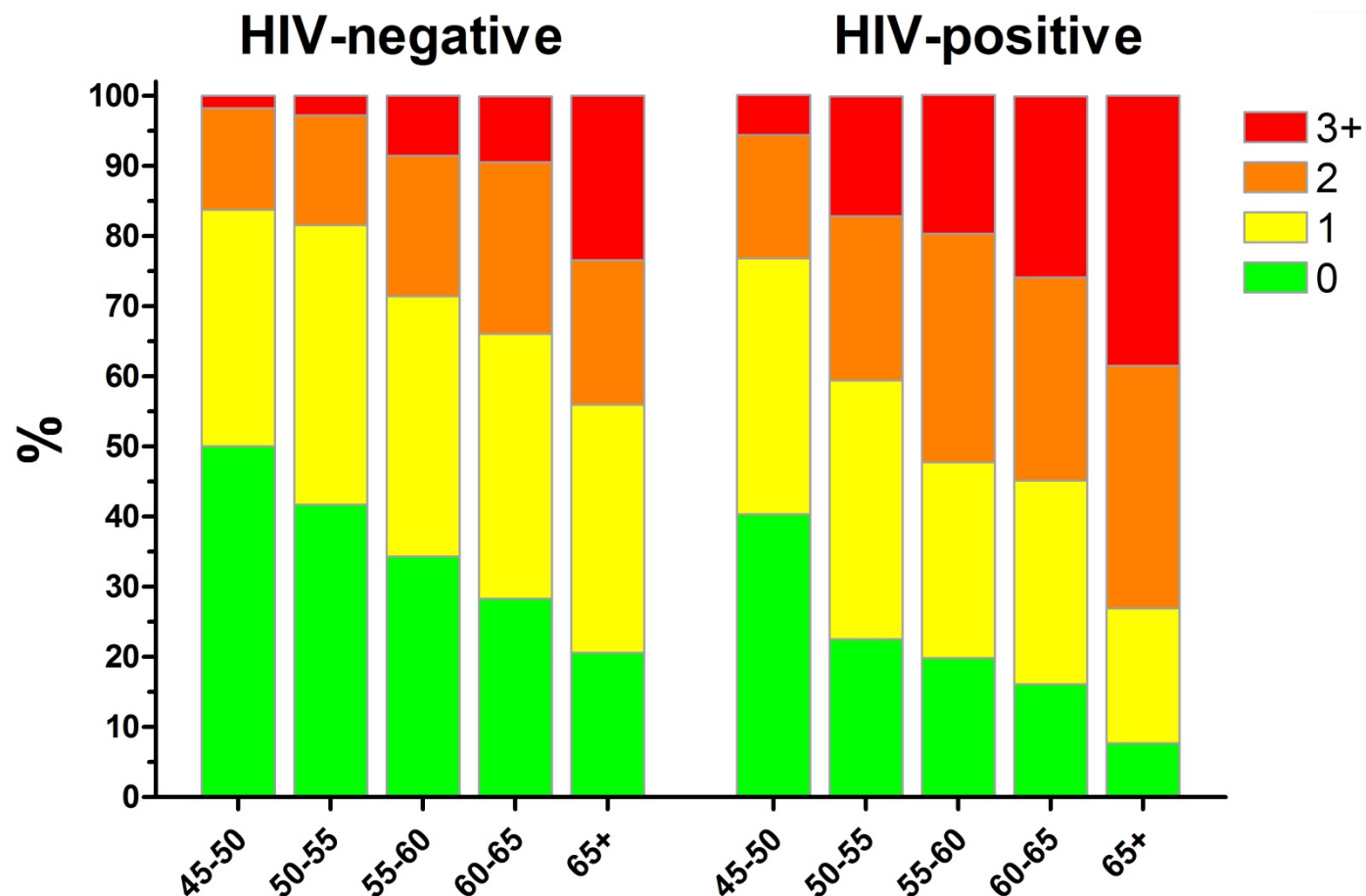
# Many age-associated morbidities increased in treated HIV

- **Cardiovascular disease** <sup>[1-3]</sup>
- **Cancer (non-AIDS)** <sup>[4]</sup>
- **Bone fractures / osteoporosis** <sup>[5,6]</sup>
- **COPD** <sup>[12]</sup>
- **Liver disease** <sup>[7]</sup>
- **Kidney disease** <sup>[8]</sup>
- **Cognitive decline** <sup>[9]</sup>
- **Non-AIDS infections** <sup>[10]</sup>
- **Intermediate-Stage Macular Degeneration**<sup>[13]</sup>
- **Frailty** <sup>[11]</sup>

Peter Hunt. ACTHIV 2018.

1. Freiberg, M., et al. JAMA Int Med. 2013;173(8):614-22. 2; Tseng, Z, et al. JACC. 2012;59(21):1891-6. 3. Grinspoon SK, et al. Circulation. 2008;118:198-210. 4. Silverberg, M., et al. AIDS, 2009;23(17):2337-45. 5. Triant V, et al. J Clin Endocrinol Metab. 2008;93:3499-3504. 6. Arnsten JH, et al. AIDS. 2007 ;21:617-623. 7. Odden MC, et al. Arch Intern Med. 2007;167:2213-2219. 8. Choi A, et al. AIDS, 2009;23(16):2143-49. 9. McCutchan JA, et al. AIDS. 2007 ;21:1109-1117. 10. Sogaard, CID, 2008; 47(10): 1345-53. 11. Desquilbet L, et al. J Gerontol A Biol Sci Med Sci. 2007;62:1279-1286; <sup>12</sup> Attia, Chest,2014; <sup>13</sup> Jabs, Am J Ophthal, 2015

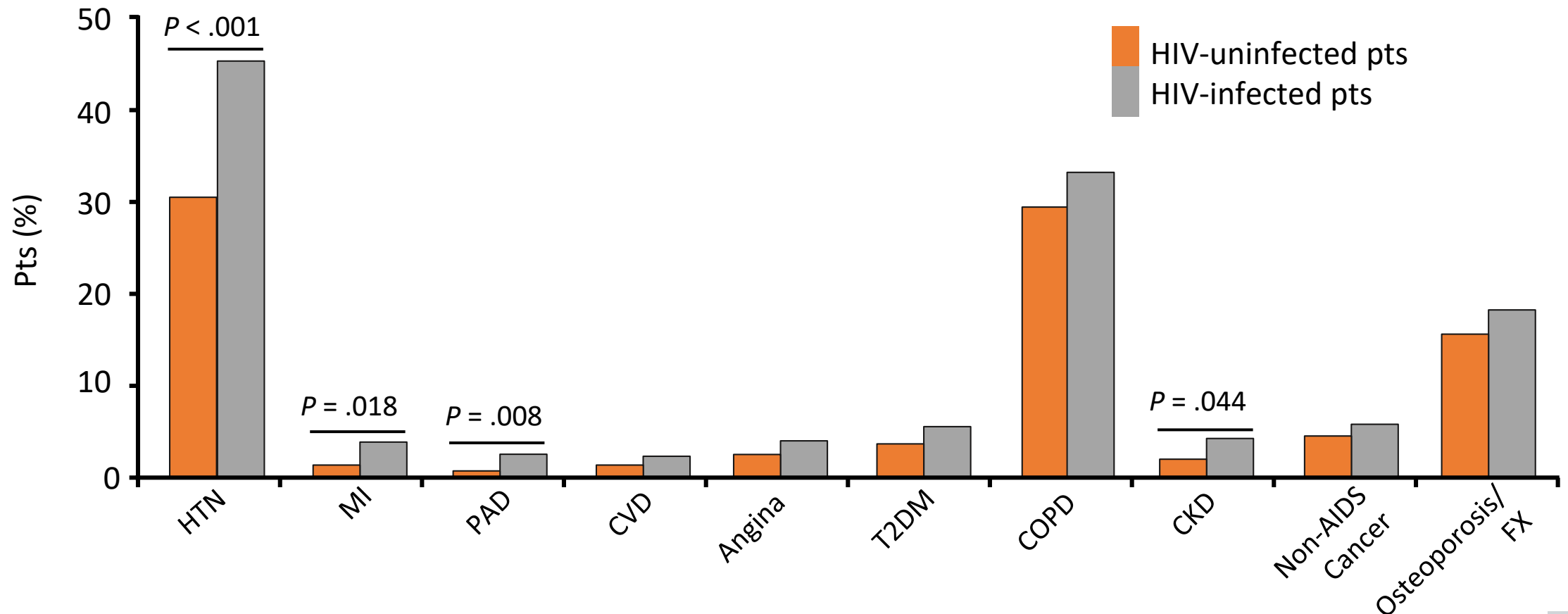
# Comorbidity in relation to age



Mean number of AANCC									
0.68	0.80	1.03	1.15	1.47	0.89	1.35	1.52	1.65	2.04
Number of participants									
166	108	70	53	34	159	111	86	62	52

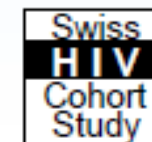
# AGEhIV: Older HIV-Infected Pts at Increased Risk for Multiple Comorbidities

- Cross-sectional analysis of comorbidity prevalence in prospective cohort study of HIV-infected pts (n = 540) vs controls (n = 524) ≥ 45 yrs of age



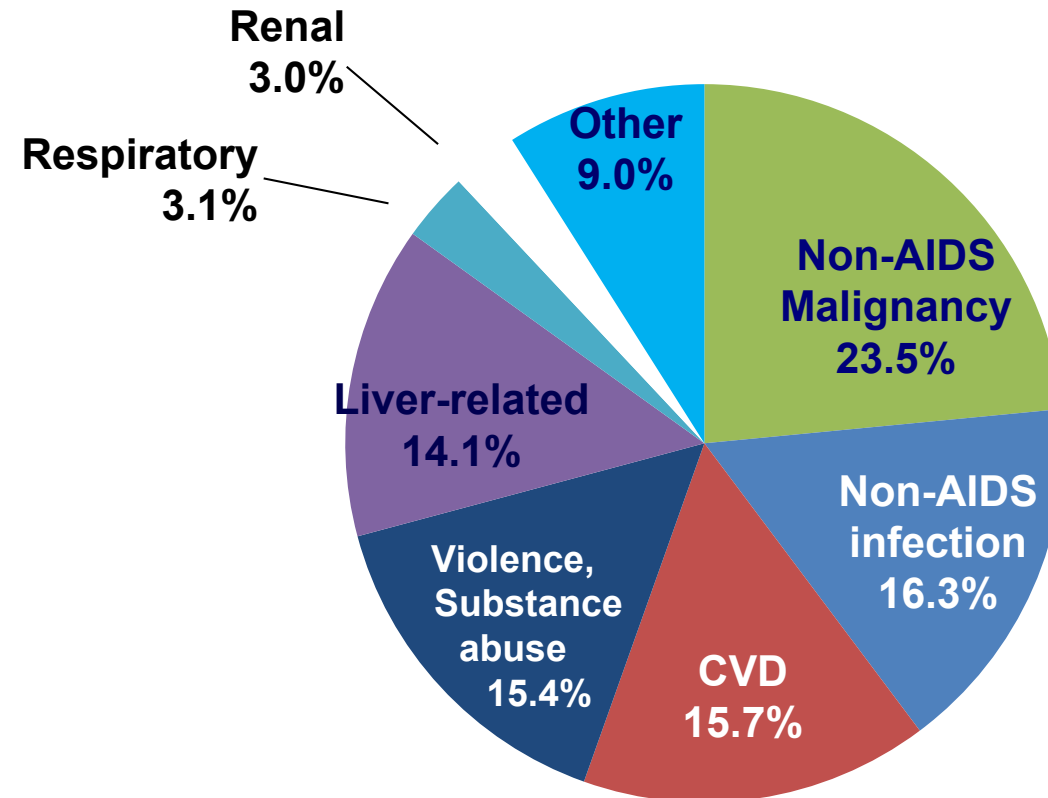
# Non-ART Medications by Age

Medication	Total n (%)	Age-group (Yrs)			p <sup>1</sup>
		<50	50-64	≥65	
Antihypertensives (not ACE inhibitors)	831 (9.8)	323 (5.6)	367 (16.4)	141 (31.3)	<0.001
Antihypertensives (ACE inhibitors)	935 (11.1)	355 (6.2)	432 (19.4)	148 (32.9)	<0.001
Lipid-lowering agents	1071 (12.7)	356 (6.2)	527 (23.6)	188 (41.8)	<0.001
Oral antidiabetics	179 (2.1)	51 (0.9)	87 (3.9)	41 (9.1)	<0.001
Insulin	116 (1.4)	40 (0.7)	50 (2.2)	26 (5.8)	<0.001
Antiplatelet drugs	488 (5.8)	121 (2.1)	237 (10.6)	130 (28.9)	<0.001
Antidepressants	846 (10.0)	560 (9.7)	251 (11.2)	35 (7.8)	0.659



# Non-AIDS Diseases Now Account for Majority of Deaths in HIV (1996-2006)

- 1,876 deaths among 39,727 patients
- Non-AIDS related deaths accounted for 50.5%



# Aging with HIV is Heterogeneous

The variability in old age is greater than the variability across ages

Acknowledgement: Valcour V. ACTHIV Dallas. 2016.

## AIDS Patients Face Downside of Living Longer



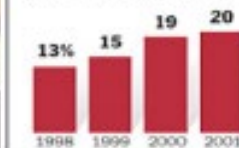
John Holloway, 59, has survived AIDS but has more health problems than his 84-year-old father.

The New York Times 2007



## New AIDS cases among 50+

Percentage of newly diagnosed AIDS cases among people over 50 years of age in Hawai'i:



Source: State Health Dept.

The Honolulu Advertiser



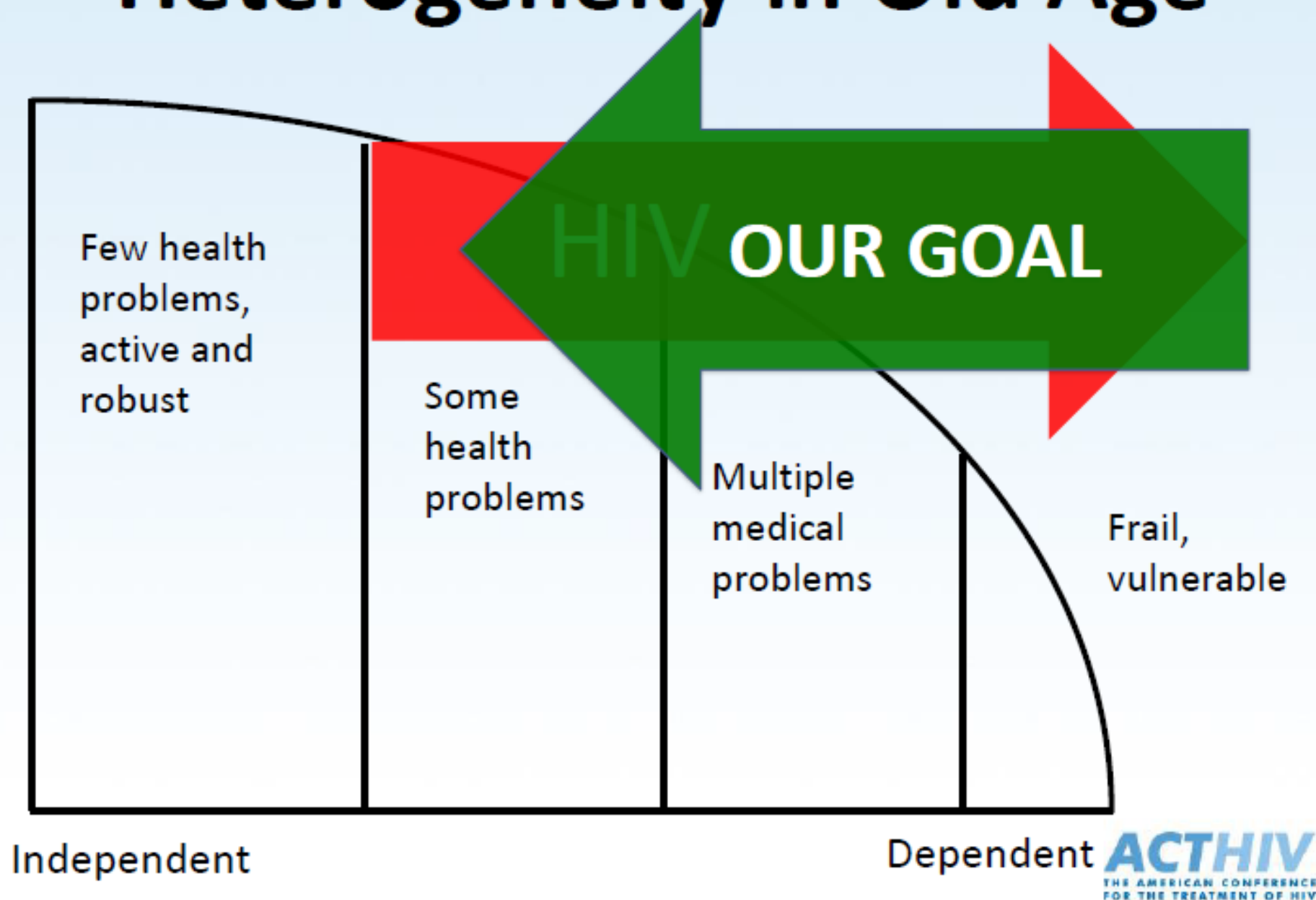
HonoluluAdvertiser.com

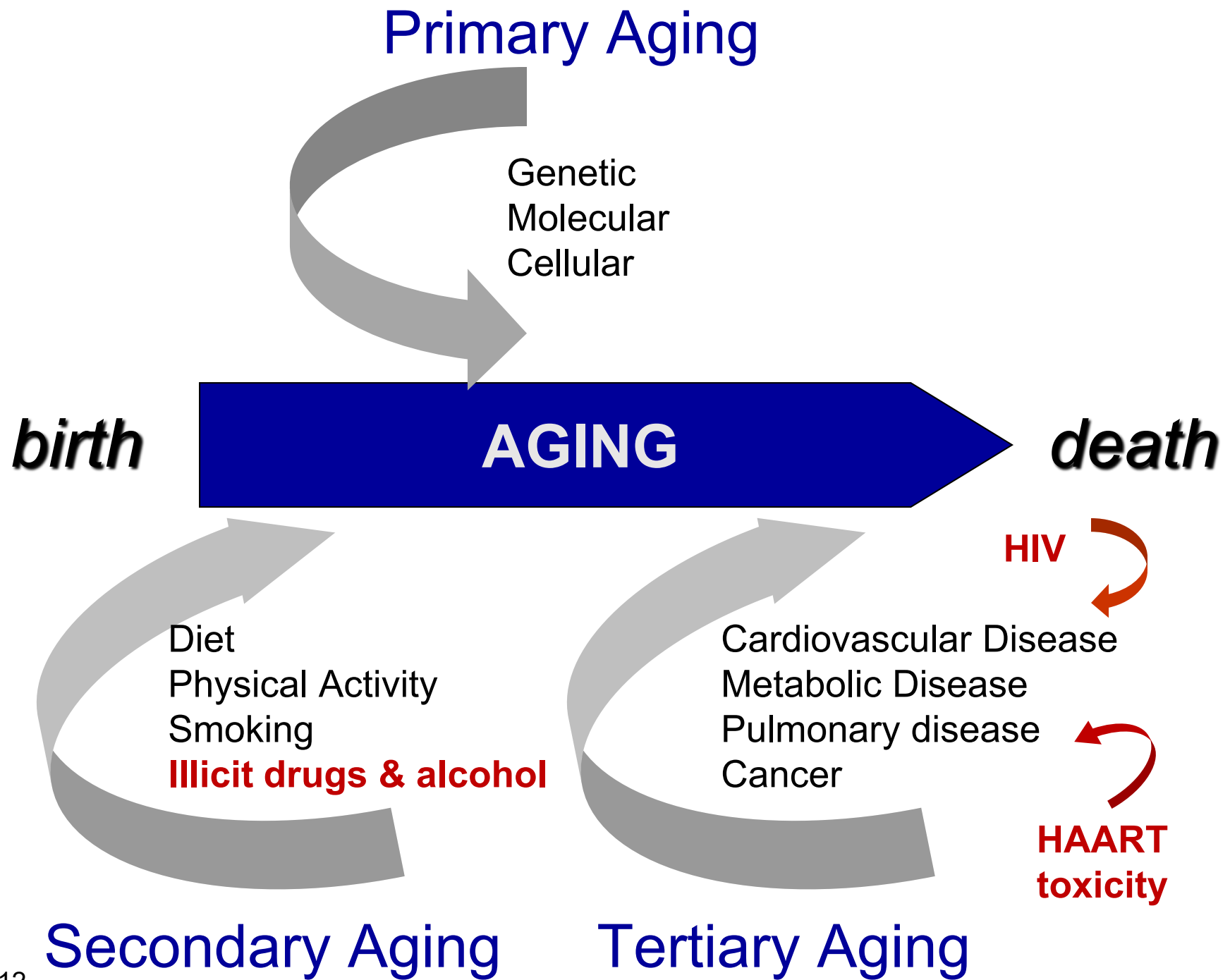
Posted on: Wednesday, June 26, 2002

Gray wave of AIDS puzzles Hawai'i

The Honolulu Advertiser 2003

# Heterogeneity in Old Age





# Frailty, a Geriatric Syndrome

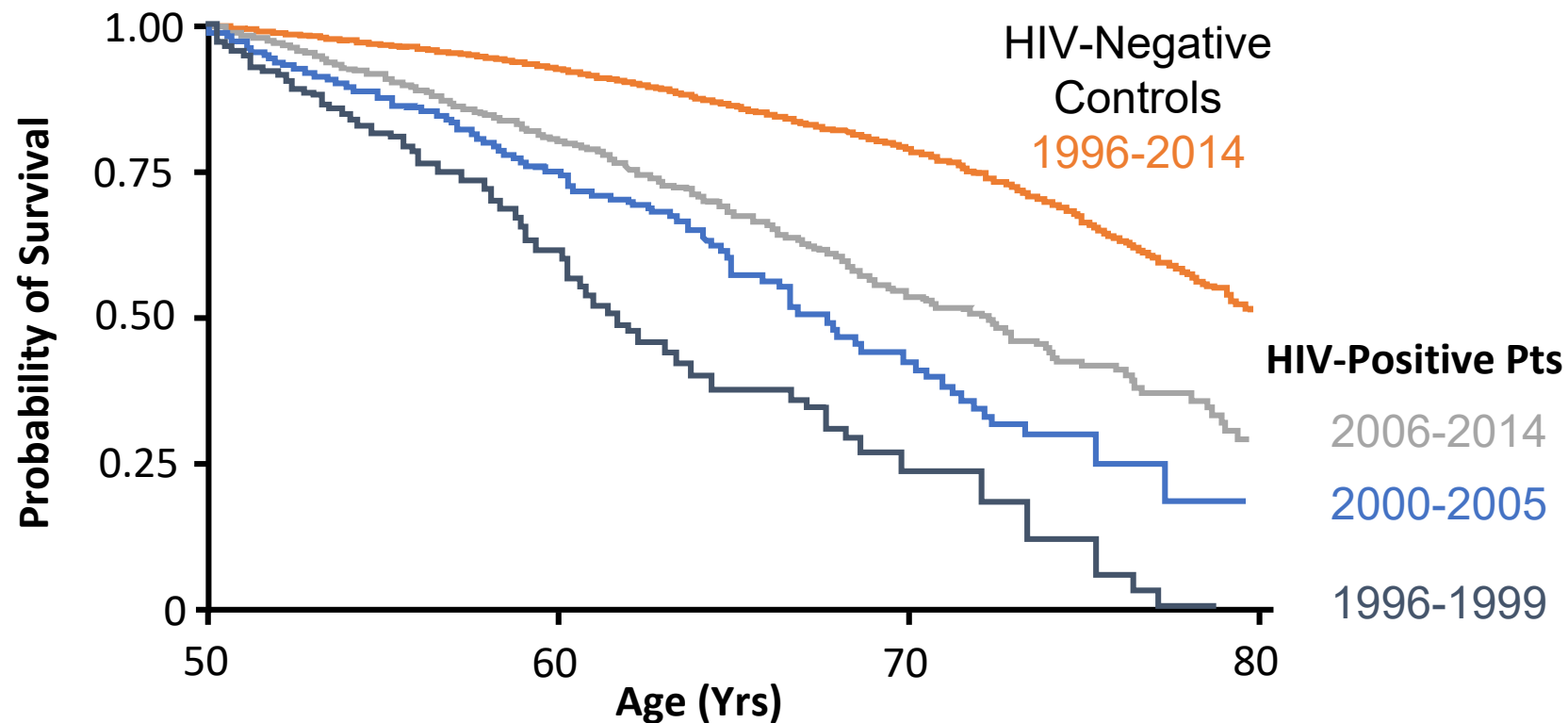
- A geriatric *syndrome* of:
  - weakness
  - weight loss
  - low activity
- Not associated with any specific disease but associated with adverse health outcomes
- A biological vulnerability to adverse outcomes that stems from alterations in multiple physiological systems
- Is mobility the 6<sup>th</sup> vital sign?

# ART in the older HIV-infected patient

- No age-specific ART recommendations
- Viral response not affected by age
- CD4 response may be delayed
- Consider age-related comorbid conditions
- Consider drug interactions
  - Don't forget the OTC (antacids, NSAIDs, tylenol)
  - Impaired creatinine clearance
  - Reduced hepatic function

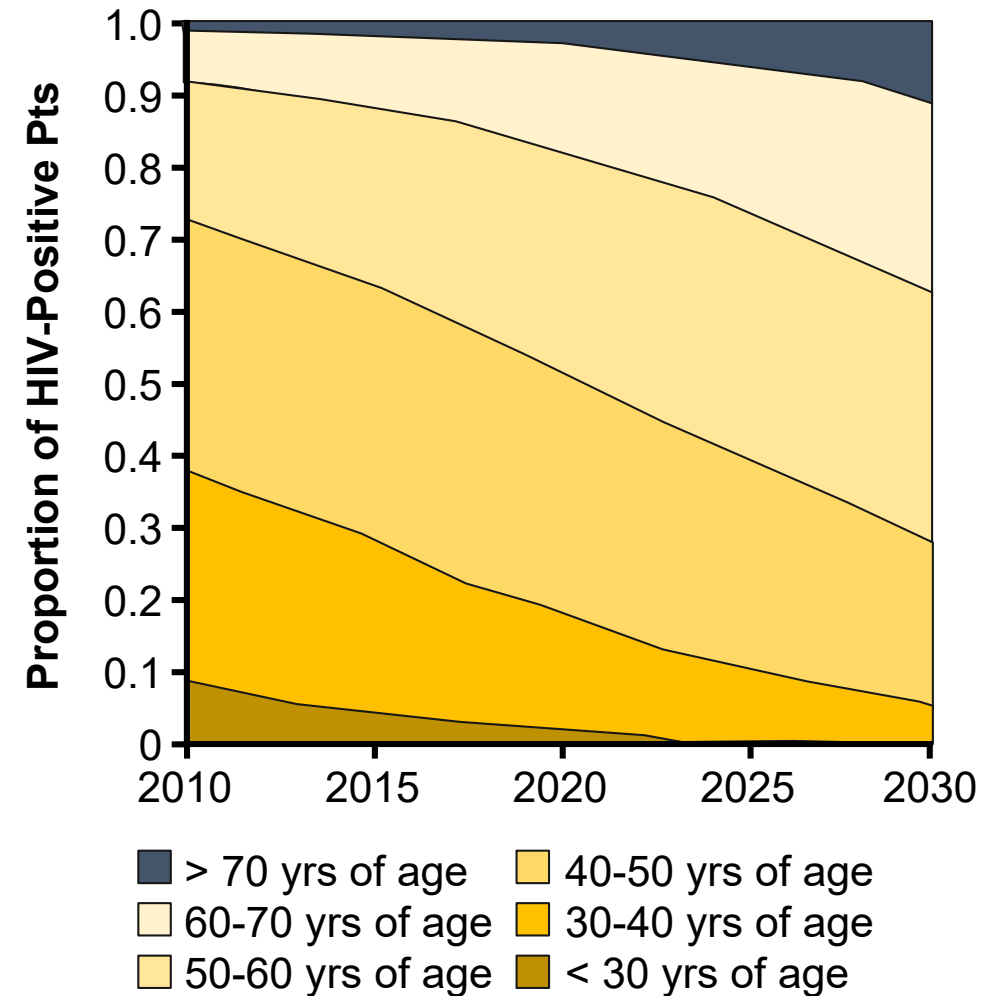
# Life Expectancy in Older HIV-Positive Adults in Modern ART Era

- Population-based cohort study of survival in HIV-infected pts (n = 2440) and uninfected controls matched by age and sex (n = 14,588) in Denmark



# ATHENA: Older Pts Becoming More Prevalent in the HIV-Infected Population

- Observational cohort of 10,278 HIV-infected pts in the Netherlands
- Modeling study projections:
  - Proportion of HIV-positive pts  $\geq 50$  yrs of age to increase from 28% in 2010 to 73% in 2030
  - Median age of HIV-positive pts on combination ART to increase from 43.9 yrs in 2010 to 56.6 yrs in 2030



# Preventive care: should it be different in older HIV adults?

Conditions with Increased Risk in HIV	Observational Studies	Modifications
<b>Obstructive Lung Disease</b>	Additive negative effect of smoking and HIV <sup>1</sup>	Increase emphasis on smoking cessation?
<b>Myocardial Infarction</b>	HIV is an independent risk factor <sup>3</sup> Aspirin attenuates platelet activation in HIV <sup>2</sup>	HIV in Framingham Score? Lower age threshold for daily aspirin?
<b>Fragility Fractures</b>	Increased risk in HIV <sup>4</sup>	Early DEXA screening Vit D, Ca++ Rx?
<b>Neurocognitive Decline</b>	High prevalence in HIV <sup>5</sup>	Screen asymptomatic patients?
<b>Anal Cancer</b>	Increased risk in HIV + groups <sup>6</sup>	Annual digital rectal exam Anal Pap smear? HPV vaccination?

<sup>1</sup>Kaner,2009; <sup>2</sup>O'Brien, 2013; <sup>3</sup>Freiberg, 2013; <sup>4</sup>Triant,2008; <sup>5</sup>Heaton, 2010; <sup>6</sup>D'Souza, 2008

# Exercise as the best medicine

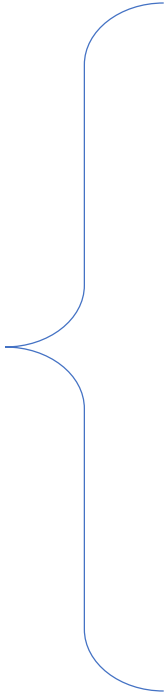


## HIV infection, antiretroviral treatment, ageing, and non-AIDS related morbidity

Steven G Deeks,<sup>1</sup> Andrew N Phillips<sup>2</sup>

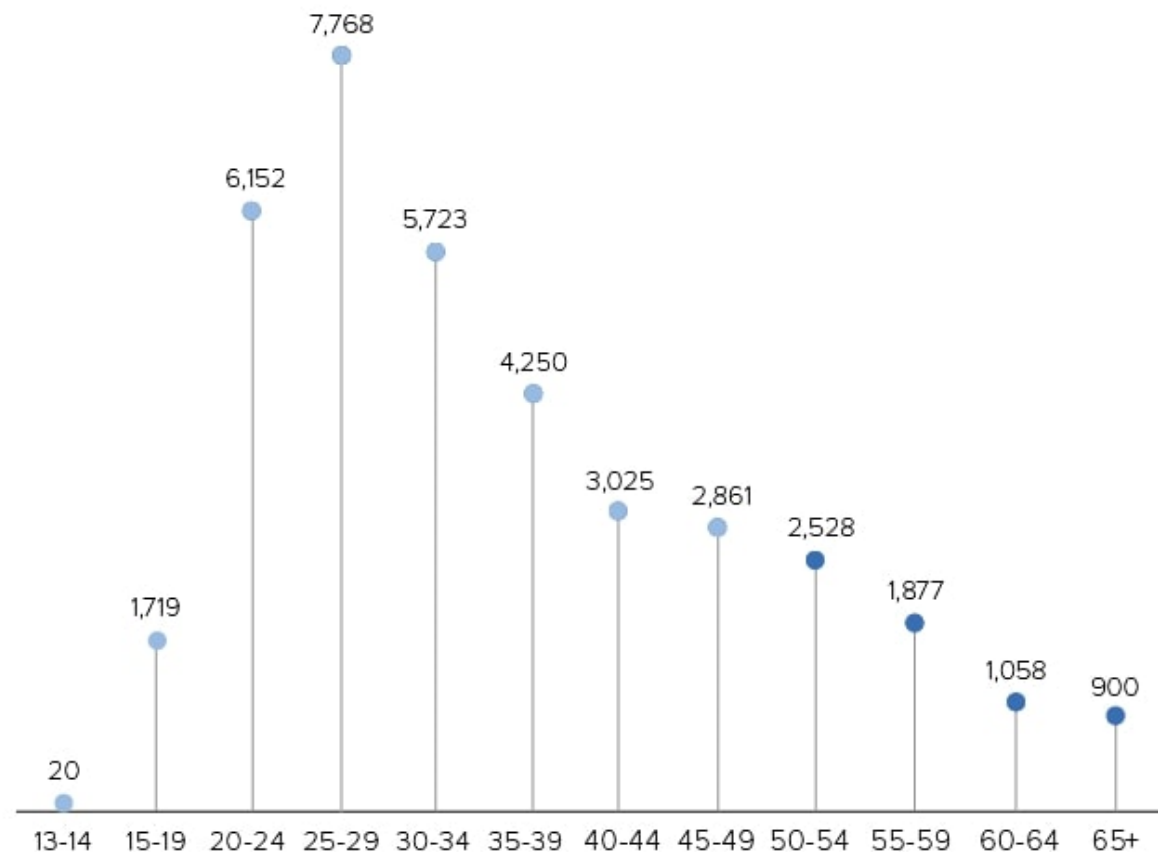
**EXERCISE  
Is Effective  
Prevention &  
Treatment  
Per CDC for 65+**

### Box 2 Non-AIDS related complications that may be more common in patients with HIV

- 
- ✓ Hypertension
  - ✓ Diabetes mellitus and insulin resistance
  - ✓ Cardiovascular disease
  - ✓ Pulmonary hypertension
  - Cancer
  - ✓ Osteopenia and osteoporosis
  - Liver failure
  - Kidney failure
  - ✓ Peripheral neuropathy
  - ✓ Frailty
  - ✓ Cognitive decline and dementia

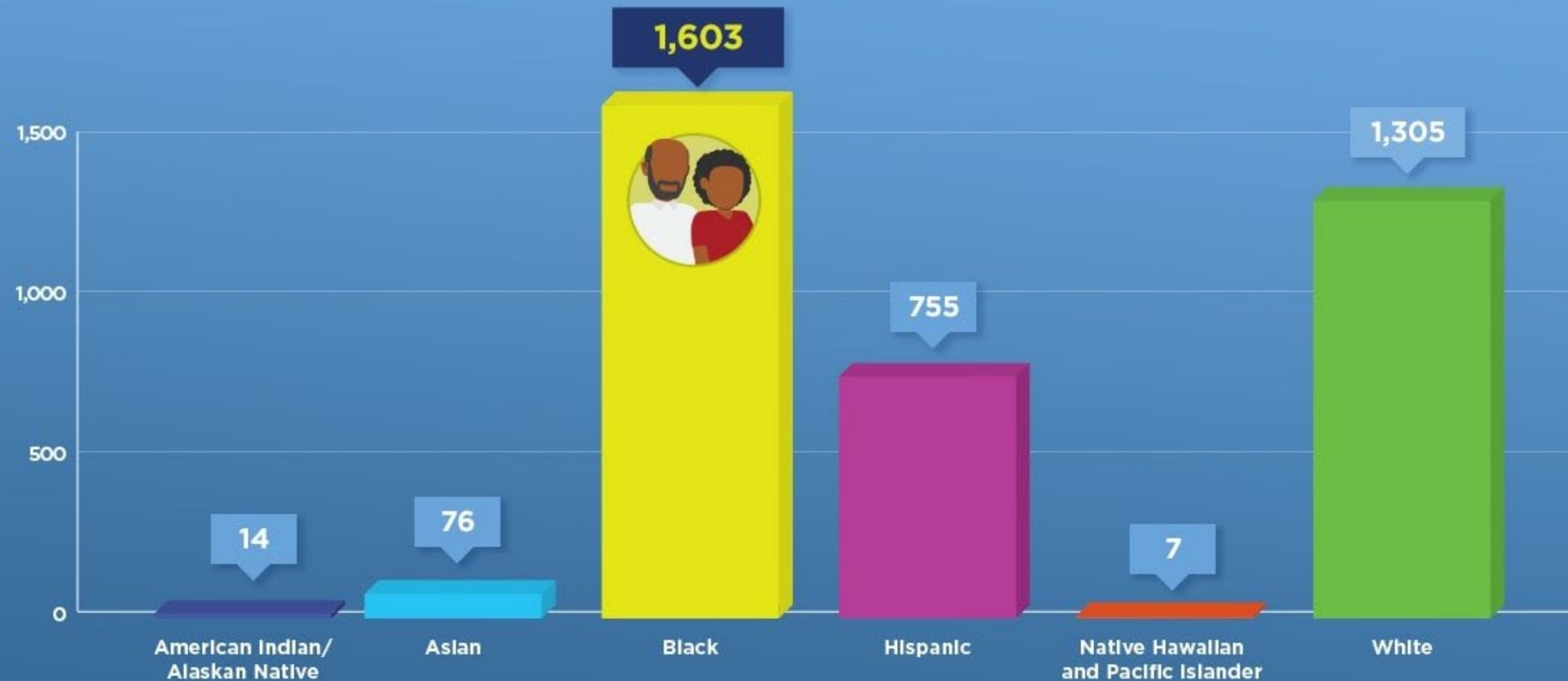
# New HIV Diagnoses Among Adults and Adolescents in the US and Dependent Areas by Age, 2018

**1 in 6 new HIV diagnoses  
were among people aged  
50 and older.**



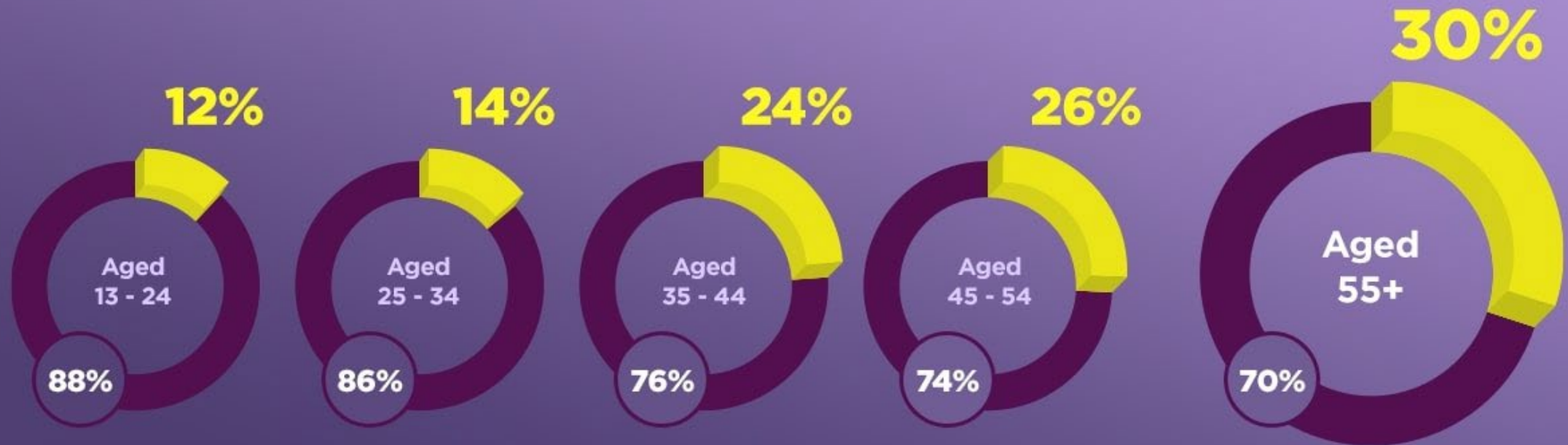
Source: CDC. Diagnoses of HIV infection in the United States and dependent areas, 2018 (updated). *HIV Surveillance Report* 2020;31.

In 2018, **Black Americans 55 and older** had the **highest number of new HIV diagnoses** compared to people of other races/ethnicities in that same age group.



New HIV diagnoses in 2018 among people 55 and older, by race/ethnicity

In 2018, **women represented 30%** of **all new HIV diagnoses** among people **aged 55 and older** – the highest proportion across all age brackets.



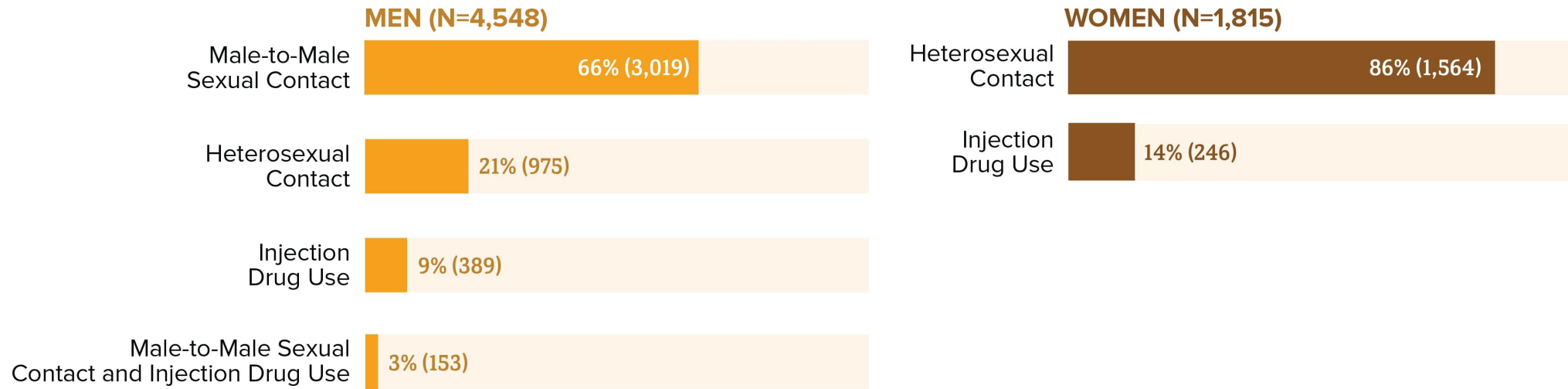
New HIV diagnoses by sex and age, 2018

Females

Males

# New HIV Diagnoses Among People Aged 50 and Older in the US and Dependent Areas by Transmission Category and Sex, 2018\*

**Among people aged 50 and older, most new HIV diagnoses were among men.**



Total for men may not equal 100% due to rounding.

\* Based on sex at birth and includes transgender people.

Source: CDC. Diagnoses of HIV infection in the United States and dependent areas, 2018 (updated). *HIV Surveillance Report* 2020;31.

# Age is Not a Condom...& not PrEP



**Have Sex?**

**Age is not a condom.**

Talk to your doctor about your sex life.  
Get informed. Be safe. Get tested for HIV.

**NYS 800-541-AIDS   NYC 800-TALK-HIV**  
800-541-2437   800-825-5448

© 2010 NYC DOH. All rights reserved. HIV/AIDS is a leading cause of death in the United States. [www.nyc.gov](http://www.nyc.gov)



**Have Sex?**

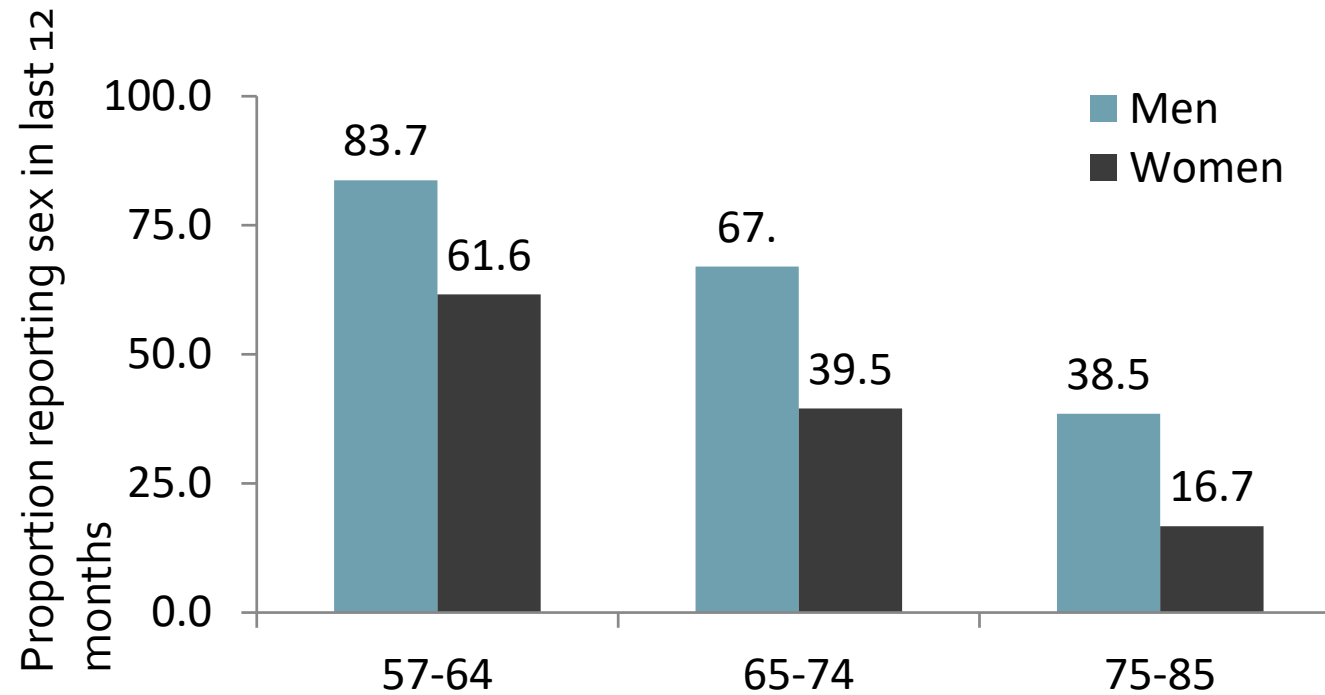
**Age is not a condom.**

Talk to your doctor about your sex life.  
Get informed. Be safe. Get tested for HIV.

**NYS 800-541-AIDS   NYC 800-TALK-HIV**  
800-541-2437   800-825-5448

© 2010 NYC DOH. All rights reserved. HIV/AIDS is a leading cause of death in the United States. [www.nyc.gov](http://www.nyc.gov)

# Sex is Not Only for the Young



Lindau *NEJM* 2007 357(8):762-774

From 2017 to 2018, there was a **49% increase in the number of PrEP users aged 55 and older**. When looking at the **PrEP-to-Need ratio** for this age group, we see that there were **3.62 PrEP users** for every new HIV diagnosis among people aged 55 and older in 2018.

#### PrEP use

2018:  
**14,152**

**49%**  
INCREASE

2017:  
**9,485**



#### PrEP-to-need-ratio

2018:  
**3.62**

**49%**  
INCREASE

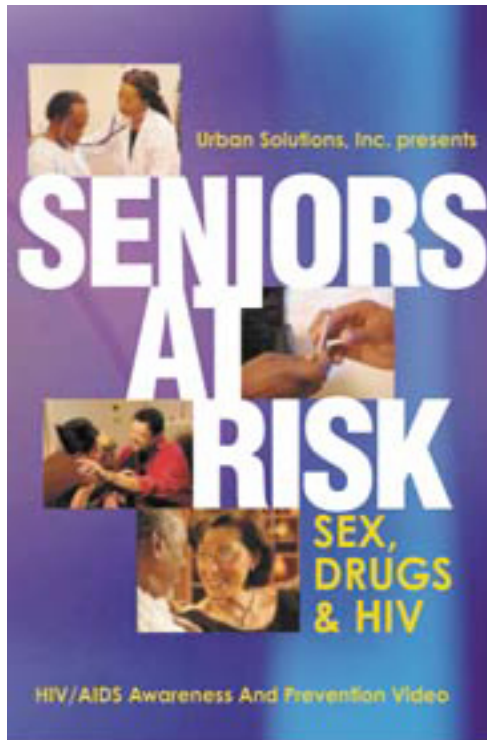
2017:  
**2.43**

The PrEP-to-Need Ratio (PnR) is the ratio of the number of PrEP users in 2018 to the number of people newly diagnosed with HIV in 2017.

## Prevention with Better Communication: Educate Providers and Patients



- Although they visit their doctors more frequently, older people and their providers are less likely to discuss sexual behaviors or drug use.
- Health care providers may not ask patients aged 50 and older about their sexual activity or drug use, or test them for HIV.
- Also, older people may not consider themselves to be at risk for HIV, or may be embarrassed to discuss sex
- Providers may mistake HIV symptoms for those of normal aging



A 28 minutes video that has been developed to educate African American adults 50 and older about the risk factors of contracting the HIV virus.

- Older people may have many of the **same HIV risk factors as younger people**, including a lack of knowledge about HIV prevention and sexual risk, such as having multiple sex partners, and may be less likely to use a condom or other prevention options, like PReP
- **Stigma** is common among adults with HIV and negatively affects people's quality of life, self-image, and behaviors. People aged 50 and older may avoid getting the care they need or disclosing their HIV status because they may already face isolation due to illness or loss of family, friends, or community support.



- **Older people in the United States are more likely than younger people to have late-stage HIV infection at the time of diagnosis.**
- People aged 50 and older may start treatment late, which may put this population at risk of more immune system damage.
- Among people aged 55 and older who received an HIV diagnosis in 2015, 50% had HIV for 4.5 years before they were diagnosed—the longest diagnosis delay for any age group.

#### FIND YOUR COMMUNITY

Support groups can provide comfort, advice, and mutual understanding.

#### REST

Meditation, meditation, and sleep are all important practices for healthy living.

#### CONSIDER THERAPY

And find a therapist who is sympathetic to your sexuality and HIV status.

#### STAY (SEX) POSITIVE

Sex is a critical part of life. You deserve to have it, and you should have it.



## 4 STEPS TO TAKE AFTER AN HIV DIAGNOSIS

**PRIORITIZING YOUR  
MENTAL HEALTH IS THE  
FIRST STEP TO LIVING A  
HEALTHY LIFE WITH HIV**



# Pioneers in Treatment/Survival and Now Pioneers in Aging



1. Infected pre ART: 30 years or more with HIV infection; first wave of the epidemic as death sentence
2. Infected post ART: 10- 25 years with HIV infection; chronic illness
3. Born Infected with HIV: younger in age, more invisible
4. HIV Negative - but lived through the early epidemic as caregivers, faced multiple losses

# Long Term Survivors of HIV

- Stigma and Minority Stress
  - Sexual orientation/gender identity
  - Race/ethnic
  - Mode of Transmission
  - Ageism
- Trauma
  - impact of losses of late 1980s/early 1990s persist and reoccur
- HIV supports of early era now gone - housing, food, programs
- almost 70% live alone; high rates of housing instability
- increased poverty(early disability; no retirement plans)
- Importance of LTS peer groups



# VOICES OF LONG TERM SURVIVORS

**Voice #1: Grateful to be alive, invalidated by hospital stay, concerned about long term care  
HIV + for 34 years, and given 2 years to live.**

Despite a number of current health problems, due to the fact that he is here today,  
“I feel like I won the lottery, because so many others are not here.”

BUT...when recently inpatient at a small community hospital, they could not provide his  
ART medications.

“This aging activity is happening really fast to me...when I go to the hospital next time  
will it be my last time?”

“If I go into a nursing home living with HIV, gay and single, how would I be treated?  
Are doctors in nursing homes familiar with HIV clients and with their medications?”

# VOICES OF LONG TERM SURVIVORS

**Voice #2: HIV+ with multiple comorbidities but feeling Primary Care and Specialists are not familiar with HIV related conditions (that's what ID is for) nor do they understand the Impact of the epidemic.**

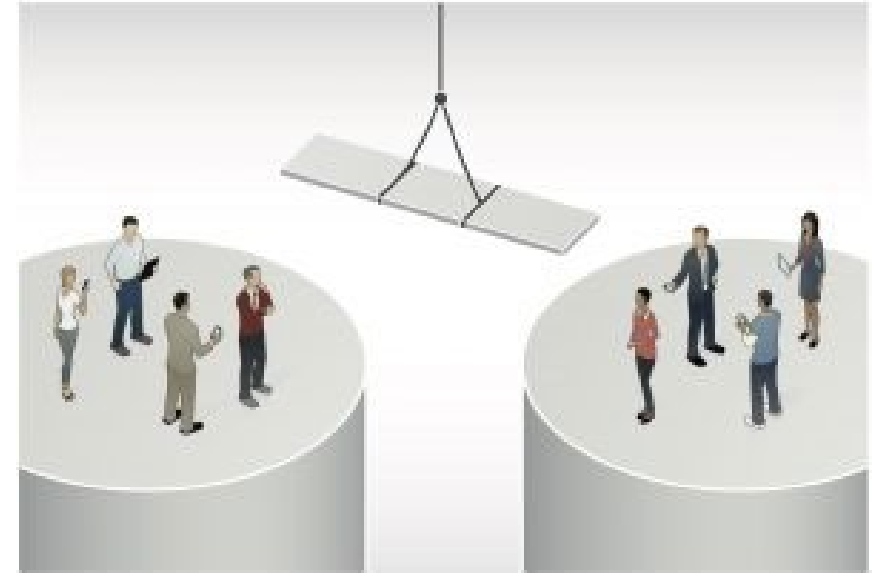
Cardiologist “you need to slim down that belly for better heart health” reflected a lack of understanding about HIV related lipodystrophy

Younger providers who didn't experience the HIV epidemic in the 1980s and 90s address it as a manageable chronic illness that can be easily avoided/treated today

# HIV and Aging - Recommendations

## Need to Cross Train:

- HIV providers need to know more about normal aging and comorbidities for HIV+ older adults as well as resources and services for older adults
- Elder care providers need to know more about HIV infection - medical and psychosocial factors, resources and services
- Trauma informed approaches to care for all HIV, elder care, healthcare etc.



## HIV Services:

- AIDS Service Organizations
- Public Health Departments

## Aging Services:

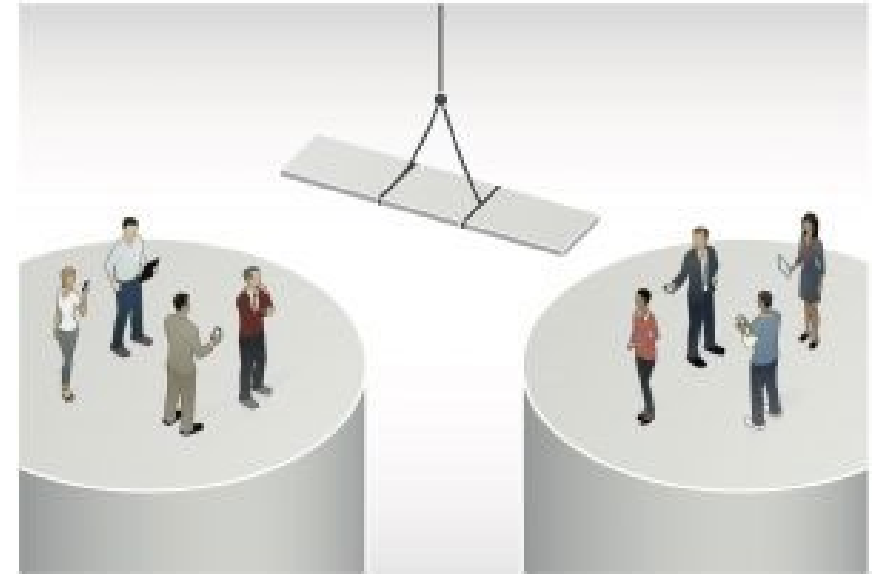
- Elder Service Providers
- Elder/Aging Affairs Dept.

# HIV and Aging - Recommendations for services and resources

- CDC recommendations for testing:
  - one time test for all ages 13-64
  - annual testing age 13-64 for risk groups: multiple partners, IVD, STDs

## What about the next 20 years of life?

- Better resources and support for newly diagnosed older adults
- Death, dying and bereavement services
  - trauma informed



### HIV Services:

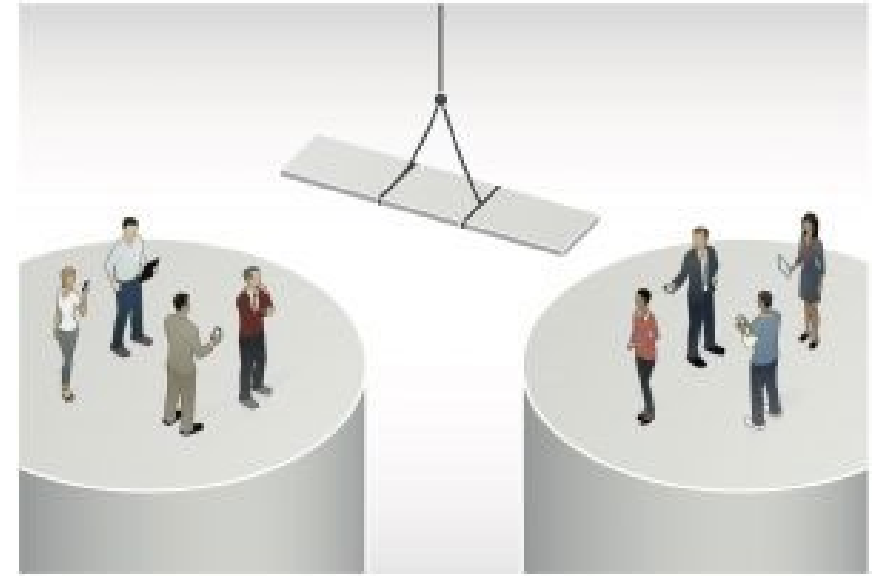
- AIDS Service Organizations
- Public Health Departments

### Aging Services:

- Elder Service Providers
- Elder/Aging Affairs Dept.

# HIV and Aging - Recommendations for services and resources

- Access to state funded elder care if need/financial eligible but under age 60
- Benefits counseling for insurance options and coverage when Medicare eligible at age 65, especially income and assets levels for Medicaid if previously receiving HIV disability.
- Benefits counseling (usually via elder services) needs to be educated about HIV disability benefits and impact of turning 65 on eligibility/benefits



HIV Services:

- AIDS Service Organizations
- Public Health Departments

Aging Services:

- Elder Service Providers
- Elder/Aging Affairs Dept.



# Resilience



able to return to an original shape after being pulled, stretched, bent or pushed

Merriam Webster Learners Dictionary

# Q & A

Are there any questions that  
you would like to ask?

Lenny Alberts, MD

[lenny.alberts@gmail.com](mailto:lenny.alberts@gmail.com)

Lisa Krinsky, MSW, LICSW

[Lkrinsky@fenwayhealth.org](mailto:Lkrinsky@fenwayhealth.org)