

All the AIDS Conference News That's Fit to Print

A speedy overview of the major scientific findings presented at the International AIDS Conference in Amsterdam (AIDS 2018)

August 2, 2018 By [Benjamin Ryan](#)

The International AIDS Conference in Amsterdam (AIDS 2018), held July 23 to 27, was a chance for HIV researchers and advocates to take stock of an epidemic that stands at a turning point. This decade in particular has seen awesome advances in both scientific research and efforts on the ground to control the epidemic.

But considerable challenges remain, including fully harnessing the power of antiretrovirals (ARVs) to reduce transmission, whether through treatment of HIV or pre-exposure prophylaxis (PrEP); searching for effective, scalable means of prompting long-term viral remission among people living with HIV; and keeping enough money flowing to get the job done right.

To follow are short summaries of studies presented at the conference. For more information about any of these research projects, click the hyperlinks. For a complete newsfeed of POZ reporting on the conference, click the [AIDS 2018](#) hashtag.

Treatment as Prevention

The biggest news of the conference was also no particular surprise. The [PARTNER2](#) study documented 77,000 condomless anal sex acts between mixed-HIV-status gay male couples when the partner with HIV had an undetectable viral load and found zero transmissions of the virus between these men. These long-awaited results bolstered the increasing scientific consensus that having fully suppressed HIV is associated with effectively no risk of transmission.

The power of ARVs to prevent transmission helps explain why San Francisco's [HIV rate has dropped](#) so quickly in recent years. The drop coincides with a considerable narrowing in the amount of time city residents have spent with unsuppressed HIV following diagnosis. (The use of PrEP in the city has also skyrocketed.)

Vaccine

With the Phase IIb [Imbokodo](#) vaccine trial under way among women in Southern Africa, two-year

[results](#) from an earlier trial of the same vaccine gave reason to hope for good results from more advanced research. The so-called mosaic vaccine proved safe and prompted a broad and durable immune response to HIV.

PrEP

For the first time in the United States, research has [indicated](#) that PrEP is indeed associated with declining HIV rates on a public-health level. However, as numerous analyses have shown in recent years, use of Truvada for prevention is uncommon among younger U.S. residents, with a Gilead Science [analysis](#) finding that just 15 percent of those who have ever started PrEP are younger than 25.

Another [study](#), conducted in France, strongly suggested that PrEP is highly effective at preventing HIV—whether it’s taken daily or according to an “on-demand” protocol, in which tablets are taken only in the days surrounding sex. None of the 1,600 men who have sex with men (MSM) participants have contracted the virus, leading the researchers to estimate that PrEP has blocked 85 transmissions among them.

Observing that condomless sex rates tended to rise after men started PrEP, the French study joined an [Australian study and an American one](#) that have added to the growing body of evidence suggesting that going on PrEP is associated with a greater level of sexual risk-taking among MSM. Additionally, after controlling for the increased rate of sexually transmitted infection (STI) testing that men engaged in while on PrEP, the Melbourne-based study found that starting Truvada for prevention was associated with a 21 percent increase in the STI diagnosis rate.

Concerningly, one [study](#) found that among transgender women taking feminizing hormones, such treatments are associated with a modest decline in the body’s levels of one of the two drugs in Truvada. Further research is needed to determine whether this means that PrEP doesn’t work as well among this demographic.

In I-can’t-believe-it-isn’t-science-fiction news, researchers have [designed](#) a Truvada tablet equipped with a digestible sensor that can communicate to a computer data about an individual’s adherence to the PrEP regimen.

Treatment

Conferencegoers heard mixed news about ViiV Healthcare’s integrase inhibitor, Tivicay (dolutegravir). Forty-eight-week [results](#) comparing a two-drug regimen of Tivicay plus Efavir (lamivudine) were promising, showing that the regimen worked as well as a three-drug combo. On the downside, new details have [emerged](#) about Tivicay’s association with an increased risk of neural tube (brain and spinal cord) defects in the infants of women who took the drug prior to conception.

[Advanced research](#) has found that Janssen's Symtuza (darunavir/cobicistat/emtricitabine/tenofovir alafenamide) is safe and effective to switch to regardless of an individual's previous ARV regimen. Additionally, the [newly approved](#) single-tablet regimen is apparently a [good option](#) for those starting treatment rapidly after diagnosis.

As Merck awaits word from the Food and Drug Administration about its [January application](#) for approval of its new non-nucleoside reverse transcriptase inhibitor doravirine, the company reported [96-week results](#) from a trial that pitted the drug against Norvir (ritonavir)-boosted Prezista (darunavir). Doravirine suppressed HIV as well as boosted Prezista and was also better for blood lipids, including cholesterol and triglycerides.

Cure

Results from two major cure studies were discouraging. The first [randomized HIV cure trial](#), which tested a "kick-and-kill" strategy in humans, found it did not reduce the level of viral DNA in the participants. [Another study](#) found that an antibody treatment did not, as it had in monkeys, lead human participants to control the virus after stopping all treatment, including ARVs.

Comorbidities (Other Health Conditions)

A Kaiser Permanente [study](#) found that having HIV is independently linked to heart failure; this association is not driven by plaque buildup in the arteries.

British researchers [reported](#) that living with the virus is associated with a greater rate of depression and anxiety.

On the cancer front, one [study](#) found that Kaposi sarcoma, a defining scourge of the early crisis years of the AIDS epidemic in the United States, is still a concern for some people with the virus, particularly Black men. Also, adolescents and young adults who contracted HIV at or around the time of birth are 13 times [more likely](#) to be diagnosed with cancer and nine times more likely to die than young people in the general population.

Hepatitis C and Injection Drug Use

Numerous places around the world have seen HIV outbreaks among people who inject drugs in recent years. With this in mind, researchers [warned](#) conferencegoers that complacency adds fuel to the fire for more future outbreaks of this kind.

Supervised injection sites are one harm-reduction-based response to the opioid crisis. A recent

[survey](#) of such sites found they are opportune places for clinicians to offer hepatitis C virus (HCV) treatment, although this is rarely put into practice.

Hep C transmits sexually among MSM; until now, studies had found that transmission rates were much higher among those who have HIV. An ongoing [study](#) in Amsterdam of HIV-negative MSM on PrEP found that the men contracted HCV at a rate of 1 percent per year, which is in the ballpark of rates seen among HIV-positive MSM.

As for HCV treatment news, eight weeks of Zepatier (grazoprevir/elbasvir) [boasted](#) a near-perfect cure rate among HIV-positive MSM who were acutely (very recently) infected with HCV.

Global

Some of the most encouraging news at the conference came out of sub-Saharan Africa, where [U.S.-led aid efforts](#) are having a transformative effect on several nations in particular. An awesome [77 percent](#) of Namibia's HIV population now has a fully suppressed virus. Thanks to the recent rapid increase in this figure, the hard-hit nation's annual diagnosis rate plunged 40 percent in just two years.

Communities in Kenya and Uganda that [received](#) a multi-disease prevention campaign along with rapid HIV treatment saw improvements in their viral suppression rates as well as lower death rates compared with control communities. And in [Botswana](#), a similar program, one that included stepped-up voluntary medical male circumcision as a preventive measure, saw similar success.

After Canada and France changed their laws to shift away from prosecuting sex workers and on to prosecuting their clients, [researchers](#) found no improvement in access to health care among individuals in this line of work; the change might actually have encumbered such access.

Lastly, progress in fighting HIV around the world is hobbled without money to back it up. And on this front, investigators [left conference attendees](#) with considerable cause for concern. After a decade of phenomenal growth, donor funding for low- and middle-income nations dropped 7 percent between 2012 and 2017. This left researchers to ask whether the world is seeing "the end of the golden age of HIV/AIDS funding."

For more AIDS 2018 coverage, [click here](#). Additional related items include a [newsfeed article](#) on the release of a global consensus statement on HIV criminalization, a [blog post](#) by Sean Strub with additional perspective on the statement, and a [blog post](#) by Peter Staley on other advocacy at the conference.