



ШЛ

Thai media discussion of "Undetectable = untransmissible (U=U)" for people with HIV: a re-statement of the scientific facts

As authors of the three studies that informed the U=U <u>Scientific Consensus Statement</u> on 'the risk of sexual transmission of HIV from a person living with HIV who has an undetectable viral load (UVL)' we write to reconfirm our commitment to the Statement and the evidence that supports it. We believe this reconfirmation is timely and necessary in response to recent social and wider media activity on the subject of UVL and HIV transmission in Thailand.

The Scientific Consensus Statement was first drafted in 2017 and has since been endorsed by leading global HIV researchers as well as over 960 organisations from nearly 100 countries. The statement asserts that there is now "evidence-based confirmation that the risk of HIV transmission from a person living with HIV (PLHIV), who is on Antiretroviral Therapy (ART) and has achieved an undetectable viral load in their blood for at least 6 months is negligible to non-existent."

What this means in practice is that a person living with HIV who takes treatment that lowers the virus in their body to 'undetectable' levels is unable to pass HIV on to their partners, even when engaging in sex without condoms.

The U= U Scientific Consensus Statement was drafted in response to an apparent lack of understanding among medical providers and the broader community that successful treatment prevents HIV transmission, and to combat misconceptions that cause HIV-related stigma and discrimination.

The U=U Scientific Consensus Statement is informed by the strongest scientific evidence, collected through high-quality research conducted globally, including in Thailand, with the results published in the most highly respected medical journals.

• HIV Prevention Trials Network (HPTN) 052

This trial was led by the globally renowned US-based HIV Prevention Trials Network (HPTN) and included 1,763 participants. The study found that there were no cases of HIV transmission in couples where the HIV positive partner had stably suppressed viral load. Participants were enrolled from a diverse range of countries, including Thailand.

• **Opposites Attract**

This study, led by the University of New South Wales, Australia, involved 358 male-male couples from Brazil, Thailand and Australia who were followed for four years. Opposites Attract recruited nearly one-third of its participants in Thailand, and Thai researchers were key collaborators in this study. The study found that of over 12,447 acts of anal intercourse without condoms, there were zero cases of HIV transmission from the HIV positive partner to the HIV negative partner when the HIV positive partner had UVL.

• The PARTNER Study

Across two phases of research, The PARTNER study, led by researchers from University College London, United Kingdom, and the Centre of Excellence for Health, Immunity and Infections Denmark, involved 548 heterosexual couples and 972 male-male couples. The couples had over





112,000 acts of sex without condoms when the HIV positive partner had UVL and there were zero cases of HIV transmission in these couples.

The combined results of these trials prompted experts from the international scientific and medical communities to agree that **there is effectively no risk of HIV transmission through condomless sex when HIV viral load is suppressed.** These results have been widely communicated. The choice to use condoms may be different depending upon a person's sexual practices, circumstances and relationships, and of course the confidence that the partner's use of ART has led to reliable and sustained viral suppression.

These studies were designed to provide globally relevant results and are applicable in all settings where there is good access to antiretroviral therapy.

As leaders in our field, it is essential that we all challenge misinformation and use evidence to break down the stigma associated with HIV.

We urge media and medical organisations to take an evidence-based approach to reporting issues associated with HIV transmission.

We encourage individuals and organisations speaking publicly and with patients to familiarise themselves with these studies and the international consensus that U=U (undetectable = untransmissible).

Professor Andrew Grulich, Kirby Institute, UNSW Sydney

Dr Benjamin Bavinton, Kirby Institute, UNSW Sydney

Dr Myron Cohen, UNC School of Medicine

Professor Alison Rodger, Institute for Global Health, University College London