Integrating Transgender People into Pakistan's TB-HIV Care Continuum

Bushra Zafar[1*] and Aliya Noor[2]

[1]*Karachi Medical and Dental College, Karachi, Pakistan*
[2]*King Edward Medical University, Lahore, Pakistan*

The World Health Organization (WHO) Global Tuberculosis Report 2025 estimates that Pakistan remains among the five countries with the highest TB burden worldwide. According to the report, 5.8% of all newly detected TB cases were among people living with HIV [1]. Meanwhile, HIV prevalence among transgender people in Pakistan is estimated at 7.1% [2], while TB was reported among around 2.2% of this population between 2017 and 2020 [3]. These figures suggest a population that the current TB-HIV care continuum in Pakistan could undertreat. Pakistan's TB-HIV control strategy cannot effectively find cases, treat them, and ensure continuity of care if transgender people remain structurally excluded from access to health services. Therefore, transgender-inclusive and community-led integration of TB and HIV services is recommended to be included in the national response.

Beyond the measurable burden of TB and HIV, socioeconomic exclusion may further affect transgender people's access to and continuity of healthcare. A research study found that 79% of the surveyed transgender population in Pakistan was uneducated [4]. Limited educational and employment opportunities may also leave some individuals dependent on begging, performing at social events, or sex work, potentially increasing their vulnerability to HIV [5]. These social and economic barriers may contribute to delayed TB and HIV testing, delayed diagnosis, and difficulties in maintaining treatment and continuity of care.

Therefore, a range of public health interventions are needed to address these gaps across the TB-HIV care continuum for transgender people. Building gender-sensitive health facilities that offer TB, HIV and sexual health services under one roof is a key step. A good example is the first trans-led health facility in Asia: the Tangerine Clinic in Thailand. Here, the population can receive holistic care for both HIV and TB, as well as hormone therapy, in one building. Integration of such practices may help to improve access to preventive consultations, testing, and linkage to appropriate care. Moreover, collecting data on gender identity in medical forms and records can help improve disease monitoring and give a more accurate picture of the incidence of TB and HIV among transgender people, as long as data collection is standardized, confidentiality is respected, and the data are analyzed and used to inform health programs. Such understanding may result in more efficient and inclusive health care programs. Digital technology can also be leveraged to promote timely TB and HIV testing *via* social media outreach and community awareness efforts. The process can also be supported by providing HIV self-test kits, which may offer a more private option for HIV testing. At the same time, individuals with symptoms suggestive of TB should be linked to appropriate diagnostic services.

Further research on HIV and TB within transgender communities in Pakistan is important to understand their specific health barriers, but this should not delay the implementation of interventions that are already supported by evidence. It is essential to improve access to inclusive healthcare, timely testing and diagnosis, and continuity of care, while continuing to generate evidence on their specific needs. In this way, Pakistan can strengthen its TB-HIV care continuum and ensure that transgender people are not excluded from essential health services.

CONFLICT OF INTEREST

The authors declare no conflict of interest.

ACKNOWLEDGEMENTS

Declared none.

GENERATIVE AI AND AI-ASSISTED TECHNOLOGIES IN THE WRITING PROCESS

The authors used artificial intelligence (AI) tools solely to improve the language and readability of the manuscript. The authors carefully reviewed and edited all content and take full responsibility for the accuracy and integrity of the manuscript.

REFERENCES

1. Global tuberculosis report 2025. Available at: https://cdn.who.int/media/docs/default-source/global-tuberculosis- report-2025/global-tb-report-2025_factsheet.pdf?sfvrsn=cd5722e6_5 (Accessed: Jul 29 2026).
2. Javed H, Bano A, Fatima W, Khan R, Akhtar A. Sexually transmitted infections and associated risk factors among the transgender population of Pakistan. BMC Infectious Dis 2023; 23(1): 618. DOI: https://doi.org/10.1186/s12879-023-08591-4

**Corresponding author: Bushra Zafar, Karachi Medical and Dental College, Karachi, Pakistan, Email: bushra.zafar5092@gmail.com*
Received: May 20, 2026; Revised: July 31, 2026; Accepted: September 08, 2026
DOI: https://doi.org/10.37184/lnjpc.2707-3521.8.87

 (All articles are published under the Creative Commons Attribution License)

3. Khurshid A. Active case finding for TB in a key population and barriers to accessing healthcare services in a district of the province of Sindh during the years 2017-2020: A mixed-method study [Internet]. eCommons@AKU 2017; Available from: https://ecommons.aku.edu/etd_pk_mc_mhpm/4/ [cited 2026 Jul 31].
4. Sherazi N, Najam N, Jabeen S. Social exclusion and mental health issues of transgender community in Lahore City. FWU J Soc Sci 2023; 17(1): 1-15.
DOI: https://doi.org/10.51709/19951272/Spring2023/1
5. Sabir K, Anmol Minaz, Sarmad Soomar, Dossa K. Transgender community in Pakistan: A look into challenges and opportunities. ResearchGate [Internet]. 2019; Available from: https://www.researchgate.net/publication/342702721_Transgender_community_in_Pakistan_A_look_into_challenges_and_opportunities [cited 2026 Aug 1]