



Illustrative Gender Indicators for Tuberculosis

Sex-Disaggregated Indicators:

Proportion of children (by sex) who have received the Bacillus Calmette–Guérin (BCG) vaccination

The percentage of people (by sex and age) who have been tested for TB

The prevalence of TB (by sex and age)

The incidence of TB (by sex and age group)

Knowledge, perceptions, and beliefs about TB and its symptoms (by sex)

Access to healthcare and TB facilities (by sex)

Health-seeking behavior and use of healthcare and TB services (by sex)

Gender-Sensitive Indicators:

The percentage of currently married women who usually make a decision about their own healthcare, either by themselves or jointly with their husbands

The percentage of men and women who hold gender-equitable beliefs (on the Gender Equitable Men [GEM] Scale) (Nanda, 2011)

The existence of a multisectoral TB strategy that includes gender, addressing the needs and vulnerabilities of men, women, girls, and boys.

Laws, regulations, or policies that present obstacles to effective TB prevention, treatment, care, and support for marginalized populations or vulnerable groups

The Importance of Gender in Tuberculosis Data

Addressing gender when monitoring and evaluating tuberculosis (TB) projects helps ensure equity in access and benefits for men and women. This brief establishes the importance of gender in monitoring and evaluation activities and suggests indicators to reveal and explain gender gaps in TB outcomes.

Background

Gender explores the sociocultural roles assigned to men and women, and the dynamics between them. These roles and dynamics are almost always present and, along with one's biological sex, are important drivers of TB outcomes. Gender influences transmission, testing, treatment, and adherence, and outcome data clearly reflect gender inequalities, as the examples below show:

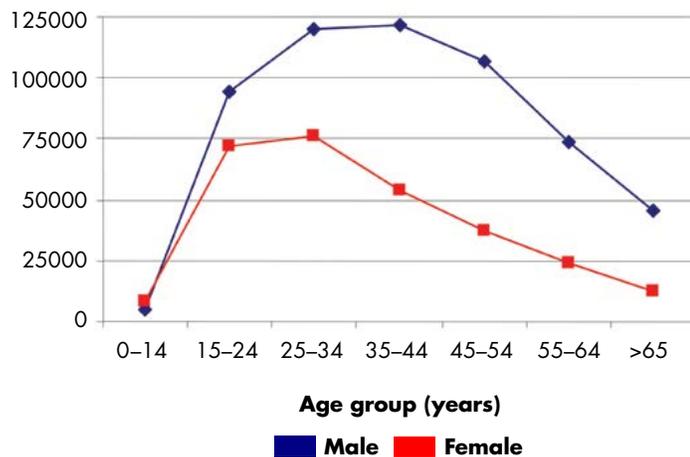
- TB is one of the top five killers of adult women, ages 20–59 years (World Health Organization, 2015).
- TB is the reported cause of 6–10 percent of all maternal mortality in settings with low HIV prevalence, and 15 percent in settings with high HIV prevalence (United Nations Development Programme, 2015).
- TB progresses more quickly in women of reproductive age than in men of the same age group (United Nations Development Programme, 2015).
- Girls are more vulnerable to TB than boys, but between the ages of 10–16, men and boys begin reporting at greater rates than women and girls (World Health Organization, 2002).
- Women often have less access to TB treatment and prevention services than men and are unlikely to undergo sputum smear examination (United Nations Development Programme, 2015).
- Of the estimated 9 million people who developed TB in 2013, more than 60 percent were men, and nearly two-thirds of the estimated 1.5 million TB deaths in 2013 were among men (Van den Hof, Najlis, Bloss, & Straetemans, 2010).

The United States Agency for International Development seeks to understand gender differences, both to improve the overall impact of its TB programs and to ensure that women and men have equitable access to the health services they need. Evaluation activities can help determine whether TB activities promote gender equity or exacerbate gender inequalities.

Integrating Gender in TB Data

How gender influences tuberculosis has been a neglected research area, and little attention has been paid to gender in tuberculosis control. The first step to understanding potential gender inequalities is to disaggregate key indicators by sex. The resulting data can identify where, when, and if gender inequalities exist.

Figure 1. Notifications of new smear-positive TB cases, by sex and age, Southeast Asia



Source: World Health Organization South-East Asia Regional Office

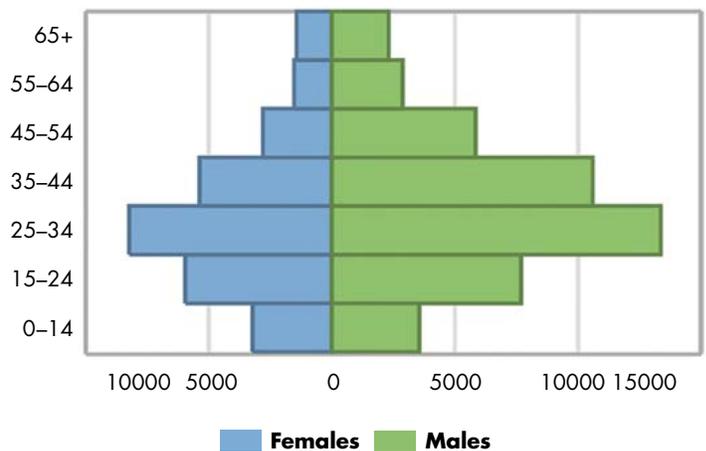
Most routine health information systems do not disaggregate TB outcome data by sex beyond the facility level, so advocacy for disaggregation in these systems should be a priority. Currently, the World Health Organization (WHO) recommends that TB data collection and reporting forms at the district level include TB case registration by sex and age. But TB outcomes are not registered by sex, so the picture of gender is incomplete. This omission is particularly significant in light of the Sustainable Development Goals (SDGs), which contain a target (3.3) that aims to disaggregate TB incidence data by sex.

Underlying gender norms and expectations that drive inequalities can be monitored and evaluated using gender-sensitive indicators. These indicators can be used to illuminate gender inequalities when other methods of analysis of program-specific trends are not possible. For example, Demographic and Health Surveys (DHS) collect household decision making information that can sharpen our understanding of gender dynamics—such as who in a couple decides whether to seek healthcare—that may influence health outcomes in a given population.

For example, an annual review of Kenya's TB data reveals that in 2015, more males than females tested positive for TB. The higher rate of positive TB tests for men may be a result of higher exposure rates, greater susceptibility (owing to higher smoking rates), or more time spent in confined spaces with others who have TB. The disparity between men and women may also be related to the lower notification rates reported among women. Women may underreport and seek care inadequately because of time and financial constraints; insufficient access to income; and inequalities in legal rights, social status, and education. Gender-sensitive indicators—such as gender norms related to healthcare decision making or traditional occupational roles—can help explain why these differences exist. TB programs should evaluate age- and sex-specific data and establish whether access to care is lower for either sex owing to structural and/or social barriers or underdiagnosis. This information can be used to make decisions about where to focus programs. For example, in response to evidence of social barriers to men's participation in treatment, Kenya began a TB campaign addressing men.

If data cannot be disaggregated, a periodic review of TB client case files at selected health clinics could help to generate data by sex. Qualitative research methods (such as focus group discussions or individual in-depth interviews with patients, providers, and others) may also help to identify gender-related issues in care-seeking and other TB-related behaviors.

Figure 2. Notified cases by age group and sex



Source: Kenya's 2015 TB profile (World Health Organization)

Key Gender and Tuberculosis Questions

One can ask a number of questions to assess if and how gender influences TB data and outcomes. We list some here:

- Are there differences in exposure or risk between men, women, boys, and girls?
- Are differences in exposure or risk a result of traditional gender norms, expectations, behaviors, or occupations?
- Are there gender differences in access to information or knowledge about TB?
- Are there gender differences in who is being immunized for TB?
- Are there gender differences in who is accessing treatment for TB?
- Are there gender differences in who is completing referrals for TB treatment or testing?
- Are there gender constraints around who has the authority to access health services?
- Are there gender-related patterns in treatment outcomes?
- Do women need permission to seek services for themselves or their children?
- Are there social or cultural perceptions about obtaining medical treatment?
- Are women or men more likely to care for the sick?

Resources

- Borgdorff, M. W., Nagelkerke, N. J., Dye, C., & Nunn, P. (2000). Gender and Tuberculosis: A Comparison of Prevalence Surveys with Notification Data to Explore Sex Differences in Case Detection. *International Journal of Tuberculosis and Lung Disease* 4, 123–132. Retrieved from <https://www.ncbi.nlm.nih.gov/pubmed/10694090>
- Holmes, C. B., Hausler, H., & Nunn, P. (1998). A Review of Sex Differences in the Epidemiology of Tuberculosis. *International Journal of Tuberculosis and Lung Disease*, 2(2), 96–104. Retrieved from <https://www.ncbi.nlm.nih.gov/pubmed/9562118?dopt=Abstract>
- Rangan, S. & Uplekar, M. (1998). Gender Perspectives of Access to Health and Tuberculosis Care. In Diwan, V., Thorson, A., & Winkvist, A., (Eds.), *Gender and Tuberculosis*. The Nordic School of Public Health: Göteborg, Sweden.
- Uplekar, M. W., Rangan, S., Weiss, M. G., Ogden, J., Borgdorff, M. W., & Hudelson, P. (2001). Attention to Gender Issues in Tuberculosis Control. *International Journal of Tuberculosis and Lung Disease*, 5(3), 1–5. Retrieved from <https://www.ncbi.nlm.nih.gov/pubmed/11326820>
- Uplekar, M., Rangan, S., Ogden, J. (1999). Gender and Tuberculosis Control: Towards a Strategy for Research and Action. Draft paper. World Health Organization: Geneva, Switzerland. Retrieved from <http://apps.who.int/iris/handle/10665/66552>

References

1. World Health Organization (WHO). (2015). Tuberculosis in women. Geneva, Switzerland: WHO. Retrieved from http://www.who.int/tb/publications/tb_women_factsheet_251013.pdf
2. United Nations Development Program (UNDP). (2015). Discussion paper: Gender and tuberculosis. New York, NY: UNDP. Retrieved from <http://www.undp.org/content/undp/en/home/librarypage/hiv-aids/gender-hiv-and-health-discussion-papers.html>
3. World Health Organization (WHO). (2002). Gender and tuberculosis. Geneva, Switzerland: WHO Department of Gender and Women's Health. Retrieved from <http://www.who.int/gender-equity-rights/knowledge/a85584/en/>
4. Van den Hof, S., Najlis, C. A., Bloss, E., & Straetemans, M. (2010). *A systematic review on the role of gender in tuberculosis control*. Washington, DC: United States Agency for International Development. Retrieved from https://www.kncvtbc.org/uploaded/2015/09/Role_of_Gender_in_TB_Control.pdf
5. Nanda G. (2011). Compendium of gender scales. Washington, DC: FHI360/C-Change. Retrieved from <https://www.c-changeprogram.org/content/gender-scales-compendium/>



Definitions

Gender is the culturally defined set of expectations about the roles, rights, and responsibilities associated with being female and male, as well as the power relations between and among people based on those expectations. Gender varies over time and within and between cultures. Transgender persons, whether they identify as women or men, are also subject to these gender expectations. (Interagency Gender Working Group [IGWG])

Sex refers to the classification of people as male or female. At birth, infants are assigned a sex based on a combination of bodily characteristics including chromosomes, hormones, internal reproductive organs, and genitalia. (USAID, March 2012 Gender Equality and Female Empowerment Policy)

Gender identity refers to a person's deeply felt internal and individual experience of gender, which may or may not correspond with the sex assigned at birth. It includes both the personal sense of the body, which may involve, if freely chosen, modification of bodily appearance or function by medical, surgical, or other means, and other expressions of gender, including dress, speech, and mannerisms. (American Psychological Association [APA], 2015)

Sexual orientation refers to whom a person is physically, spiritually, and emotionally attracted. Categories of sexual orientation typically have included attraction to members of one's own sex (homosexual), attraction to members of the other sex (heterosexual), and attraction to members of both sexes (bisexual). While these categories continue to be widely used, sexual orientation does not always appear in such definable categories and instead occurs on a continuum and is fluid for some people. (APA, 2012) Public health professionals often use the abbreviations MSM (men who have sex with men) and WSW (women who have sex with women) as neutral terms to describe sexual activity of individuals, which may not necessarily correlate with a person's sexual orientation.

Gender equality is the concept that all human beings, both men and women, are free to develop their personal abilities and make choices without the limitations set by stereotypes, rigid gender roles, or prejudices. Gender equality means that the different behaviors, aspirations, and needs of women and men are considered, valued, and favored equally. It does not mean that women and men have to become the same, but

that their rights, responsibilities, and opportunities will not depend on whether they are born male or female. (Global Fund Gender Equality Strategy, 2009)

Gender integration entails identifying gender differences and resulting inequalities pertaining to specific programs and projects. Gender integration is the process of addressing these differences and inequalities in the design, implementation, monitoring, and evaluation of programs. (USAID, March 2012 Gender Equality and Female Empowerment Policy)

Gender analysis is a systematic way of looking at the different impacts of development, policies, programs, and legislation on women and men that entails, first and foremost, collecting sex-disaggregated data and gender-sensitive information about the population concerned. Gender analysis can also include the examination of the multiple ways in which women and men, as social actors, engage in strategies to transform existing roles, relationships, and processes in their own interest and in the interest of others. (Global Fund Gender Equality Strategy, 2009)

Sex- and age-disaggregated indicators are regular health indicators that are presented both for men and women or boys and girls. We emphasize disaggregating by sex, because most data are collected according to male and female sex. However, some surveys are beginning to include other identities, such as transgender, in which case the data would be disaggregated by gender identity. Striving to include all gender identities in future M&E efforts will enhance health- and gender-focused programs, by allowing them to understand and respond to all gender differences. (Population Reference Bureau's Framework to Identify Gender Indicators for Reproductive Health and Nutrition Programming, 2002)

Gender-sensitive indicators are those that address gender directly and go beyond sex disaggregation alone—for example, gender-based violence, as well as other more complex indicators such as gender attitudes and norms, power differences, female autonomy, and access to educational and economic opportunities. Gender-sensitive indicators should be disaggregated by sex, when possible. Gender-sensitive indicators make it easier to assess how effectively gender dynamics that negatively influence health service access and outcomes have been addressed. (USAID, ADS Chapter 205)

MEASURE Evaluation

University of North Carolina at Chapel Hill

400 Meadowmont Village Circle, 3rd Floor

Chapel Hill, NC 27517 USA

Phone: +1 919-445-9350 • measure@unc.edu

www.measureevaluation.org

MEASURE Evaluation is funded by the U.S. Agency for International Development (USAID) under terms of Cooperative Agreement AID-OAA-L-14-00004 and implemented by the Carolina Population Center, University of North Carolina at Chapel Hill in partnership with ICF International, John Snow, Inc., Management Sciences for Health, Palladium, and Tulane University. The views expressed in this presentation do not necessarily reflect the views of USAID or the United States government. FS-17-205F

