



## INDONESIA TUBERCULOSIS ROADMAP OVERVIEW, FISCAL YEAR 2024

This is an overview of the USAID/Indonesia FY 2024 Tuberculosis (TB) Roadmap, implemented with the FY 2023 budget; it was developed in consultation with the National TB Program (NTP) and with the participation of national and international partners involved in TB prevention and care in the country.

In 2022, Indonesia made significant progress in TB case detection, with 708,658 TB case notifications compared to the previous year, when only 432,577 people were notified. Childhood TB notifications increased 164 percent compared to 2021, and the number of people notified in the private sector increased by 100 percent; however, incidence estimates also increased in 2022, surpassing one million, with an overall case detection rate of 67 percent. Drug-resistant TB (DR-TB) notifications increased by 50 percent, but of the estimated 31,000 people who developed rifampicin or multidrug-resistant TB (RR/MDR-TB), only 11,833 (38 percent) were diagnosed and notified, and 7,745 (65 percent) of those notified initiated treatment.

The National Tuberculosis Strategy for Tuberculosis Care and Prevention in Indonesia is a National Strategic Plan (NSP) updated in early 2023 that covers 2020-2026; it aims to accelerate the TB elimination in Indonesia by 2030 and to end the Tuberculosis epidemic by 2050. The revised NSP has set a specific target of reducing TB incidence from 319/100,000 in 2017 to 190/100,000 in 2026.<sup>1</sup>

The NSP targets all people with TB symptoms as well as at-risk groups, including (1) household contacts of those with bacteriology-confirmed TB; (2) those clinically at high risk (e.g., people who smoke, the malnourished, diabetics, the elderly, people living with HIV/AIDS and immunocompromised persons); (3) settings where people congregate (e.g., inmates of penitentiaries/detention centers, urban slums, informal/formal workplaces, closed mining facilities, refugees camps, barracks, and boarding schools); and (4) health care workers treating those with TB.

The current five-year strategy focuses on four substantial interventions:

(1) Programmatic Management of Drug-Resistant Tuberculosis (PMDT): The strategy aims to provide comprehensive, high-quality PMDT services, ensuring universal access to care and treatment for DR-TB; (2) Public-private mix (PPM): To improve TB notification rates by engaging the private sector in delivering quality TB care and notifying TB cases to the NTP

---

<sup>1</sup> The Ministry of Health Republic of Indonesia. National Strategy of Tuberculosis Care and Prevention in Indonesia 2020-2026. 2023



through the district level PPM approach (DPPM); (3) Lab capacity improvement: The strategy aims to increase DST coverage by optimizing utilization of GeneXpert, expanding the sputum transportation system; establishing more TB culture laboratories and piloting Health Technology Assessment (HTA) as new rapid diagnostic tools emerge, and (4) TB preventive therapy: The strategy promotes using TB preventive therapy as a protective measure for contacts who have been in contact with individuals with TB.

The proposed FY 2023 USAID TB budget for Indonesia is \$22 million. With this level of funding, USAID will support the following technical areas:

## **REACH**

### *TB diagnosis*

With FY23 funds, USAID/Indonesia will prioritize TB case finding for adults and children and support the TB diagnostic network. Approximately 40 percent of all annual funding will be allocated to partners in 2024 to focus on TB case finding. Key activities planned to support TB diagnosis are:

- Assisting the government of Indonesia (GoI) in intensifying active TB case finding in public facilities and hospitals, further scaling up active case finding (ACF) in private hospitals, and deploying mobile teams in communities for Chest X-Rays (CXR) and GeneXpert (GX) screening and testing.
- Building on the 2023 “screen all” pilot approach and implementing the “quickly find the patients, isolate them safely, and treat appropriately” or Tempo strategy in public and private hospitals.
- Planning to support the NTP in strengthening phenotypic drug susceptibility testing (DST) across laboratory networks.
- Supporting the scale-up of Truenat, BDMAX, and the introduction of sequencing technology for TB diagnosis to improve bacteriological coverage and increase testing for second-line drugs using molecular diagnostics.
- Providing technical assistance (TA) for procurement, site selection, diagnostic network assessments, development of technical guidelines, training, monitoring, and evaluation to improve the quality of TB diagnosis.
- Partnering with the Global Fund and using FY 2023 funds to support the NTP in scaling up the number of 10-color GeneXpert MTB/XDR machines to more than 500.
- Supporting the NTP in addressing systemic challenges with detecting TB among children (especially child contacts of adults with TB) and the scaling up of stool-based GeneXpert technology as well as the health system’s capacity for clinical diagnosis.



### *Engaging all care providers*

In FY 2024, USAID plans to improve private sector access to diagnostics by promoting district-level TB diagnostic service delivery, strengthening specimen transport systems, increasing the availability of TB drugs and commodities for private providers, and establishing a network of public-private facilities for GeneXpert testing. USAID will work with big-chain hospitals to increase TB screening among all attending outpatient departments (OPDs), initiate contact investigation, and increase access to chest X-rays (CXR) and GeneXpert testing.

USAID will initiate CXR for screening among TB household contacts and the populations at higher risk (i.e., people living with HIV, diabetes, and the elderly, regardless of the TB symptoms observed). Furthermore, USAID will foster collaboration with a coalition of Indonesian professional organizations dedicated to tuberculosis management and professional development and professional organizations (PO) in districts/cities in the selected Muhammadiyah hospital areas. This collaboration aims to support TB case finding based on their respective professional capabilities and authority.

USAID will assist providers in developing SOPs and capacity building to scale-up screening for TB symptoms, connect individuals with TB from private providers with public diagnostic centers, and initiate contact investigations among family contacts. USAID will assist the NTP in implementing public-private mix (PPM) activities at national and subnational levels. This includes developing guidelines, policies, SOPs, and other relevant documents related to PPM.

### *Community TB care delivery*

The majority of TB case finding and service delivery in Indonesia primarily occur at the primary healthcare (PHC) and community levels. At the sub-district level, Puskesmas serves as a PHC facility where community members receive various outpatient services from medical doctors and nurses. Positioned below Puskesmas are Posyandu, which are village health posts where healthcare volunteers provide limited services on a rotational and ad-hoc basis. In addition to their regular functions, Posyandu may assist with household contact investigation and locating individuals who have been lost to follow-up (LTFU) in the context of TB management.

USAID will utilize TB funds for better-quality TB care at the Pustu prima and Posyandu. This will be achieved through capacity building, training, and mentoring of nurses and community health workers (CHWs). The focus will be on TB case finding, case management, identifying and referring household contacts for TB screening, education, and treatment or TB preventive treatment (TPT) initiation.

With FY 2023 funds, USAID will support the NTP in expanding its central-level role of PHC by strengthening community engagement, policy development, SOPs, new guidelines, and developing a community-led initiative. USAID will also support expanded TB case finding using community outreach and TB screening by CXRs with AI, expanding digital tools for self-



screening and referral, and increasing screening of household contacts and children for TB disease. USAID will reach out to communities for active screening and diagnosis of cases, including children. USAID will maintain policy dialogue and stakeholder engagement and support the NTP and other engaged ministries in developing and updating TB policies and guidelines.

## **CURE**

### *Drug-susceptible TB (DS-TB) treatment*

USAID will engage with private providers to increase TB notification and treatment reporting, support treatment initiation for diagnosed individuals. In addition, USAID will work with 101 Muhammadiyah hospitals to focus on similar work. USAID will provide technical assistance to the national TB program, focusing on improving the quality of TB service delivery for both DS- and DR-TB care, introducing and piloting new approaches and treatment regimens, and bringing international best practices to the country. At the district level, the activity will pilot video DOT services, remote TB treatment monitoring, and the application of digital adherence technologies. Also, the activity will work with private general physicians and hospitals to pilot remote treatment monitoring tools and assist local NGOs with the scale-up. USAID will also work with the NTP to increase treatment success rates by ensuring all healthcare facilities have access to *Puskesmas* and community organizations that provide patient support and tracing for individuals lost to follow-up (LTFU).

### *Multidrug-resistant TB (MDR-TB) treatment*

With FY 2023 funds, USAID will prioritize addressing gaps in DR-TB control and strengthen contact investigation among household contacts of individuals with DR-TB, engage private sector providers for diagnosis and notification of DR-TB cases, and improve the data recording and reporting system. To improve access to care, USAID will assist the NTP in expanding the number of DR-TB treatment centers and incorporating DR-TB into regular TB services (achieving integration of service delivery for DS- and DR-TB) to establish at least one DR-TB treatment site in each of Indonesia's 514 districts.

USAID plans to commission a deep programmatic assessment of DR-TB gaps then in 2024 will introduce actions and mitigation activities based on the assessment report. To enhance service delivery, USAID will collaborate with priority districts to strengthen primary health centers' capacity (*Puskesmas*) to deliver DR-TB care. This will involve improving the 'skills of healthcare workers in managing and reporting adverse drug reactions, as well as providing motivation and counseling to patients. USAID will assist in enhancing DR-TB treatment quality by supporting continuation of clinical audits and monthly mini-cohort reviews; scaling up shorter regimens; scaling up patient-centered DR-TB care support as well as active drug safety monitoring (aDSM); scaling up of community-based care and support; and piloting digital adherence tools.



## **PREVENT**

### *Prevention*

With FY 2023 funding, USAID will enhance TB prevention through a comprehensive approach that includes implementing a modified TB screening algorithm in targeted districts to ensure thorough screening of all TB contacts, expanding CXR screening with AI in high-burden areas, and providing technical support for TPT uptake. USAID will complement these efforts by raising awareness about TB prevention, screening, and treatment through mass campaigns led by key opinion leaders and digital messaging.

## **INNOVATE**

### *Research*

In 2024, USAID will engage with research and academic institutions, assisting research partners and NTP in developing a national research agenda that prioritizes research topics for implementation. Through technical support and mentoring, USAID will assist in translating evidence into policy and implementing the TB program to ensure TB research in Indonesia supports the national TB agenda and that the results are used to generate strategic policies in Indonesia. In addition, USAID will assist the Mission with the workshops and roundtables to establish research consensus and set national and district-level priorities.

### *Scale up of New Tools*

USAID closely monitors the TB innovation space for new tools and technologies and welcomes partners to pilot them in the country. USAID will assist the NTP with scaling up I0-color GX instruments, piloting Truenat technology, whole-genome sequencing (WGS), and large-throughput instruments, such as BDMAX. USAID will also assist with scaling up shorter all-oral regimens for individuals with DS-TB and 3HP regimen for TPT.

## **SUSTAIN**

### *Commitment and Sustainability*

USAID will continue to engage in the subsequent policy development stages at the national level while engaging in high-level discussions on the new targets and policy settings, staying involved in the broader dissemination of new policies to guide the acceleration of TB control nationally. With the support of the Global Fund (GF) and collaboration with WHO and NTP, a new round of the national TB inventory will be conducted. The study's primary aim is to provide a reliable number of pulmonary TB cases in Indonesia. Recognizing the significance of the survey results in shaping the National TB Strategy in the future, all USAID activities will support this activity.

### *Capacity and functioning systems*

USAID will continue delivering technical assistance to strengthen Indonesia's procurement supply chain and management of TB drugs and commodities. USAID anticipates collaboration between the two mechanisms will provide support at national and select subnational levels for stronger TB supply and management systems capable of reliable forecasting, drug quality



assurance, timely distribution and reporting, and recording to prevent drug overstock and stockouts.

*Monitoring and evaluation (M&E) and Health Management Information Systems (HMIS) [and implementation of the Performance-Based Monitoring and Evaluation Framework (PBMEF)]*

In 2022, Indonesia initiated a national agenda for digital health transformation in TB; however, the ongoing effort, a fragmented TB information system, persists as a significant challenge. Most TB screening data is currently generated by community interventions funded by the GF, and recorded in a parallel TB surveillance system managed by STPI-Penabulu. In FY 2023, USAID will collaborate to integrate this community-led TB system into SITB, a national database platform, for seamless TB reporting, addressing inefficiencies, and ensuring high-quality TB data nationally. USAID will enhance the SITB platform's functionality, provide technical support to health facilities and authorities, and promote quality data for policy making.

*Human Resources for Health (HRH)*

To address persistent challenges such as health worker turnover and inadequate capacity for TB diagnosis and treatment in Indonesia, USAID will focus on expanding access to TB E-learning for healthcare workers (HCWs). This initiative aims to enhance HCWs' TB knowledge and skills, aligning with the MOH's primary health transformation agenda and USAID's Primary Impact strategy. Additionally, USAID will utilize FY 2023 funds to conduct a national human resource assessment for the TB program, informing the development of a national human resource plan. USAID will also work on enhancing Puskesmas' capacity of to oversee and coordinate quality TB services provided by PHC providers in their respective areas of focus.