



Report from the Chair of the Child and Adolescent TB Working Group on recent activities

Dr Farhana Amanullah, Chair

**Annual meeting of the Child and Adolescent TB working group,
9 October 2017, Kigali, Rwanda**

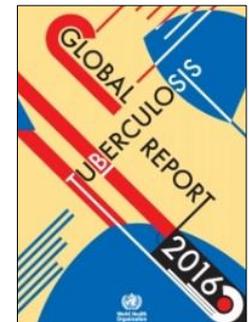
Outline

- Quick facts, risk factors and key challenges
- Scaling up the response to childhood TB: the childhood TB roadmap
- Progress since the launch of the childhood TB roadmap in 2013
- Recent activities of the working group at global, regional and country level
- Upcoming events and plans

Childhood TB: quick facts

- At least 1 million children become ill with TB every year (Global TB Report, 2016).
- Children represent about 10-11% of all TB cases; higher % in TB HBCs.
- In 2015, 210,000 children died of TB including 40,000 TB deaths among children who were HIV positive (Global TB report 2016).
- It is estimated that 67 million children are infected with TB and therefore at risk of developing disease in the future (Dodd et al, 2016).
- In 2015, globally, only 87,000 children under five (7% of the 1.2 million children eligible) were known to be provided with preventive therapy.
- Researchers estimate that 25,000 children develop multi-drug resistant TB every year (Dodd et al, 2016).

-> Launch of the Global TB Report 2017 on 31 October 2017!



Risk factors for childhood TB

- Household or other close contact with a case of pulmonary TB (especially bacteriologically confirmed pulmonary TB)
- Age less than 5 years
- HIV infection or living in household affected by HIV
- Severe malnutrition

Young children are at an increased risk of severe disease, such as TB meningitis or miliary, disseminated TB.

Three facts we need to face

1. The majority of children with TB are NOT diagnosed

- Only 39% of an estimated 1 million children with TB were notified to NTPs in 2015²

2. Children die from TB

- 210,000 children <15 died from TB in 2015²
- **Children that die are often young and/or never accessed treatment³**

3. Children exposed to TB do not access preventive therapy

- 67 million children with prevalent TB infection in 2014¹
- 87,000 or 7% of 1.2 million eligible children accessed IPT in 2015²

¹ Dodd et al. Lancet ID 2016

² WHO 2016. Global TB Report

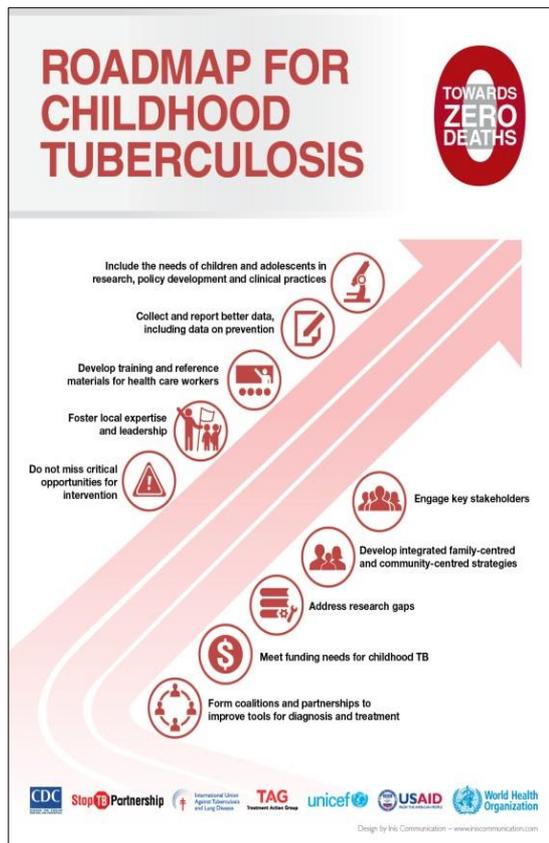
³ Jenkins et al. Lancet ID 2017

Childhood TB Roadmap: Towards Zero Deaths

- Document writing and coordination led by the Child and Adolescent TB Working group of the Stop TB Partnership
- Discusses engagement and responsibilities of policy makers, health workers and advocates at all levels
- Emphasizes broad-based approach and engagement of entire maternal and child health community
- Launched on **1 October 2013**



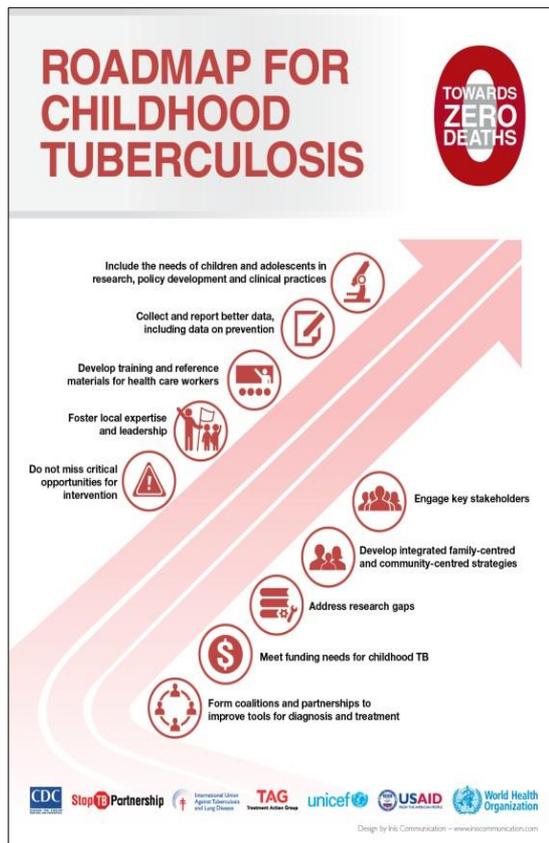
Childhood TB Roadmap: Towards zero TB deaths



Key actions to accelerate action

- Include the needs of children and adolescents in research, policy development and clinical practices.
- Collect better data, including data on prevention
- Develop training and reference materials for health workers
- Foster local expertise and leadership
- Do not miss critical opportunities for intervention

Childhood TB Roadmap: Towards zero TB deaths



Key actions to accelerate action

- Engage key stakeholders
- Develop integrated family-centered and community-centered strategies
- Address research gaps
- Meet funding needs for childhood TB
- Form coalitions and partnerships to improve tools for diagnosis and treatment

Childhood TB Roadmap: progress made since 2013

- Childhood TB now firmly on global agenda
- Countries are including childhood TB in NSP and budgets
- Childhood TB is addressed during TB programme reviews in TB HBCs
- Donors are making funding available (Global Fund, USAID, Unitaid, etc.)
- Updated guidelines, training materials and assessment tools
- Child-friendly fixed-dose combination (first line drugs) launched in December 2015 and available through the Global Drug Facility (GDF)
- Regional stakeholder meetings & Regional Task Forces on childhood TB in Africa, Americas, Europe, and the Western Pacific regions
- First national childhood TB Roadmap (Ethiopia, July 2015)
- UNICEF integration meeting (June 2016)

Child-friendly TB Fixed-Dose Combinations

For the intensive phase of treatment:

Rifampicin 75 mg + Isoniazid 50 mg + Pyrazinamide 150 mg

For the continuation phase of treatment:

Rifampicin 75 mg + Isoniazid 50 mg

Dispersible, pleasant taste.

Available through the Global TB Drug Facility (UNOPS) at a median price for a course of treatment of 15 USD.



As of April 2017, 392,785 treatments ordered by 60 countries (169,619 delivered to 27 countries)

Next steps: find the missing cases to maximize impact of the child-friendly TB Fixed Dose Combinations and improve treatment outcomes and reduce mortality.

New FDC: number of tablets per weight band

Weight band	Numbers of tablets	
	Intensive phase: RHZ 75/50/150*	Continuation phase: RH 75/50
4-7 kg	1	1
8-11 kg	2	2
12-15 kg	3	3
16-24 kg	4	4
25+ kg	<i>Adult dosages recommended</i>	

* Ethambutol needed for children with extensive disease living in settings where the prevalence of HIV or isoniazid resistance is high

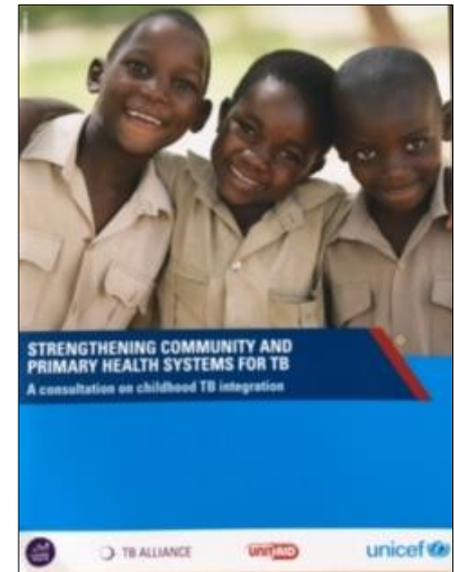
UNICEF integration meeting June 2016: Key messages

- TB remains invisible on the broader agenda of ending preventable maternal and child deaths
- Integration is only a means – it is about saving lives of children
- Strengthening the community and primary health centre platforms is essential and could avert up to 77% of maternal, newborn and child deaths
- The current funding environment contributes to fragmentation and verticalisation
- Good quality, reliable data are key
- Clear policies and guidance are needed but leadership for implementation is crucial



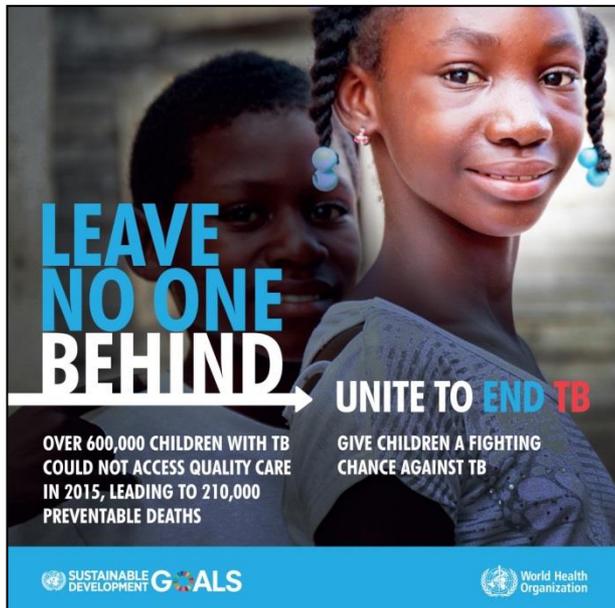
UNICEF integration meeting June 2016: Key actions

- Raise awareness and increase demand and care seeking
- Undertake routine screening of TB contacts at the household/community level
- Ensure routine risk management and referral among sick children to improve early case finding
- Decentralize diagnostic capacity for childhood TB to all facilities that can initiate treatment
- Ensure that generic training materials and management tools for integrated community case management (iCCM) in high TB and HIV burden settings are available.
- Document and share lessons learnt, best practices, cost and impact to inform scale up



Activities of the working group in 2017: at global level

- Full working group status (January 2017)
- WHO/UNICEF statement on the use of the child-friendly FDCs (WTBD, March) –photo
- UNICEF/TB Alliance lunchtime event on the occasion of World TB Day 2017 in NYC.



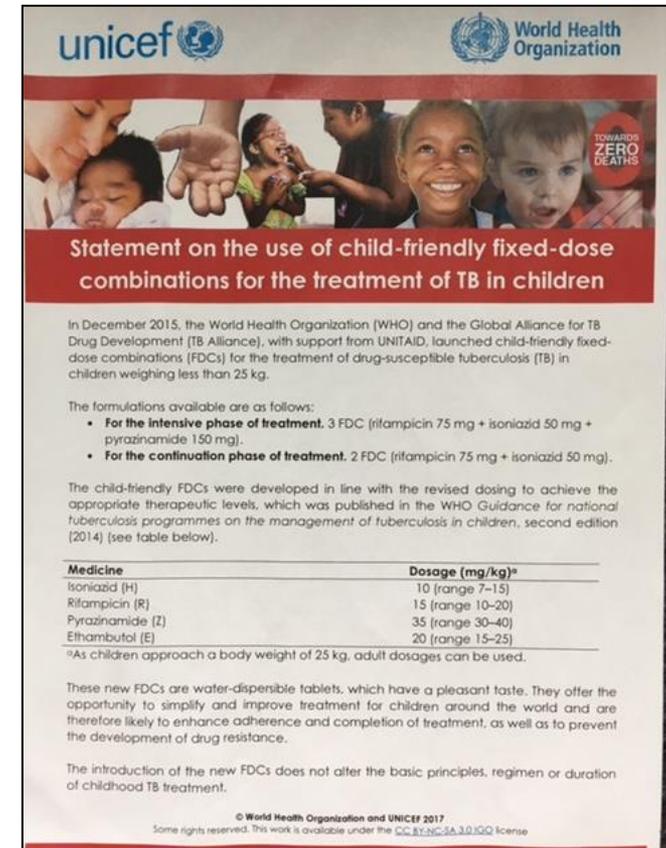
LEAVE NO ONE BEHIND

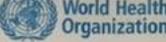
UNITE TO END TB

OVER 600,000 CHILDREN WITH TB COULD NOT ACCESS QUALITY CARE IN 2015, LEADING TO 210,000 PREVENTABLE DEATHS

GIVE CHILDREN A FIGHTING CHANCE AGAINST TB



Statement on the use of child-friendly fixed-dose combinations for the treatment of TB in children

In December 2015, the World Health Organization (WHO) and the Global Alliance for TB Drug Development (TB Alliance), with support from UNITAID, launched child-friendly fixed-dose combinations (FDCs) for the treatment of drug-susceptible tuberculosis (TB) in children weighing less than 25 kg.

The formulations available are as follows:

- **For the intensive phase of treatment.** 3 FDC (rifampicin 75 mg + isoniazid 50 mg + pyrazinamide 150 mg).
- **For the continuation phase of treatment.** 2 FDC (rifampicin 75 mg + isoniazid 50 mg).

The child-friendly FDCs were developed in line with the revised dosing to achieve the appropriate therapeutic levels, which was published in the WHO Guidance for national tuberculosis programmes on the management of tuberculosis in children, second edition (2014) (see table below).

Medicine	Dosage (mg/kg) ^a
Isoniazid (H)	10 (range 7–15)
Rifampicin (R)	15 (range 10–20)
Pyrazinamide (Z)	35 (range 30–40)
Ethambutol (E)	20 (range 15–25)

^aAs children approach a body weight of 25 kg, adult dosages can be used.

These new FDCs are water-dispersible tablets, which have a pleasant taste. They offer the opportunity to simplify and improve treatment for children around the world and are therefore likely to enhance adherence and completion of treatment, as well as to prevent the development of drug resistance.

The introduction of the new FDCs does not alter the basic principles, regimen or duration of childhood TB treatment.

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Activities of the working group in 2017: at global level

- Working group members in WHO working group to SAGE on the use of BCG (March and August 2017) – presentation to SAGE on 19 October
- The Chair participated in WHO GDG meeting on the treatment of Isoniazid Resistant TB, 27 April 2017
- NAID TB meningitis workshop, 22-23 May 2017, Washington DC, USA
- Presentation on finding the missing childhood TB during Challenge TB country directors on 2 June, The Hague, The Netherlands to inform year 4 work plan development.



Activities of the working group in 2017: at global level

- Session on childhood TB during 17th Strategic and Technical Advisory Group on TB (STAG-TB) to WHO, 12 June 2017 – update targets and timeline of the roadmap also including adolescents & reach out to MCH programmes and child health sector
- Global Fund Brown Bag on childhood TB, 14 June 2017 – countries mention childhood TB in applications but it does not always translate into funding requests!
- Third End TB Summit, 15-16 June 2017 – 32 countries and 40 partner organizations
- Video statement on paediatric TB and TB/HIV to Caritas Internationalis, meetings with the World Council of Churches



Activities of the working group in 2017: at global level

- Webinars e.g. UNICEF/CDC webinar on TB along the lifecycle: opportunities for integration of TB, HIV and MCH programmes
- TB infection workshop: building a framework for eradication (NIAID, HMS Center for Global Health Delivery), 27-28 September, Dubai
- Annual meeting on child and adolescent TB on 9 October 2017 with a session on childhood TB during WHO/AFRO RMNCH & Nutrition Program Managers meeting, 10-13 October 2017, Kigali, Rwanda

Activities of the working group in 2017: at regional level

- AFRO Childhood TB Task Force meeting, 1-2 March 2017, Kampala, Uganda
- Union workshop on childhood TB national training tools, 10-13 April 2017, Cotonou, Benin (plus Cameroon, Côte d'Ivoire, Madagascar, CAR, Togo and Senegal)
- Regional NTP managers meetings: WRPO 20-21 March in Tokyo; WHO AFRO regional meeting with national TB and national AIDS programme managers, 18-22 September, Harare, Zimbabwe



Activities of the working group in 2017: at regional level

- The Union-Asia-Pacific Conference, 22-25 March, Tokyo, Japan & the 20th conference of the Union Africa regional meeting, Accra, Ghana, 10-13 July 2017 with a post-graduate course on childhood TB on 10 July 2017
- Regional TB training for the Pacific Island countries, 21-5 August 2017, Nadi, Fiji



11-13th July 2017

UNITE TO END TB

20th Conference of the Union Africa Region

Pre-conference postgraduate course in child Tuberculosis
Theme: "Childhood and Adolescents Tuberculosis: Increasing Relevance in Ending TB"

Course fee alone: Local participants: 150 ghc;
International participants: 100 dollars

Course Content

- ☒ Childhood TB Epidemiology
- ☒ Diagnosis of child TB (TB/HIV and X-ray)
- ☒ Contact investigation/preventive therapy
- ☒ MDRTB in children (diagnosis and treatment)
- ☒ Integrating Childhood TB into routine child care services
- ☒ Creating space for adolescents with TB-Policy & logistic implications
- ☒ Clinical case scenarios

Date: 10th July 2017, **Time:** 8.00 to 16.45
Venue: Accra International Conference centre
Phone contact: 0208164433; 0244895610

Activities of the working group in 2017: at country level

- TB programme reviews: JEMM Indonesia January 2017, Kenya, 26 Feb- 10 March; Swaziland (1-13 May); Niger (19-30 June); Madagascar 24 July-5 August

Common observations: many "missing" cases; late diagnosis at higher levels of the health system; treatment outcomes not available; contact management and preventive therapy not implemented; access to Xpert MTB/RIF limited; a negative Xpert test result does not exclude TB in children!; Nutrition and HIV programmes are not screening children for TB.

- Technical Assistance to scale up the response to childhood TB: Mongolia (February); Sudan (March and August; DPRK (September)
- Workshop with TB champions in Indonesia, August 2017



Upcoming events and plans for 2018

- Representation at the First WHO Global Ministerial Conference Ending Tuberculosis in the Sustainable Development Era: a Multi-sectoral Response, 16-17 November 2017, Moscow, The Russian Federation
- WHO/EURO regional meeting on childhood TB (December 2017)
- Representation at UN General Assembly session on TB (September 2018)
- Paediatricians participating in upcoming Programme reviews in TB high-burden countries
- Keep addressing requests for technical assistance
- 2018 Annual meeting with a focus on Asia: finding the missing cases in the private sector/PPM



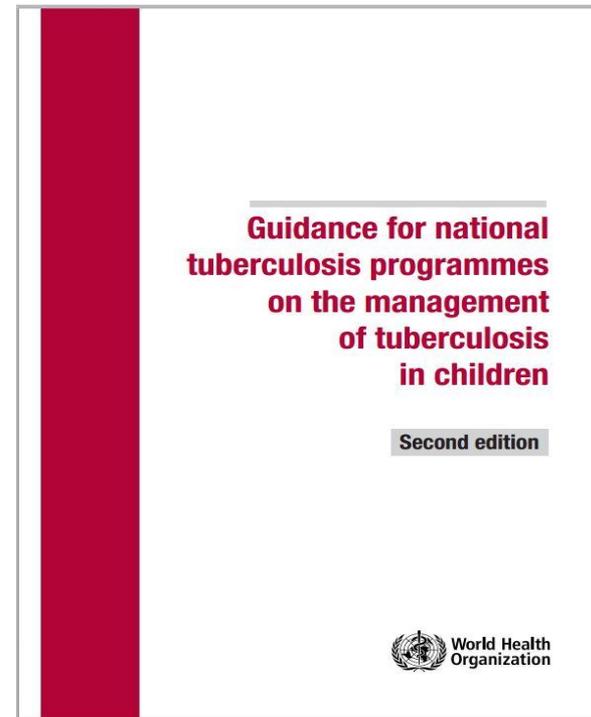
Thank you for your attention to childhood TB !

Interested to join the working group?

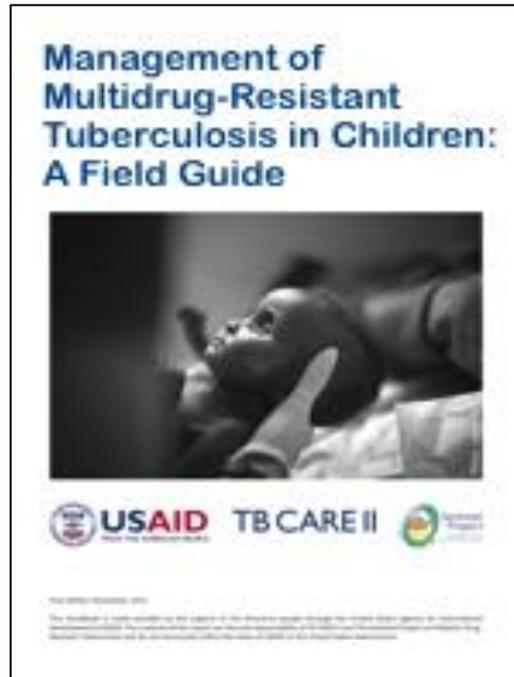
Please send an email to Annemieke Brands (secretariat) at brandsa@who.int

Further background information on childhood TB is available on: <http://www.who.int/tb/areas-of-work/children/en/>

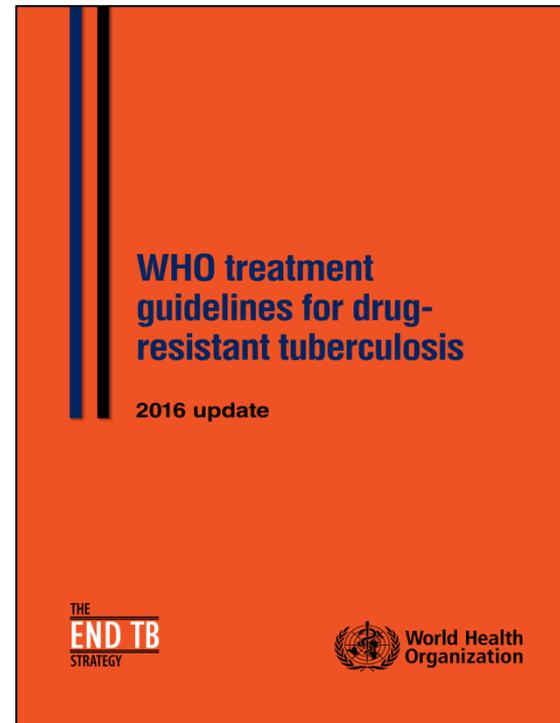
Guidelines and tools available at global level



Guidelines and tools (continued)



<http://www.tbcare2.org/>



<http://www.who.int/tb/areas-of-work/drug-resistant-tb/treatment/resources/en/>

Guidelines and tools (continued)



Framework for conducting reviews of tuberculosis programmes

Framework for conducting reviews of tuberculosis programmes

Assessing activities to address childhood TB

Objectives: at the end of the assessment reviewers should comment on –

- the place of childhood TB in the national TB policy;
- the appropriateness of the procedures used to identify TB in children;
- the quality of the case-management of children with TB;
- the appropriateness of the data collected on childhood TB;
- the actions that need to be taken to improve approaches to childhood TB.



KNCV benchmarking tool for Childhood TB policies, practice and planning

Background

Diagnosing TB in children is more difficult than in adults and treatment for children needs to take into account the specific needs of children and their families. Children with TB differ from adults in their response to the disease; they are at increased risk to develop to serious forms of TB, especially TB meningitis and miliary TB; they also are at an increased risk of progressing from primary TB infection to active TB, and are therefore a target group for preventive treatment.

Therefore TB control interventions need to address the specific vulnerabilities and needs of children and their families.

WHO has developed guidance for countries how to address childhood TB; countries are in the process of aligning their policies with these guidelines.

The benchmarking tool

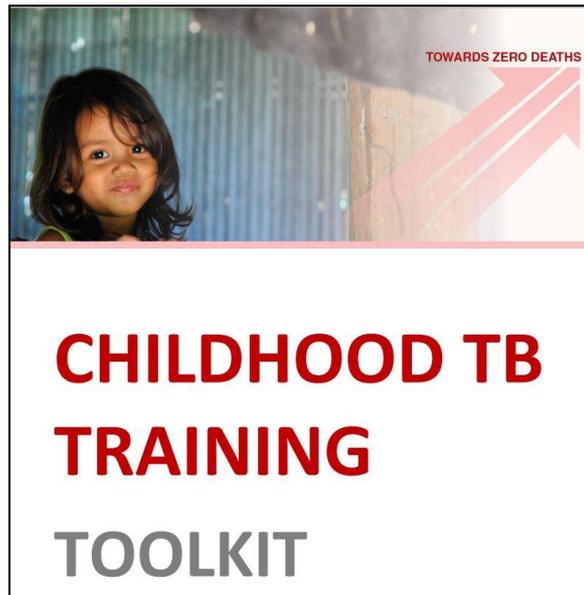
Objective: The benchmarking tool is a self-assessment tool, meant to serve as a basis for discussions, brainstorming, and strategic planning and as a tool for monitoring progress in the realization of childhood TB policies towards alignment with WHO guidelines, in the framework of a TB program.

The tool provides insight in:

- Political commitment, management and partner coordination for childhood TB, also including human resource development and data collection.
- Technical approaches for childhood TB and the place of childhood TB in the national TB policy, like the appropriateness of the procedures used to identify TB in children and the quality of the case-management of children with TB.
- The status of implementation of the national childhood TB policies and access to Childhood TB care.
- The agreed actions to improve approaches or implementation of childhood TB.

This benchmarking tool is based on the WHO 'Framework for conducting reviews of tuberculosis programmes – Assessing activities to address childhood TB' and the Second Edition of the WHO Guidance for national Tuberculosis programmes on the management of tuberculosis in children (2014). From these documents a benchmarking tool was created.

Guidelines and tools (continued)



<http://www.who.int/tb/publications/>



<https://childhoodtb.theunion.org/>