

Stop TB Partnership

 **KELIN**
Reclaiming Rights, Rebuilding Lives



Tuberculosis: A Gender Assessment in Kenya

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P O Box 112-00202, KNH

Tel: +254 20 386 1596, 251 5790

Nairobi, Kenya

www.kelinkkenya.org

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P O Box 13776-00800, Nairobi

Tel: +254 708 484 878/ +254 714 214 303

Nairobi, Kenya

Table of Contents

Abbreviations and Commonly used Terms	iii
Acknowledgements:	iv
Executive Summary	1
Results	1
Conclusion.....	2
TB and Gender Recommendations from findings	2
TB Key Populations Recommendations from findings	3
Introduction	5
Methodology.....	6
Part I: Literature Review Findings.....	7
1.1. Men and Tuberculosis	7
1.2. Women and Tuberculosis	7
1.3. Tuberculosis and Age	8
1.4. TB and Gender in Kenya.....	8
1.5. National TB and Gender data	9
Part II: Gender related barriers to accessing TB services in Kenya.....	12
2.1. Gender norms and TB in Kenya	12
2.2. Social and Economic Factors	13
2.3. Stigma	14
2.4. Physical.....	14
2.5. Treatment adherence ignorance	14
2.6. Provider or health system level	14
2.7. Legal and Policy Environment Gender and TB.....	14
2.8. Women’s empowerment and demographic and health outcomes.....	14
Part III: Assessment Findings.....	16
3.1. Stakeholder Buy In Workshop	17
3.2. Key Informant Interviews.....	17
3.3. TB Gender related barriers.....	18
3.4. TB Gender responsive solutions in place.....	21
3.5. TB Key Populations.....	21
3.6. TB KP responsive solutions in place.....	25
3.7. How does KP interact with gender?.....	28
3.8. Validation Workshop.....	28
Conclusion	30
End Notes.....	31

Abbreviations and Commonly used Terms

AIDS	Acquired Immunodeficiency Syndrome
ANC	Antenatal clinics
ART	Antiretroviral Therapy
CHEW	Community Health Extension Worker
CHV	Community Health Volunteer
CTLC	County Tuberculosis, Leprosy and Lung Disease Coordinator
DICES	Drop in centers
DR-TB	Drug resistant TB
DS-TB	Drug sensitive TB
HCW	Healthcare workers
HF	Health facility
HIV	Human immunodeficiency virus
HSIP	Health Subsidy Insurance Programme
IDU	Injecting Drug User
IEC	Information Education and Communication
KDHS	Kenya Demographic and Health Survey
Kg	kilogram
KP	Key Population
LGBQIT	Lesbian, Gay, Bisexual, Queer, Intersex and Transgender
MCH	Maternal and Child Health
MDR-TB	Multi-drug resistant TB
MFL	Master facility code
MSF	Médecins Sans Frontieres
MSM	Men who have sex with men
NACC	National AIDS Control Council
NASCOP	National AIDS & STI Control Programme
NHIF	National Hospital Insurance Fund
NSP:	National Strategic Plan
NTLD-P	National Tuberculosis, Leprosy and Lung Disease Programme
NTSA	National Transport and Safety Authority
OBA	Output-Based Approach
PLHIV	People living with HIV
PMTCT	Prevention of Mother to Child Transmission of HIV
PSV	Public Service Vehicle
SIG	Special Interest Groups
STI	Sexually Transmitted Infections
SW	Sex worker
TB	Tuberculosis
UNDP	United Nation Development Programme
WHO	World Health Organization
<i>Boda boda</i>	Motorcycle transporters
<i>Jua kali</i>	worker loosely translates to 'hot sun', this is an individual who works in the informal sector and is exposed to weather elements such as the sun during work. Jua kali workers include ironsmiths etc.
<i>Matatu</i>	Mini-Van (privately owned but for public transportation)

Acknowledgements



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A handwritten signature in black ink, appearing to read 'Allan Maleche'.

Allan Maleche
Executive Director (KELIN)

Executive Summary

TB affects men and women differently, epidemiologically, biologically and socially. In order to eliminate TB, a TB response must address the gender-related barriers to accessing TB services and include key and vulnerable populations.

The objective of this assessment was to document literature review and the perceptions on TB and Gender in Kenya from key interviewees, focus group discussions and stakeholder workshops. This assessment was the first of its kind in Kenya.

Results

In all the surveyed counties, it emerged that females are more likely to seek health care earlier and more frequently than males. However, females outside Nairobi may face socio-economic barriers to accessing health services since they are usually poorer than men.

As a result of financial disadvantage, some women have to request permission from their husbands so as to seek health services. Money and power are barriers to health services for women. There is pressure for males to be seen as strong and macho and this may hinder them from seeking health services for a cough.

Additionally, the labour work force in Kenya is largely informal and getting time off work to go to a health facility is challenging for casual labourers who are usually paid per day; this is a barrier to accessing health services during work hours (8 am to 5 pm) and also violates the rights of the casual workers.

Majority of the casual labourers in quarries (mines), fishing industry, privately owned public transportation system are male, the lack of freedom

to have permission from casual labour employers for sufficient time to seek health services without losing money could be a major contributor to poor health seeking behaviour in males in Kenya.

The health facility work hours (8am to 5 pm) are inconvenient hours for the working patient, for the reasons outlined above. Additionally, TB services are usually only offered in the morning.

Nineteen (19) TB key populations collectively were identified by the four CTLCs we interviewed. Non-CTLCs indicated that prisoners, prison staff and school going children are TB KPs, including this population, yields 22 TB KPs that were collectively identified by interviewees. Further studies are needed to identify TB key populations in all the 47 counties.

All the sampled CTLCs indicated that sex workers are a TB key population and three counties indicated that PLHIV, slum dwellers, fishing population and healthcare workers are TB key populations. Our findings show that different counties may have unique TB key populations based on the dominant occupation and residence (geographic location), such as the fishing population and islanders in counties that have archipelagos.

CTLCs are responding to their unique TB key populations but in an unsustainable way since there is no budget allocated to sustain activities. A major recommendation is the need for a national study to determine the gender related barriers to accessing TB services and determine the TB key populations in all the 47 counties, so as to inform effective gender responsive and key population centered TB policies and management, other recommendations are found in the assessment findings chapter under recommendations and Appendix 1.

Conclusion

1. There is limited evidence regarding the impact and barriers of gender on accessing TB services in Kenya. So as to be more effective, the NTLD programme needs to implement gender responsive interventions when offering TB services.
2. The impact of culture and gender on accessing TB services needs to be investigated in all 47 counties, since the various ethnicities are not equally distributed throughout the country. So that evidence based TB policies are developed that take into account the gender and cultural barriers for the elimination of TB to be realized in 2035.
3. Kenya has not conducted a holistic mapping on who the TB key, vulnerable and underserved populations are; which differ from county to county and depend on the lifestyle, occupation, geographic location and other determinants.
4. The government both at the national and county levels needs to embrace the human rights approach in the delivery of TB services. A human rights based approach to offering TB services will address any gender inequalities, discriminatory practices and any unjust power relations, which may be at the core TB service delivery.
5. The need to acknowledge, address and respond to the needs of TB and TB-HIV co-infected persons who are transgender has largely been neglected by the NTLD-P. In addition, the TB register does not capture the transgender population and may need to be updated to reflect this population.

TB and Gender Recommendations from findings

Recommendations to National and County Government with input from Civil Society

1. **A national survey is needed to investigate the barriers to accessing TB services based on gender cultural norms in all counties.** All counties should be surveyed based on their unique socio-cultural differences and gender norms. Further studies are needed on how to offer effective gender responsive TB services in the various counties.
2. **The patient hospital triage form should have an option of 'other' in the gender section not only male and female.** The 'other' section should have room for the patients to explain themselves. More questions should be included such as whether the patient is on hormonal therapy or not. A check box on non-applicable in the gender section should also be there. This will result in all-inclusiveness of the patient forms, catering for the trans population.

Government

1. We recommend that counties should adapt gender responsive TB programming of services based on the gender and cultural norms found in the county for greater equity of services.
2. Since low ventilation in congregate settings contributes to high transmission of TB, all places of gatherings such as bars, sports bars (video dens), should have a standard infection control policy, which is regulated by Government. These mentioned places, which aren't well ventilated mostly have men frequenting them and may contribute to the high transmission of TB in men.

3. There is a great need to increase the number of hours offered for TB services in all counties, usually TB services are offered in the morning and not beyond 5pm. More people (including men and other TB KPs) would be diagnosed if public health facilities offered TB services for 24 hours. Alternatively mobile clinics that run after office hours (past 5pm) can be operated which offer TB services; a lesson learnt from a hypertension project being run by AMREF.
4. More men need to be encouraged to be nurses, CHVs and CHEWs so that male TB patients are further encouraged to seek healthcare earlier. Currently some males do not go to health facilities because they perceive that nurses (mostly female in Kenya) have a bad attitude. The nurses should be trained on how to politely cater for the needs of all genders affected by TB.

Government, Civil Society and Donors

1. More awareness is needed in seeking healthcare targeting both males, females and KPs, which will improve the health seeking behavior of the community and reduce stigma. The Government should allocate funds for TB awareness, health education on TB and treatment adherence, targeting males, females and KPs of different ages. These initiatives are usually donor funded but the Government should also contribute for a more sustainable programme.
2. The NTLD-P and civil society should work together to create more TB awareness in schools and the general public using and disseminating TB educational toolkits that have non-stigmatizing and non-alarming language on Tuberculosis. Regular reviews should be conducted on the effectiveness of such TB awareness efforts and campaigns.

Government, Technical Partners and Donors

1. There is need for more experts (and a need to train experts) that can manage paediatric TB, TB-HIV co-infection, TB-diabetes co-infection and TB-HIV-diabetes drug-to-drug interactions. The skills on the management of TB comorbidities and paediatric TB should be transferred to the nurses instead of referring patients to hospitals.
2. We recommend that the integration of TB and HIV and diabetes services in antenatal clinics (ANC) and maternal and child health clinics (MCH), integration of services should be consistently implemented in all high TB-HIV burden counties, including Busia.

TB Key Populations Recommendations from findings

Government with input from Civil Society and Donors

1. A national mapping survey is needed to identify all the TB KPs in all the counties in Kenya and there is need to analyze the current data so as to quantify the burden of TB in these key populations.
 - a. *There is need for the counties to know who their TB key populations are so that they are properly identified, budgeted for and included in the county TB programme and management. The counties should conduct county specific identification of TB KPs.*
 - b. *In the national mapping survey for TB KP, there is need to investigate how being a TB KP interacts with gender*

2. There is need to have TB policies in schools to address TB diagnosis and treatment in Kenya. Students can be screened twice a year (after every six months) and should be treated in schools for those who are in boarding school for greater convenience and to avoid missing learning hours.
 3. There is a need to develop tools to identify, collect data and offer services to TB KPs. This will ensure that TB KPs are properly identified and captured, planned for and budgeted for. Tools for monitoring and evaluating the TB key populations and services offered are also needed. These tools will help with surveillance and developing strategies for planning and funding.
 4. There is need to develop programmes targeting TB KPs for example the island communities who have other problems beyond TB that need to be addressed. The island population also need outreach programmes, which include family planning as well as other health services, requiring greater access, provision and integration of health services.
 5. The NTLD-P needs to allow greater participation of former TB patients and TB KPs when developing laws, policies and strategies, so as to take into account the needs of the TB KP and communities.
3. The TB screening card in the prisons form should have an area to select whether a prisoner is a MSM or an injected drug user.
 4. There is need for national level policies to establish a sputum transportation and referral system for the prisons that do not have GeneXpert instruments so that prisoners can be diagnosed in a timely manner, without having to physically transport them to health facilities which have GeneXpert machines.

Cross Cutting Recommendations from Findings

Government

Government

1. The Government should allocate funds towards sustaining current efforts by various counties on increasing access to TB services (prevention, care and support) on identified TB KPs, including TB screening in workplaces of TB KPs who find it difficult to leave work to be screened at the health facilities
 2. There is need to create awareness on the existence of TB KPs among healthcare workers and a need to make TB services more accessible to the people.
1. The public health act requires revision to reflect a strong legal protection for TB patients that is rights based, to protect the patient from losing employment and facing catastrophic costs during TB diagnosis, treatment and care. This will also ensure that the act is consistent with the constitution on the protection of the rights of TB patients.
 2. Community health volunteers are the backbone of community health, including health education, TB diagnosis referral and patient follow up. Counties should absorb them as a cadre into Government and budget for their salaries and timely transport allowance. HCW should share TB and health policies with CHVs.
 3. The Government should ensure that all nurses and CHV are given N-95 respirators. When CHV are visiting MDR-TB patients, they're given N-95 respirators but they are not given N-95 respirators when visiting for DS-TB patients). A N-95 respirator should be included in the TB patient pack.

4. There should be routine sensitization of HCW on the TB patient rights charter and ensure that it is displayed in all health facilities; “an informed community is a prevented community” (TB survivor).
5. There is need to increase the number of GeneXpert instruments in the whole country based on TB disease burden so as to increase access to timely TB diagnosis. The Government should place a working GeneXpert instrument in all high yield facilities, to avoid delayed diagnosis due to the sample referral system, which is usually donor funded. For example Kangemi Health center was a high yielding health facility between 2015 and 2016, yet it had no Gene Xpert instrument.
6. There is greater need for national integration and planning of TB and HIV and TB and diabetes integration, which requires greater collaboration and defined performance indicators between NTLD-P, NASCOP and Non Communicable Disease National Department. The current national TB and HIV planning has been pushed by the Global Fund but greater strategy and commitment is required at the national level to emerge with progressive policies that enable effective management of TB-HIV, TB-diabetes and TB-HIV-diabetes co-infected patients.
7. In collaboration with civil society and technical partners, the NTLD-P should always incorporate the views of TB KPs when developing national TB policies, so that the policies are responsive to the needs of the TB KPs.

A list of recommendations from this assessment with timelines is found in Appendix 1.

Introduction

Kenya is one of the 30 high burden TB countries, globally and TB remains one of the leading nine causes of deaths in Kenya. The recent national TB prevalence survey in Kenya revealed double the TB prevalence than the WHO estimates and hence TB is a major public health problem.

TB is an airborne disease and majority of the diagnosed TB cases are pulmonary (lung) TB cases, which is a communicable disease. TB is an opportunistic disease, which greatly affects the immuno-compromised such as PLHIV and diabetics. In Kenya, the HIV/AIDS prevalence rate is 5.6%, which has decreased over the years ; however there is high TB-HIV co-infection in counties with high HIV burden as observed in the sampled counties in this assessment.

It is said “TB is certainly a gender biased and is probably a sex biased infection...there is a need for such differences to be incorporated into models for TB control and forecasting”.

In Kenya, a TB and gender assessment was required to determine gender related barriers and solutions to accessing TB services (prevention, diagnosis, treatment, care and support services) so as to develop policies that are gender responsive with gender-specific interventions so as to eliminate TB by 2035 and be in line with the End TB strategy.

The End TB strategy outlines that there should be 1) Zero TB-affected families facing catastrophic costs due to TB 2) 95% Reduction of TB deaths compared with 2015 and 3) 90% Reduction in TB incidence rate compared with 2015.

The study methodology and limitations are provided below:

Methodology

This assessment was carried out using the following steps.

1. **Desk research:** this targeted relevant literature on TB/HIV and gender, laws and policies and other related reports. Some challenges were encountered in obtaining relevant, recent and accurate data. There was little information/literature on the gender aspect of health generally and on TB specifically.
2. **Working meetings with the technical committee:** held throughout the assessment process.
3. **Stakeholders' buy-in workshop:** This was held with 38 stakeholders (excluding the three consultants) from government, civil society and technical partners to introduce the assessment and obtain critical buy in from the actors. The list of stakeholders is shown in Appendix 2.
4. **Key informant interviews:** these included both face to face and telephone interviews with a number of key informants. The interviews were semi-structured in terms of following open interview method guided by a structured discussion guide. Key informants included NTLD-P officials, CTLCs at county government, CSOs, technical and implementing partners, key populations and members affected by TB. The survey covered 4 counties of Busia, Homa Bay, Kisumu and Nairobi with fifteen key informants interviewed. The consultants also held a focus group discussion. The data collection tool and list of key informants are shown in Appendix 3 and 4 respectively.
5. **Validation Workshop:** this included 36 stakeholders (excluding the three consultants) from government, civil society, those affected by TB and international NGOs where the consultants shared the assessment findings and asked the stakeholders to provide critical asks, moving forward as provided in Appendix 5.
6. Development of **TB Gender assessment report;** the literature review findings, the stakeholder buy-in workshop.

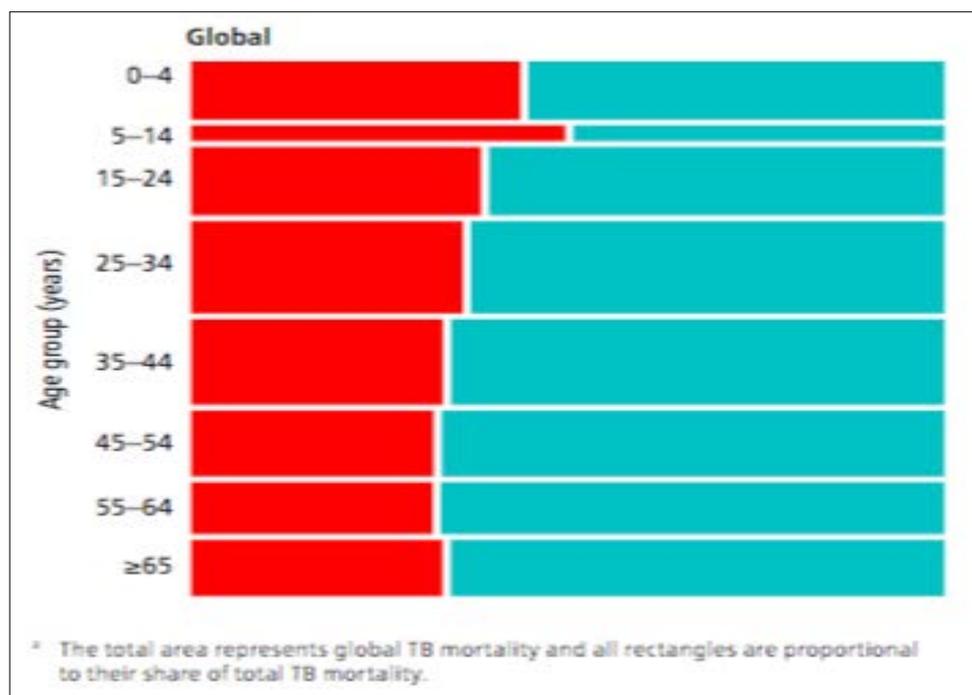


Figure 1: Total area representing global TB mortality

Part I: Literature Review Findings

Globally more men have TB than women. According to surveys in Sub-Saharan Africa (surveys include Zambia, Zimbabwe, Kenya and other countries), irrespective of the higher HIV burden in women in Sub-Saharan Africa, the burden of TB in men is still higher than women. Of the estimated 9 million people who developed TB in 2016 in the world, about 60% were men with more than half of the TB deaths occurring in males in all age groups as seen in the figure below.

Figure 1: Global TB mortality by age and sex

Source: WHO Global TB Report, 2017, page 59

TB kills more women globally than any other single infectious diseases and more women die annually of TB than all causes of maternal mortality combined and women who are co-infected with TB and HIV are significantly more likely to die of TB than co-infected men. Epidemiological studies show differences in men and women in prevalence rate and the progression from infection to disease, incidence and mortality due to TB, however, notification rates are higher in men than women in most countries (as indicated above) as lack of mobility, poverty and heavy workload of women restricts access to health care facilities.

We will use earlier definitions of gender in this assessment as the socially constructed features that are associated with men and women, such as roles, behaviors and expectations. "Gender configures both the material and symbolic positions that men and women occupy in the social hierarchy, and shapes their life experiences".

1.1. Men and Tuberculosis

The burden of TB in men is undermined and far greater than women in Africa. Several issues contribute to the higher TB burden in men including (i) delayed health seeking behavior (in comparison to women) hence late diagnosis, (ii) male TB patients are more likely to abandon TB treatment and be lost to follow up and (iii) men are more likely to die while on TB treatment; perhaps due to the delayed treatment initiation owed to the delayed diagnosis because of poor health seeking behaviour.

1.2. Women and Tuberculosis

Pregnant women, especially "in sub Saharan Africa, are an understudied group, but they are more vulnerable to infections because of a suppressed immune system during pregnancy".

HIV disproportionately affects women due to various reasons including biological, behavioral, socioeconomic, cultural and structural risk factors. "TB is a leading cause of non-obstetric maternal death in resource-limited settings"; the majority of these deaths are in high HIV prevalence areas.

About "one-sixth of all maternal deaths in referral health centers in Southern Africa were associated with TB/HIV co-infection. Furthermore, over one-third (37%) of HIV-infected mothers who were dually infected with TB were severely immuno-compromised, with CD4 counts of fewer than 200 cells/mm³".

In addition, "HIV-infected pregnant women who are co-infected with TB are 2.5 times more likely to transmit HIV to their babies than women without TB" and their babies are 24 times more likely to have neonatal TB.

Given the high TB-HIV co-infectivity rates in pregnant women in Africa; women and children are key population groups when strategizing for TB interventions. Currently in limited resource settings, there is significant delay “from the time of presentation to TB diagnosis, attributed to the low sensitivity and long turnaround time of available TB diagnostic tools, the need for multiple visits, and the non-specificity of symptoms in pregnant women, particularly those who are HIV infected”.

1.3. Tuberculosis and Age

In the above section on Women and Tuberculosis, we illustrated the high rates of TB and HIV transmissions to infants from TB-HIV co-infected mothers. The WHO started reporting pediatric TB data as late as the year 2012, which demonstrates that for a long time, TB control in children was a neglected issue.

This neglect led to the great paucity of TB prevalence and epidemiological data in children as well as a chronic shortage of paediatric TB specialists, globally. The Sentinel Project identified 3 key issues, which need to be addressed within paediatric TB centering on prevention, diagnosis and treatment.

Furthermore, BCG vaccination is not recommended for children with symptomatic HIV infection. BCG vaccine is not effective in preventing pulmonary TB in children, which is the most common type of diagnosed TB; the vaccine is most effective against the devastating meningitis TB in children.

Diagnosis of pulmonary TB within children is a great challenge, as most children cannot produce good quality sputum, which is required to diagnose pulmonary TB in children using old diagnostic methods such as microscopy as well as the newer GeneXpert MTB/Rif instrument. Specialists use gastric lavage to extract sputum from children for

pulmonary TB testing; a process which is invasive and requires both specialized skill and equipment. According to the Sentinel project, there is both weak TB referral system and contact tracing for children in homes with adults who have TB. There are several other issues within paediatric TB such as lack of child-friendly drug formulations for drug resistant TB.

More background on the history on national TB and HIV integration is provided in Appendix 8.

1.4. TB and Gender in Kenya

The current Kenya National Strategic Plan (NSP) on Tuberculosis acknowledges that gender inequalities can impact health risks, health seeking behaviour and responses from health systems, which lead to poorer outcomes.

The NSP acknowledges the need to undertake responsive programming, which takes into account the prevailing gender norms or undertakes gender transformative programming, so as to mitigate harmful gender norms that are barriers to accessing health services.

The NSP notes the necessity of conducting active case finding in communities affected by TB, reaching out to women and the poor, who do not have access to services without paying for transportation. Integrating TB services into Reproductive Maternal and Child Health (RMNCH)-related health services to facilitate access by women and girls is another priority within the NSP.

However, there are no interventions targeted towards men (who are disproportionately affected by TB in Kenya) to reduce their barriers to accessing TB services.

Conducting a baseline survey to document the magnitude and nature of gender disparities in TB is one of the goals stated within the strategic plan. However, no baseline survey has been conducted yet and the strategic plan lapses at the end of 2018.

1.5. National TB and Gender data

Our literature review findings are presented based on two genders, male and female, since there are no studies on the transgender population and accessing TB services in Kenya.

National TB prevalence survey

The first national TB prevalence survey in Kenya since independence was finalized in 2016. The objectives of the survey were to determine:

- the TB prevalence and
- health seeking behaviour of TB patients so as to
- inform country planning and policy formulation in line with the [End TB strategy](#).

The survey included 76 291 TB patients from 45 counties out of the 47 counties, of which 42 723 (56%) were females and 33 568 (44%) were males, no transgender were included. As seen in the graph below, the prevalence survey revealed males had twice the prevalence of TB than females (809 versus 359 per 100 000 population, respectively) and that more males are likely to be missed TB cases than females, however the study was not powered to determine why.

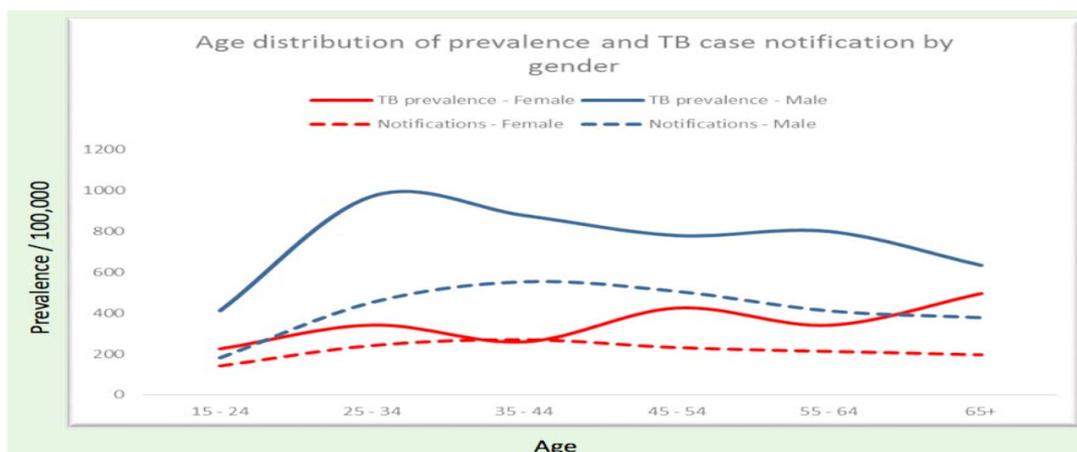


Figure 2: TB prevalence by gender and age in Kenya. Source: Kenya National TB Prevalence Survey, 2016

Those with the highest TB prevalence were found to be males in the 25-34 years age group (972 per 100 000 population) and females older than 65 years old (495 per 100 000 population). The highest burden of disease was in 25-34 years and 45-54 years age groups (716 and 607 per 100 000 respectively). TB rates were also higher among urban males and females compared to those in rural areas.

The study did not determine why there is a difference in TB prevalence between urban and rural areas but we can assume that since most TB patients in Kenya are poor, the urban poor are more likely to live in congested slum areas, where TB is quickly transmittable than the rural poor. The national prevalence survey showed that Kenya is missing to diagnose 40% of people with active TB.

TB and other health seeking behaviour in Kenya

In terms of health seeking behaviour, out of those TB patients who responded in the national TB prevalence survey, majority (82%) of them were females (5283) and males (3734) who did not seek health care because of thinking that the symptoms they experienced were not serious. This alludes to low awareness of TB symptoms and poor health seeking behaviour. In addition, more females (79%) went to county (public) health facilities than men (75%), while seeking care at private health practitioners was comparable between males and females. The survey was not powered to ask participants regarding their choice of health facilities. In conclusion, the survey data presented on health seeking behaviour was limited within the survey.

- Similarly, a household health expenditure and utilization survey found that most females (about 60.0%) than males (56.4%) were the main users of public health facilities. Slightly more males (about 43.6%) than females (40%) were the main users of the private health facilities. Overall, most people used the public health facilities (58.5%), while 41.5% used private health facilities
- A Kenyan study showed that among TB patients, there was no gender-related difference in the impact of marital status on seeking care for TB
- However, in Bangladesh, women were more likely to be adversely affected than men

- In Kenya, some of the social determinants of health include the literacy levels of women, nutrition, access to safe water, adequate sanitation and poor housing, roads and infrastructure among others
- The Kenya Health household survey, is a national survey which sought to explore the health seeking behaviours, use of health care services, out of pocket health expenditure and health insurance coverage among Kenyan households.
- The survey revealed females accessed healthcare services more than males. In the utilization of outpatient health services, the survey results show that the commonly reported reasons for not seeking health care despite the episodes of illness were
 - high cost of care (21.4%),
 - self-medication (30.7%),
 - long distance to provider and
 - Illness not considered serious enough (39.3%).

As alluded in results of the health household survey, poor households in Kenya are unlikely to afford health care and are often offered services with lower quality care than those who are not poor.

This results in the poor less likely to seek necessary treatment. Over the last decade, there has been an improvement in terms of health seeking behavior; the number of households not seeking health care during an episode of illness decreased from 23% in 2003 to 13% in 2013. The high cost of not seeking services (21%) was the major reason of not seeking health services

Additionally, the health insurance coverage in Kenya is low, only about 17.1% of the households reported to have some form of health insurance, this low health insurance coverage leads to high out pocket health spending.

The high out of pocket expenditure when accessing health services, led the government to initiate several programmes to ensure households are protected from incurring high expenditures and ensure they access quality health services. Such programmes include the Health Subsidy Insurance programme (HSIP), free primary health care, Output-Based Approach (OBA) and results based financing.

TB and health literacy rates

The national TB prevalence survey revealed the disproportionate literacy rates between the two genders; with men having higher literacy rates than females in all levels of education sampled (primary, secondary and tertiary). Interestingly, women were found to be wealthier in the different wealth quintiles. However, more females were informally employed (20 370 versus 14 638 respectively) and unemployed than males (14 281 versus 7958 respectively). There were more males that were formally employed than females (3458 versus 2355 respectively). The survey also showed slightly more females than males who are TB-HIV co-infected (22 females versus 19 males), because females are more vulnerable to HIV than males. However, the survey report did not include the impact of gender and socio-demographics on accessing TB services.

One Kenyan study found symptom ignorance between TB, flu and cold across the male and female genders. Similar to the National TB prevalence Survey in Kenya, men were found to have a greater formal education and TB knowledge than young and older women. In addition, fourteen studies found that men had higher levels of TB-related knowledge than women; nine of these were conducted in strictly rural settings, and four were conducted in both rural and urban settings. A systematic review showed a higher proportion of females displaying prejudice towards TB due to limited knowledge^{xlvi}, which is similar to the Onyango study. Recommendations from the national TB prevalence

survey include targeted interventions for young males and older women. However, the survey recommendations did not stipulate what the interventions should entail.

TB annual report for the year 2016

At the time of conducting this assessment, the 2016 TB annual report was still in draft format; however this was the most recent source of DR-TB related national data. The annual report revealed there is more than twice the number of males than females with DR-TB in the 35-44 year, 45-54 year and 55-64 year age groups. Additionally, there is also a significantly higher DR-TB burden in males than females in the 65 years and above age group. As seen in the graph below, there is more than triple the number of girls (in the 5-9 year age group) with DR-TB than boys. There are slightly more girls than boys with DR-TB in the 10-14 year age group as seen in the graph below. There are no recommendations to address the effect of gender on DR-TB burden in the annual report.

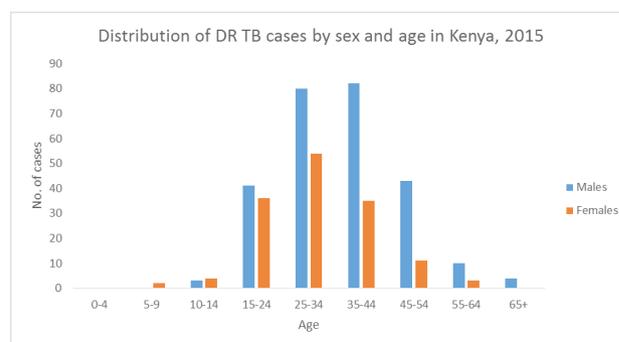


Figure 3: DR-TB cases by gender and age in Kenya, 2015 - Source: TB Annual Report, 2016 (Draft)

The NTLD-P currently does not have gender responsive programmatic strategies to address TB and TB-HIV co-infection in Kenya. However, the NTLD-P recently conducted a catastrophic cost survey for TB patients, which investigated the impact of gender on the catastrophic costs, social exclusion and productivity hours lost by a TB patient. The report from the survey is being developed and hence the results are still confidential.

The NTLD-P intends to use this report to develop a social protection policy for TB patients, which includes having a TB benefits package within the national hospital insurance fund (NHIF). TB advocates are currently pushing for gender responsiveness in providing TB and TB-HIV co-infection services within the draft policy.

Part II: Gender related barriers to accessing TB services in Kenya

Kenya is a country with a vast ethnic diversity; the various ethnicities sometimes have very different and distinct cultural norms, which may impact on health seeking behaviour. These cultural norms may contribute to gender related barriers to accessing TB services at the patient and provider levels.

However, the impact of culture and gender on accessing TB services needs to be investigated in all 47 counties, since the various ethnicities are not equally distributed throughout the country. So that evidence based TB policies are developed that take into account the gender and cultural barriers for the elimination of TB to be realized in 2035. The gender related barriers to TB diagnosis, prevention; treatment and care are at the individual level and provider or health system level.

Individual level barriers include: health literacy, health seeking behavior, stigma, sociocultural (gender roles and status in the family), financial (the direct and indirect costs of seeking TB services), physical (distance to TB services and access to transport) and treatment adherence ignorance ⁴⁰.

2.1. Gender Norms and TB in Kenya

A systematic review revealed that women have to ask for permission from husbands and elders to seek health care and that treatment of children and men is prioritized. Diagnosed women receive less family support than men. Furthermore, women are expected to care for husbands with TB, whereas men are not expected to care for wives with TB ^{xlvi}.

In terms of social impact, a Nigerian study showed that more women (6.1%) than men (4.8%) stated they experienced disruption of day-to-day activities, separation from friends and reduced attendance of social/family gatherings due to TB illness. In addition, “more men (2.6%) than women (1.8%) experienced divorce or separation from their spouse or partner. Similarly, more men (7.4%) than women (4.3%) reported loss of work” ⁴¹.

The National Health Sector Strategic Plan II acknowledges that there are wide health inequalities and recognizes gender roles as one of the key drivers of the inequalities. A study on the gendered dimensions on health in Kenya⁴² aimed at assessing how gender issues are addressed within the Kenyan health sector, found gender related health issues to include:

- Biological as well as non- biological gendered dimensions of health i.e. the socially constructed patterns and behaviours that affect health outcomes for women/girls and men/boys.

These are practices and behaviours that are reinforced by communities, culture, traditional beliefs and attributes but which influence gender patterns or behaviours. These patterns include treatment seeking behaviours, household decision-making and programmatic responses at health facilities where though data is disaggregated according to sex, there is no gender analysis of the data that is conducted.

- Sex disaggregated data: the statistical data as well as capacities to use it for planning and community based outreach are essential for effective gender mainstreaming. While such data is usually used for indicators on morbidity and mortality for both inpatient and outpatient, the same is not used for analysis on the gender implication.
- Stigma and discrimination: communicable diseases (such as TB) marginalize people both from a social and an economic point of view, experiencing social isolation both within their own family and outside of it. Those infected may encounter stigma and discrimination leading to delayed diagnosis and treatment.
- Women and health services: women access health services less than men and most probably women do not identify their needs or find it difficult to overcome social and cultural barriers in order to access health services. This is due to low education, weak social-economic status than men, and lower access to economic resources. Women delay in accessing health services due to the subordinate status of women in some families. Furthermore, women consult traditional healers more than men 43.

2.2. Social and Economic Factors

TB impacts the economic productivity of women as it mainly affects young adults ages 15-49 years. Socio-economic factors influence gender differentials in the infection rate. TB related costs have an impact on TB diagnosis and treatment especially in the low-income households. Many of

the Kenyans are employed in the informal sector where the earnings are meager and without any benefits including health insurance.

A study in Kibera slum revealed that some widows were disinherited by their husbands' family and sometimes property taken from them, often leaving them too poor to think and access treatment when they contract TB. Property disinheritance is common in certain ethnic groups in Kenya.

The same study noted that women were more likely to be financially dependent on others, unemployed, or without income limiting their ability to go to the health facility and adhere to treatment. As the study aptly stated, "without proper diet, a sick person is not able to take her medication effectively".

Poor patients may not have money to eat and taking the drugs on an empty stomach makes the patients weak, which prompts them to stop taking TB treatment. Hence financial barriers negatively impact on treatment outcomes and women may have worse TB treatment outcomes than men in such settings due to poverty.

There is a programme to provide poor MDR-TB patients with USD 60/month for food and transport through Global Fund grants, however there are anecdotal reports that some MDR-TB patients have not been reimbursed for part of 2017. There are also concerns around sustainability of this TB social enabler programme, since it is donor funded.

In 2013, only about one in every five Kenyans (17.1%) had some form of health insurance coverage. The National Hospital Insurance Fund covered 88.4% of those insured, while the private insurance coverage covered 9.4%. Community based and other forms of health insurance coverage covered 1.3% and 1.0% of the health insured population respectively.

Health insurance is perceived to be associated with wealth status. The population in the richest wealth quintile reported higher coverage (41.5%) compared to those in the poorest quintile (2.9%).⁴⁴

2.3. Stigma

A female only study, which interviewed five TB female patients who also had HIV, revealed that “the fear of knowing one’s HIV status kept women suffering from TB from seeking health care”. As mentioned in the above section, stigma and discrimination may delay the patient from seeking diagnosis and treatment⁴⁵.

2.4. Physical

We did not find Kenyan studies that reported gender related physical barriers to TB services, however some studies showed that the distance from work to treatment sites affects men more heavily and long traveling times to hospitals is a barrier to both genders^{xlvi}.

2.5. Treatment Adherence Ignorance

Knowledge on the importance of TB treatment adherence seemed poor in women, a female patient stated in one of the studies “*Treatment is long and one gets bored...I swallowed the tablets for about two months but then they became a bother and I stopped taking them. Actually I was feeling fine already, so I thought that I was healed*”.^{xxxviii}

2.6. Provider or Health System Level

As earlier indicated in the Kenya national TB prevalence survey, more women than men went to public health facilities. Some studies outside Kenya show that women are more affected by lack of privacy in health facilities and women are more likely to perceive female health care workers as sympathetic and adhere to treatment.

Additionally, women are more likely to consult traditional healers, self-medicate, or use private physicians over government facilities.⁴⁶

2.7. Legal and Policy Environment on Gender and TB

Kenya has a very rich legal and policy environment that should enhance gender equality and equity and ensure access to TB and health services. These laws, policies and strategies to address gender inequities in Kenya are shown in Appendix 6.

Kenya is also a signatory to a number of international and regional treaties and conventions to enhance gender equality and equity and ensure access to health for all. These also include guidelines and strategies as shown in Appendix 7.

Despite the significant numbers of laws, policies and acknowledgment of international standards and guidelines, the issue of gender has not been taken seriously to determine its effect on access to health generally and in TB specifically.

2.8. Women’s Empowerment and Demographic and Health Outcomes

Women’s empowerment encompasses women’s sense of self-worth, access to opportunities, access to and control to resources, choices and ability to exercise them, control over their own lives, and influence over the direction of social change (United Nations Population Information Network, 1995). Women’s empowerment includes the area of employment, access to and control of resources, asset ownership, decision-making and attitudes to gender based violence. We present overall health and demographic findings from the Kenya Demographic and Health Survey below since some of the elements described have not been investigated in relation to the impact of gender on accessing TB services.

2.9. Employment and forms of earnings

According to the Kenya Demographic and Health Survey (KDHS), employment for cash and control over how earnings are used as important indicators of empowerment for both men and women. The KDHS found that employment increases with age. Younger women aged 15-19 years were 48% less likely to be employed than older women aged 45-49 years. The proportion that earned cash only was higher among women aged 25-29 years (65%) and among men aged 20-24 years (85%), while women and men aged 45-49 years were least likely to earn cash only (51% women and 76% of men).⁴⁷

2.10. Control over wife's earnings

There is no clear pattern in decision-making on the use of cash earnings according to a woman's age. Women aged 15-19 years old, with more living children, urban women, and women in the lowest wealth quintile are more likely than other women to act as the main decision makers in the use of their earnings. The KDHS survey further showed that women who earn less than their husbands are more likely to report that their husband has the main say in deciding use of his earnings. Women who earn the same as their husbands and women who earn more than their husbands are more likely to report joint decision making in the use of their husbands earnings (67% and 50% respectively).

2.11. Ownership of assets

Ownership and control of assets gives an impression of access to economic resources. For women, ownership to assets gives security to them during and after marriage and even when their spouses die. This also gives them a position of influence in their homes and decreases various forms of violence and discrimination. The KDHS report showed that 42% of women owned a house and 39% owned land (alone, jointly or both), while 49% of men own a house and 44% owned land.^{xlvii}

2.12. Women's participation in decision making

The ability of women to make decisions that affect their personal circumstances is an essential aspect of their environment and an indicator of their autonomy and control in their daily life. Women's involvement in decision-making varies according to the type of decision; 39% of women act as the main decision maker in their own health care, while 40% said that decision was made jointly with their husbands and 21% said their husbands made the decision.

Men are more likely to be the main decision makers regarding their own health care (51%), while less than 10% said their wife's participated in making such decisions.^{xlvii} In general, women's participation in decision-making increased with age, education and wealth quintile. Women who resided in urban areas and women who were employed and earning cash were more likely to be involved in decision making than in other regions.^{xlvii}

Women's empowerment indices according to the findings in the KDHS shows that women's empowerment has important implications for demographic and health outcomes, including women's use of family planning and maternal health care services.

2.13. Empowering women

The Kenyan poverty levels are very high with women bearing the brunt. Women, majority who do not have collateral, are unable to access credit which is required. Feminization of poverty is experienced across all regions.

Women with disability and women with HIV and AIDS suffer the consequences.¹ To address these challenges faced by women and other vulnerable groups, the Government of Kenya has put in place various programmes to empower women to

¹ Gender equality challenges in Kenya and Africa key note address by commissioner Winfred Lichuma, 28th June 2017

overcome poverty. The programmes include:

1. Gender mainstreaming, affirmative action and gender responsive budgeting.
2. Special catalytic funds dedicated to women, persons with disabilities and the youth for development programmes. These are:
 - Women Enterprise Fund (WEF) that provides micro-finance credit and other financial support for women;
 - The Youth Enterprise Development Fund (YEDF) that provides credit for young men and women to enable them to establish businesses to earn a living aimed at reducing unemployment;
 - The Uwezo Fund (Kiswahili word for ability) that empowers women, persons with disabilities and youth that give seed money to the special interest groups as start up capital for businesses.
 - The Social Protection Fund is given as credit and cash transfers to older members of society and people with severe disability. The target is for senior citizens beyond the age of 65 years old.
 - Thirty per cent procurement affirmative action is reserved to special interest groups (SIG) that include women, persons with disabilities and the youth. The SIG access 30% value of all all-public procurement tenders
- The national Government Affirmative Action Fund, which was established in 2015 and is administered through female members of parliament to run programmes targeting socio-empowerment of women, youth, persons' with disabilities, children and elderly persons.

Part III: Assessment Findings

3.1. Stakeholder Buy-In Workshop

A total of 38 stakeholders (excluding the three consultants) from Government, civil society and technical partners attended the buy in workshop, the list of attendees is found in Appendix 2. During the stakeholder buy in workshop, the results from the literature review were presented to the attendees. The stakeholders were thereafter asked to break out into groups and provide their perceptions on:

- a. *TB seeking services based on gender, social and cultural norms and*
- b. *Determine who the TB KPs are and why.*

This section documents the responses and views of participants from the stakeholder buy-in workshop.

3.1.1. Gender, social norms, religion and TB in Kenya

Participants indicated that in some settings in Kenya, women are seen and not heard. In most settings, men are the ones who decide whether and where women can seek health services. In most cultures, women have to seek consent from their husbands prior to seeking healthcare.

For instance, under the Maasai customs, a cow has more value in the homestead than a woman, and a lactating mother cannot leave the house for six months. As such, if she contracts TB she cannot be diagnosed in a health facility. In addition, married women in Turkana cannot remove the beads on their bodies which may make TB screening difficult.

Participants indicated that women are economically disadvantaged which negatively impacts them from accessing TB services. It was noted that men do not seek health services due to fear of stigma and discrimination.

Male friendly services are lacking in Kenya and men do not appreciate health information from women. In some settings, due to religious beliefs women will not seek medical services if the healthcare workers are male. Others will not seek health services at health facilities because of religious beliefs such as believing in miracles.

Additionally, some mothers may be unable to convince an adolescent boy to seek health services. Workshop participants noted that TB literacy levels were still low and the methods used to create TB awareness were still not effective. There is also limited support for TB patients.

3.1.2. Opinions on who make up the TB KPs in Kenya?

Workshop participants identified a total of 19 TB KPs

but three main TB key populations were singled out, these are:

- (i) **Transgender** and
- (ii) **LGBQIT**; criminalization of these groups might limit access to TB services and
- (iii) **Refugees and Immigrants**.

Other TB KPs identified by the stakeholders include:

- **Women above the age of 65 years old**; it was not clear whether they are a TB KP because most would be found at home during the national TB prevalence survey or because they are vulnerable to infection because of lowered immunity during old age.
- Those suffering from immune suppressive conditions for example PLHIV and those suffering from cancer, diabetes etc.
- Those who live, learn and or work in congregate setting such as those in children homes, worship centres and learning institutions.
- Prisoners who live in an enclosed and congested

- environment without proper ventilation.
- Students and children in overcrowded learning institutions, some classrooms and boarding facilities are congested without ventilation.
- Children under 5 years old, this is due to the difficulty in diagnosing TB in this population.
- Urban slum dwellers due to living in congregate settings, and poor nutrition, which increases risk of TB transmission and susceptibility to TB infection due to lowered immunity, respectively.
- Factory workers due to the confined areas in that they work in with limited ventilation may face relapse and reinfection.
- Nomadic population; their lifestyle limits seeking of treatment, follow up as well as treatment adherence.
- Healthcare workers due to continued exposure to TB.
- *Matatu* operators: due to exposure (interaction with many people in an enclosed setting), poor ventilation of the vehicles and no time to seek treatment.
- People living near dumping sites.
- Workers in the informal sector such as *Jua kali* workers, because of limited protective gear.
- Street families
- Smokers and alcoholics
- Those who are malnourished.

3.2. Key Informant Interviews

3.2.1. Key informants interviewed

Fifteen people were interviewed in this assessment; there were three joint interviews; with each having two interviewees. We interviewed County TB, Leprosy and Lung Disease Coordinators (CTLIC's) from four counties (Homa Bay, Busia, Kisumu and Nairobi), the NTLID-P, the Kenya Prison headquarters, a technical partner (WHO) and two implementing partners (AMREF and MSF).

We did not manage to secure interviews with development partners and the HIV programmes (NASCOP and NACC). The questionnaire tool used in this assessment is found in Appendix 3 and the list of interviewees is provided in Appendix 4. We also held one focus group discussion, which had one male TB survivor and one transgender woman.

In total, we collected the views of two male TB survivors (former TB patients); one in an interview and another in a focus group discussion.

3.2.2. Burden of TB by gender

In all the surveyed counties, males of the productive age group had more TB than females. This trend is similar to the results from the recent national TB prevalence survey. Homa Bay and Busia counties noted that 55% and 60% respectively of the TB burden is found in men in the 25-34 year age group. In Kisumu, the burden of TB is in males between the ages of 15 to 44 years old. In Nairobi the burden of TB is equal in boys and girls.

3.2.3. Context of surveyed counties

Homa Bay and Busia both have archipelagos and access to TB diagnosis is an issue in the surrounding islands. In Homa Bay, those who live in the islands² do not have access to GeneXpert testing which leads to delayed diagnosis.

In Busia, there is wider access to dispensaries, however such dispensaries do not have GeneXpert instruments, which is a barrier to TB diagnosis. There are only four GeneXpert instruments³ in the community and patients resort to going to health facilities that are further away from GeneXpert testing. After diagnosis, TB patients are then referred back to the local health facilities including the dispensaries.

In Nairobi, insufficient funds have been allocated for

² Two Homa Bay sub counties are stretching into the water of Lake Victoria; those who live in the islands (Rusinga, Takawiri, Remba, Mfangano, Ringiti, Kiwa) have limited access to GeneXpert instruments.

³ These are in Teso, Butula, Port Victoria and the county referral hospital in Busia

the testing of all TB presumptive cases using Gene Xpert instruments as a first line tool for TB diagnosis as recommended in TB policies. In conclusion, although the national TB policy indicates that Gene Xpert should be the first tool for TB testing; this is not happening being fully implemented in the surveyed counties.

3.3. TB Gender related barriers

3.3.1. Literacy levels, stigma and TB

Generally for both males and females there is still stigma around TB. Patients, healthcare workers and prison staff who contract TB do not want to be treated at their local health facilities due to fear of stigma. Healthcare workers and prison staff self-stigmatize when they are diagnosed with TB and will not want to be treated at the health facilities they work in. There is still fear among TB patients that they may have HIV when diagnosed with TB. Some people avoid TB screening so that they don't have to do HIV tests, there is need for greater awareness that you can have TB without HIV.

“Once I started losing weight (from 60 kg to 38 kg), I thought I had HIV and so I went to the health facility in Westlands” Steve Anguva, TB Survivor. Steve chose not to go to his local health facility in his Kangemi area. “When I had TB, I wondered whether my staff members would think I have HIV” Joseph Mutiria, TB/HIV Prevention Officer, Prisons Headquarters.

Lack of knowledge about TB by both men and women results in the misconception about TB and its effects. This leads to not seeking treatment on time for coughing, because both men and women do not think a cough is a serious issue. It was noted that Illiteracy levels among some women prevent them from seeking TB treatment.

There is also a nuanced perception that the less literate will seek services of traditional healers before going to a public health facility. One male TB survivor indicated that when his mom heard he had TB, she said his stepmother bewitched him. In addition, there is a link between low literacy levels and stigma, it appears that the lower the literacy levels the higher the TB stigma and denial.

3.3.2. TB seeking behaviour and health systems

It was indicated by some respondents that decisions are centered on the man including where to seek healthcare. Men and women usually administer self-treatment with over the counter drugs and or herbal remedies. With persistence of the illness, patients visit the private health facilities including chemists and the traditional medicine men and women before finally visiting the public health facilities where they are diagnosed with TB.

The reasons for this behavior include the lack of time to visit the public hospitals during the day (long queues at the public health facilities), fear of being sacked (especially by men) while seeking treatment and lack of funds especially by the women. According to the respondents, the private sector provides up to 30% of the TB treatment to people who are vulnerable and poor.

However, many TB cases are misdiagnosed and or diagnosed late in the private health facilities. This is due to low clinical suspicion of TB by healthcare workers who work at private health facilities, since they hardly see TB presumptive cases and the fact that TB patients are mostly diagnosed and treated at the public health facilities. Some of the private health facilities also lack GeneXpert instruments for TB diagnosis. In addition, some private health facilities also do not adhere to national TB regulations and guidelines for diagnosing and treating TB patients.

Some of the interviewees did not see any gender barriers in accessing health services at the facility level. The barriers according to this group are those, which hinder the patient from accessing TB services due to direct and indirect costs. Accordingly, there is little consensus on the gender issues influencing access to health services and treatment adherence because of lack of evidential studies. There is therefore need for a comprehensive study on the health seeking behaviors of men and women in the different counties.

3.3.3. Social and cultural barriers

As earlier indicated, gender has been perceived to mean women and not both men and women, which led to many health strategies to be targeted towards women leaving men behind. In Busia, men are perceived as the strong ones and therefore cannot seek treatment for a cough. Males are not seeking care because of lack of seriousness (TB Technical Partner 1). Men are observed as not wanting to queue for more than 30 minutes at a health facility (because they have to work) and will leave after 30 minutes of queuing at the health facility (TB Technical Partner 1). In Nairobi, it was indicated that there are no gender norms that may hinder access to TB services.

Women by their nature are more willing to learn and accept changes than men. Some men take things lightly, men stay in denial; and perceive that whatever health services they are offered are good for others but not for them.

There has also been a lack of sensitivity about gender by the HCW on the customs and cultures of some communities. For example in some cultures, men cannot treat women and vice versa and yet the facility does not take this into account in allocation of duties of the HCW.

3.3.4. Money, independence and power barriers

In all the surveyed counties, females are more likely to seek health care earlier and more frequently than males. In Busia, women face unique socio-economic and cultural challenges such as:

- Lack of resources/money for treatment
- Need to seek permission from the head of the house (usually men), this is the same for Kisumu too
- Lack of time to seek treatment due to their other chores

Poverty levels are high in Busia, Homa Bay and Kisumu; and poverty is even higher in women. In Busia, men sell land, buy *boda boda* and conduct business. Men have money while women have limited economic activities and resources. Generally, women are therefore unable to go to hospitals using their own resources.

In Homa Bay too, men are the breadwinners in majority of the households; which causes delay in their health seeking behaviour, since they have no time to queue for health services and cannot afford to miss a day out of work because of the need to provide for their families.

Many of the respondents noted that the reason why men delayed seeking treatment was because most of them are casual labourers who perceive time spent at the health facility as a lost opportunity to make money. The conflict therefore is between the nature of work and health care system, which does not allow one to seek health care beyond a certain time (5.00 p.m.).

In Busia, the healthcare workers give men the first priority during treatment, especially when the men go carrying a child. In the same county, pregnant women are a special population that is missed out during antenatal visits. Pregnant women are usually not screened for TB and have lower immunity making them susceptible to TB.

Pregnant women also have high TB prevalence due to HIV infection; the effects of TB in pregnant women may be compounded by TB-HIV co-infection.

In addition to limited resources that lead to women seeking permission from their husbands before accessing health services in Kisumu, women have to ask their husbands for permission and inform their husbands that they've been diagnosed with TB in order to get TB support. Hence women are not as independent as men when it comes to health seeking behavior in Homa Bay, Busia and Kisumu.

In Nairobi, it was noted that women are diagnosed earlier with TB than men and men go late for diagnosis. It was again emphasized that it is difficult for casual labourers, who are predominantly male to get time to go to the health facility during working hours.

According to some respondents, other socio-economic reasons that hinder access to TB services is the lack of other essential requirements including housing, water, sanitation and nutrition which largely affect many of the poor people including slums dwellers, homeless families, and other low paid families, which are closely linked to good treatment outcomes.

3.3.5. Attitude of female HCW

The attitude of HCW is important in encouraging patients to seek treatment. There is a perception that female health care workers are not friendly towards patients and or discriminate patients. A former male TB survivor who used to be a bartender indicated that he does not like going to health facilities because it is perceived that the nurses; (majority of whom are female in Kenya) have a bad attitude. In addition, some HCW demonize patients by reprimanding patients

“Why have you come so late? You are the patients who come late and the health workers get blamed when you die” Steve Anguva, TB survivor.

When on TB treatment, sometimes patients go to the chemists and tell pharmacists about their adverse effects (because the attitude of nurses is bad) such as pains. The chemists give the patients antibiotics, which give rise to further resistance (patients can even be given quinolones over the counter in Kenya).

3.4. TB Gender Responsive Solutions in Place

3.4.1. Community based approaches

Kisumu County is using a community centred approach by reaching and empowering community health volunteers (CHVs). CHVs advise TB presumptive people on health issues, such as GeneXpert is a better TB test (more sensitive) than Chest X-Ray. The Kisumu County has had discussions on whether to absorb CHV as a cadre in its county system. Kisumu County is engaging partners to provide transport fees and stipends for CHVs and is working with KEMRI-CDC on this issue. Kisumu County engages CHVs to conduct case finding in homes. In addition, during this assessment, the President of Kenya and former Cabinet Secretary for Health announced that the Government will be hiring CHVs so as to achieve universal health coverage⁴.

3.4.2. Increasing more male CHVs

Since majority of the CHVs are women and men might listen more to their male counterparts on health matters, Kisumu County is trying to engage and encourage more men to become CHV.

⁴ John Muchangi (2017) “100,000 youths to get jobs as community health volunteers, says CS Mailu,” *The Star*, 15 Dec 2017 available at https://www.the-star.co.ke/news/2017/12/15/100000-youths-to-get-jobs-as-community-health-volunteers-says-cs-mailu_c1685052 (accessed March 1, 2018).

3.4.3. Targeting industries and other places of work

Men are perceived as a TB key population in Kenya since they bear the highest burden of TB. **Men also have poorer health seeking behaviour than women, which leads to late TB diagnosis. One of the main reasons for late health seeking behavior is attributed to their (men) work hours not aligning to health facility hours and the inability to get time off from work, particularly for casual labourers.** In response to this, several counties have targeted work places where men predominantly work (such as quarries, *Matatu* industry, *Boda boda* industry) for TB screening. These male responsive initiatives are highlighted in the next chapter on TB key populations as these groups were mentioned as TB KPs.

3.5. TB Key Populations

TB key populations in Kenya can be defined as people who are more susceptible to TB. This group is not well defined and keeps evolving depending on the surrounding circumstances including gender, life style, occupation and location. TB Key populations are not universally defined and for Kenya it may differ from one county to another. This assessment revealed that the TB key populations include:

- People with high burden of the disease (such as men)
- People who face barriers in terms of access to TB care and prevention due to living in hard to reach areas (such as those living in archipelagos or islanders, nomads/pastoralists). The nomadic groups (such as the Maasai and Karamajong tribes) are highly mobile and due to their lifestyle and may not seek treatment promptly or at all.
- Those who have not been diagnosed and treated, such as children. Children have unmet needs such as;
 - less sensitive TB diagnostic tools available for them and limited access to child friendly DS-TB and DR-TB drugs and

- limited access to TB diagnostic tools for children because most children visit lower level facilities which do not have TB diagnostic tools. In addition, it is difficult for children to produce sputum, making it difficult to diagnose pulmonary TB in this population (as earlier indicated).
- People who have lowered immune systems, which makes them susceptible to TB, such as PLHIV and diabetics.
- People who are affected due to their occupation such as factory workers, miners and HCW. Due to congestion in factories, TB is easily transmitted; there is also high nosocomial transmission of TB in health facilities. On the other hand, truck drivers, *matatu* drivers and conductors and *boda boda* riders are considered as TB key populations due to the fact that they are too busy to seek treatment (long work hours and a health system that does not respond to the nature of their work).
- People who are affected due to their socio-economic status/poverty especially the urban poor, who usually live in congested areas (slum dwellers, street families and prisoners)

As earlier mentioned we interviewed the CTLC's from four counties⁵: Homa Bay, Busia, Nairobi and Kisumu. These counties represent around 9% of the total counties in Kenya. Our findings reveal that the **TB key populations are not well defined in Kenya**. There is no national survey that has been conducted to identify TB KPs. From the sampled CTLCs, **19 TB key populations collectively were identified**; this is shown in Table 1.

Different counties indicated different TB KPs and motivated why they considered these populations as TB key populations. **All the sampled CTLCs indicated that sex workers are a TB KP and three counties indicated that PLHIV, slum dwellers, fishing population and healthcare workers are TB KPs.** Counties consider sex workers, injected drug

⁵ We contacted the Mombasa CTLC but he did not respond to our email nor telephone calls.

users (IDUs) and men who have sex with men as TB KPs but there is no supporting data for this stance; these groups were identified as HIV KPs in Kenya.

TB is closely linked to poverty and malnutrition in Kenya, slum dwellers and fishing populations are poor and are susceptible to TB not only because of their congested living areas but because of poor nutrition owed to poverty. It is critical to note that three (Homa Bay, Busia and Kisumu) of the four sampled counties have fishing as one of the main sources of livelihood.

Our findings show that different counties may have different and unique TB KPs based on the dominant occupation and residence (geographic location). For example in the fishing counties, fishermen (note the gender) and the population around the fishing area were identified as TB KPs but not in Nairobi. While in Homa Bay and Busia counties, islanders were also identified by the counties as TB KPs but not in Kisumu or Nairobi (which do not have archipelagos).

"It is difficult for islanders to access services on the mainland due to the fact that transport is only provided once a day from and to the islands. The cost of transport to and from the health facility is also prohibitive for many islanders and a TB patient is expected to collect their medication on a weekly basis"
TB County representative, Busia.

"There is no good ventilation in the houses that islanders reside in" TB County representative, Homa Bay.

The islanders in Homa Bay County have limited access to TB diagnosis and GeneXpert testing which delays diagnosis of TB. Additionally, HIV prevalence on the islands in Busia and Homa Bay counties is high and HIV/TB co-infection is high in these two counties.

Busia county identified the highest number of TB KPs (12) in this assessment, perhaps owed to the fact that Busia’s unique geography (it has archipelagos- with limited health services in the islands), dominant industries (fishing and sex work), high TB-HIV co-infection rates (there is high HIV infection due to temporary marriages and sex work) and socio-economic reasons (high poverty).

Stigma towards certain KPs within health facilities and in the community is still high; all counties stated there is stigma towards KPs such as **sex workers and men who have sex with men (MSM)**.

Table 1: TB KPs according to the opinion of sampled CTLCs in Kenya

TB KP/CTLC	Homabay	Busia	Kisumu	Nairobi
PLHIV	✓	✓	✓	
Fishermen	✓	✓	✓	
Fishing population in beaches	✓	✓	✓	
Islanders	✓	✓		
Healthcare workers		✓ *	✓	
Sex workers	✓	✓	✓	✓
Truck Drivers		✓		
<i>Boda boda</i> riders (motorcycle transporters/operators)	✓			
<i>Matatu</i> crew (mini van transporters)			✓	
Casual laborers in factories and industries	✓			✓
Miners and quarry workers	✓			
Slum dwellers	✓		✓	✓
Homeless people/Street families				✓
MSM		✓		✓
IDUs		✓		✓
Children under 5 years		✓		✓
Adolescents		✓		✓
Elderly people		✓		
Refugees/Immigrants				✓

* No TB infected HCW has been diagnosed in this county (*Table by consultants*)

CTLCs identified 19 TB KPs, while non-CTLCs indicated that prisoners, prison staff and school going children are TB KPs, collectively 22 TB KPs were identified by all interviewees.

Prisoners and prison staff

In Kenya, there are prisons that offer health services such as TB diagnosis⁶ for prisoners and the public in general. Although prisoners were not identified by the CTLCs as a TB KP, other respondents such as AMREF and the Prison headquarters did. The barriers to accessing TB services in prisons include the fact that some prisons do not have health facilities with GeneXpert instruments for TB diagnosis. In this case of no TB diagnostic services within prison health facilities, TB diagnosis of a prisoner may not be a priority for prison staff; prison staff may not have fuel to take the prisoner to health facilities to get the prisoner's sputum tested for TB. The highest priority to non-clinical prison staff is security.

There is no sputum referral system from the prison to a health facility that conducts TB diagnosis; the prisoner has to physically be transported to a health facility for TB diagnosis. These barriers contribute to delays in TB and HIV diagnosis for prisoners. In and outside prison settings, access to chest X-ray has been an issue because of X-ray fees; patients have to pay for chest X rays, which is a barrier to TB diagnosis in settings where GeneXpert is not available. Although it is not a very sensitive test especially in PLHIV, the test should be provided for free in both public and private health facilities.

Majority of the prisoners in Kenya are men. In prison, men have to adhere to TB treatment due to fear of reprisal. According to an interviewee, the prisoners also receive a lot of information on TB. Prisoners are also away from people who might stigmatize them but among former prisoners and prison staff there is stigma around TB. In terms of referral forms for released prisoners, former prisoners do not want to be identified as former prisoners, due to stigma of being a former prisoner.

6 Some prisons may have GeneXpert instruments

There is no TB support group for staff members or prisoners but in the high HIV settings; there are HIV support groups. Stigma leads prison staff to go to other health facilities; outside the prison system.

Health care workers and most prison staff especially the frontline staff members⁷ usually visit the private health facilities first before visiting the public health facilities. Prison staff members can access health services from private health facilities through health insurance. However as stated above, private health facilities may misdiagnose or diagnose late. Hence prison staff members and HCW are diagnosed later and treated at the public facilities (not where they work) and are good at adhering to their TB treatment but there are a few isolated cases of non-adherence.

Students in schools and colleges

Most students in Kenya study in congregate settings. There is limited capacity of the schools and colleges staff to handle TB cases. For instance a student in a secondary school was sent home because she had TB because the school administration feared the spread of TB in the school and lack of knowledge on what to do. Schools in Kenya lack policy direction on screening and treating TB in schools.

The health policy for schools does not have provisions and guidelines on how to treat TB patients in schools and colleges. According to the respondents, there is a lack of capacity in schools to diagnose and treat TB. The students too have limited knowledge on TB. Many of the students especially in colleges seek treatment in the private health sector first due to stigma.

7 This include those who receive prisoner, screen prisoners, manage their cells and prison health care workers

Policies and responsiveness to TB KPs

During an interview with a TB implementing partner, it was mentioned that the development of the TB isolation policy⁸, did not take into account the views of key populations such as injected drug users (IDUs) and this may cause IDUs to go into hiding and deter them (IDUs) from seeking TB diagnosis and treatment.

Transgender population

There is limited data on the TB burden in the transgender population in Kenya, because there is no indicator in the TB register that allows the healthcare worker to document transgender as a gender. **In addition, prior to this assessment, there have been no other studies to collect TB data on the transgender population that we are aware of. Although the transgender population was not identified as a TB KP by majority of the interviewees in this assessment.**

There is a private health facility (MAAYGO) in Kisumu that offers TB and HIV services to the transgender population. The Government supports the health facility and has given them a master facility code (MFL) and the health facility (HF) uses the same tools as the Government health facilities for TB such as the TB register. In Kisumu, the county Government sensitized healthcare workers to treat a person irrespective of their gender.

According to the transgendered woman we interviewed, there are competing interests to seeking TB or HIV or other health services for a transgendered woman who would rather seek for transition services such as oestrogen therapy. There are also **high stigma levels among the transgendered population in Kenya who would rather delay health-seeking behaviour so that the HCW and neighbours do not know their gender.**

⁸ <https://www.standardmedia.co.ke/health/article/2000196018/jailing-of-tb-patients-illegal>

“A transgender woman would rather see a male healthcare worker than a female healthcare worker because female HCW will not adhere to confidentiality and will sensationalize the transgender woman. There is self-stigmatization among the trans population, stigma and discrimination. Often the transgender population in Kenya does not want to feel exposed and would seek for health services late so that the health provider and neighbours do not discover their gender. Even if the issue is not related to transgenerness, the health provider and system will turn it into transgender issue because as a trans person, you haven't filled in the complete patient form, you have to pass the period (menses) test” Transgender woman on the form.

3.6. TB KP Responsive Solutions in Place

One of the best practices the counties use is using CSOs to find TB patients who were lost to follow-up and facilitating for the patients to resume treatment. Other responses for TB KPs are documented below.

What do sex workers, MSMs, fishermen and islanders have in common?

Homa Bay County has some public health facilities, which treat sex workers, MSM and fishermen, these health facilities have recently started offering TB screening and had traditionally been offering HIV testing. These health facilities are called drop in centers “DICES” and are located in in three sub-counties⁹, two out of three of these health facilities are located in Homa Bay islands.

Those diagnosed with TB are linked to TB treatment sites and a HIV mapping study informed the establishment of these “DICES”. The DICES are user friendly and do not discriminate anyone, they also run for 24 hours to cater for the nature of sex work and fishing; which usually happens at night.

⁹ Mbita-islands of Rusinga, Suba (bordering lake Victoria-Kiwa island) and Homa Bay town

In Busia, there is a programme with the island population through the CHVs from Kenya, who follow up patients. So as to make the programme more patient centric; convenient and cheaper for the patient (by reducing trips and transport costs), the HCW give TB medicine on a bi monthly basis instead of a weekly basis.

There are registered MSM and sex worker organizations in Busia and the county works through the NGOs. The county has trained organization members on TB, which also acts as a support group. The organization recruits new members and once enrolled, they are screened for TB and given more information on TB.

The county has also identified and trained health care workers from a friendly facility who provide services to the MSM and sex workers. In addition, MAAYGO health facility in Kisumu provides TB, HIV and vaccination services to MSM. In Nairobi, sex workers, MSM and HCW have largely been ignored in the response to TB.

Factory workers

In Homa Bay County, factory and industry workers, (there is a sugar cane industry in one sub county) were identified as TB KPs. In Nairobi county, the factory and industry workers in Industrial Area and *Baba Dogo* areas were identified as TB KPs, the county responded by conducting TB screening in one factory but experienced challenges because managers would only release their workers during lunch time and not in the morning or after lunch (which reduces the duration of TB screening and reduces the chances of identifying more people with TB due to a short screening time).

It was suggested that there needs to be greater TB sensitization targeted towards factory workers and management.

Boda boda operators

Motorcycle transporters known as '*boda boda*' were identified as a TB KP in Homa Bay and the CTLC team conducted a TB screening for *boda boda* riders in late 2017. It is speculated by the Homa Bay CTLC that the dust and the cold that the riders are exposed to predispose them to tuberculosis infection.

Matatu operators

There have been some initiatives where counties conduct TB screenings in the *Matatu* industry (where men mostly work). The NTLD-P and Stop TB Partnership-Kenya recently engaged with the National Transport and Safety Authority (NTSA) and trained *Matatu* drivers and conductors in Nairobi, including TB survivors from the industry. Kisumu county considers the *Matatu* crew as a TB key population and also conducted a TB screening exercise in 2017.

Truck drivers

There is a clinic in the Kenya (in Busia)-Uganda border, which targets truck drivers and offers screening for TB and HIV. The Busia County works with an organization that helps the county on offering TB and HIV services. Once screened and found to be with TB, truck drivers are advised on TB treatment. The clinic staff also give TB medicines to drivers who may have forgotten to carry their TB drugs.

Street families

In Nairobi County, the street families (homeless people) were identified as a potential TB KP through anecdotal data. Most homeless people who have TB are men below the ages of 35 years old; usually 18-30 years old. It is difficult to track homeless people, hence they are easy loss to follow up patients. In addition, when people do not have NHIF cards it becomes challenging for them to adhere to TB treatment.

The Nairobi county screened 300 homeless individuals (including children) for TB using microscopy because the county did not have the funds to screen for TB using GeneXpert. From this one off screening of homeless people in Nairobi, three people were found to have TB (1%).

It was noted in Nairobi that homeless people are given first priority in public health facilities. However, GeneXpert testing would have identified more homeless people with TB since it is a more sensitive test than microscopy, especially in those living with HIV.

Health care workers

As earlier mentioned, there is self-stigmatization of HCW and a need to sensitize HCW on infection protection and control. The policy on bi-annual screening of HCW for TB is not well implemented. HCW who have TB are compensated; they go on 6 months leave with salary but a HCW needs to follow up in order to get compensation; there is limited awareness on compensation of TB as it is an occupational disease.

Miners or quarry workers

Majority of the quarry workers are men. Since men have a challenge of leaving work to go to the health facilities during the day, Kisumu county sent a clinician, laboratory technician and nurse to a quarry while men were working last year, to conduct TB screening and were able to diagnose 4 patients with TB, who were already symptomatic. Sustainability of this TB screening activity in quarries is an issue for counties.

Prisons

Some of the TB service interventions in prisons include training non-clinical officers to screen prisoners for TB instead of HCW from the public health system. This ensures that more prisoners are screened outside clinical hours; to address the short clinical hours.

As a response to ensuring TB treatment adherence, prisoners are given double the food ration when they are diagnosed with TB and less workload.

Perceptions on TB cross border solutions

There is need to improve access to TB diagnosis within the Kenyan borders and a need to improve screening facilities for anyone coming from outside Kenya through the lake Victoria from Uganda. The beach management community registers everyone coming into the islands in Homa Bay county.

Some people on TB treatment disappear into the islands; through the beach management community; people who go into the islands for work can be tracked, hence the register resolves loss to follow up. Although there is a mechanism for dealing with such patients, it is not possible due to the attitude and behaviors of the patients themselves.

The patients from Uganda do not indicate their true nationality. Ugandans believe that Kenya has good (health) facilities and treatment. Therefore once they go back to Uganda, they cannot be traced. Contact tracing is difficult especially among the foreigners that seek treatment in Kenya. Some of the reasons the foreign patients do not indicate their true nationality when seeking treatment include the fact that Kenyan health facilities charge a foreigner an extra 50% on the payable fee (County TB Representative, Busia).

It is notable that DR-TB support comes from the TB programme and is only payable to Kenyans. This includes a payment of KES 6000 per month (or KES 200 per day). This money is paid through MPESA. For adolescents this money is paid through their parents.

“The NHIF gives support for TB but foreigners usually do not have NHIF cards” County TB Representative, Busia.

“Countries need to have TB surveillance and strong TB referral systems in place. There are opportunities for referrals across the Eastern African countries so that the burden of referral is not upon the patient, when they move countries” Technical Partner 1.

There are people who work in Kenya but sleep in Tanzania; around the Tanzania border (Namanga) and near Kajiado county (in Kenya). These individuals may not necessarily be refugees or immigrants. There is need to have sustainable forums for sharing TB data across borders; so that loss to follow up patient issues is resolved.

TB policies need to be in place so that an enabling environment is created, where people are free to seek services with regular documentation. There needs to be harmonization of TB prevention, treatment and care, for example Somalia does not provide BCG vaccination for children. There is need for multilateral organizations to be involved in TB cross border surveillance, referral and service provision.

WHO and the Global Fund can offer regional grants on a study on TB and cross border solutions. The results from these grants can inform policies.

“A donor needs to inject funds for this initiative before countries invest. There is limited data in Eastern Africa to support this initiative” (Technical Partner 1).

Finally, there needs to be TB advocacy and health education for community members who live near all the Eastern African borders.

3.7. How Does KP Interact with Gender?

Most interviewees did not know how being a TB KP interacted with gender and whether there were barriers to accessing and receiving TB services in this

situation. When respondents were asked which barriers TB KPs face, one said;

“at the facility we don’t ask whether they are facing challenges and at the health facility; the tool does not capture occupation and sexual orientation” County TB Representative, Homa Bay.

“If (health) services do not require disclosure of sexual orientation (then there is no interaction); however when there are preliminary things that lead to disclosure then there will be barriers,” Technical Partner 1

The gender distribution of the factory and industry workers was not provided during the interviews. It is notable that majority of the *boda boda* operators/drivers, truck drivers and quarry workers are male. Majority of the nurses, CHVs and CHEWs in Kenya are female and this may affect how males or the trans population access health services. The distribution of gender among street families was not provided but it was mentioned that most homeless people are male. The key informants perceive female sex workers as opposed to male sex workers as a TB key population, a notion that is borrowed from the HIV mapping study of KP in Kenya.

3.8. Validation Workshop

After the assessment findings were presented to stakeholders at the validation workshop, participants gave feedback on the findings. Five out of 15 (33%) interviewees attended the validation workshop; both the individuals from the focus group discussion attended the workshop. Some interviewees sent their representatives to attend the validation workshop.

There were a total of 36 participants at the validation workshop (excluding all three consultants) as shown in Appendix 5. Participants said that most healthcare workers self-stigmatize and avoid TB screening so that people may not think they (healthcare workers) have HIV.

Healthcare workers in all counties need to be trained, sensitized on TB and tested for TB frequently. A stakeholder stated that TB should be perceived as a barrier to other services and rights such as work and health insurance. TB leads patients to experience catastrophic costs and dismissal from employment. The recommendation that emerged was to **engage with stakeholders to develop social and work protection policies for TB patients.**

It was emphasized that county government budgets should focus more on prevention of TB than TB treatment. Participants agreed that this was critical especially in dealing with TB among adolescents and fishing communities. After giving feedback, stakeholders from various institutions were asked what they would like to see implemented and stated the following.

Feedback/Recommendations from County/Government

- There should be indicators in monitoring and evaluations forms to capture TB key populations and the socio-economic status of TB patients
- There should be shadowing of Government TB response, to ensure that the Government addresses and responds to the needs of TB KP. Civil society monitoring of Government activities will enhance accountability by the Government.
- There is a need for TB screening mobile outreaches to cater for those who can't go to health facilities during the day or morning
- IPT is needed for HCW and prison staff (those exposed to TB) and a need for preventive services for TB. There is need for advocacy for wider implementation of IPT
- The Information Education and Communication (IEC) material on TB awareness that counties use are out-dated and needs to be pictorial and translated into local dialects
- Strengthen referral systems from the community to facilities.

Feedback/ Recommendations from CSO

- There is need for better services for in-patient services for DS-TB patients who are co-infected with HIV.
- There is need for more flexible hours at health facilities that offer TB services, so as to cater for those who work during the morning and day
- There is need advocacy for budget reallocation, only KES 1 million (about US\$ 10 000) was allocated for TB advocacy in the Global Fund round of funds and this is not enough money for TB related advocacy in the country
- There is need for multi stakeholder inclusion in creating TB awareness such as religious leaders
- The need for mobile outreaches for TB screening was reiterated by CSOs
- TB LAM needs to be implemented in Kenya

Conclusion

This rapid assessment determined that gender influences the TB seeking behaviour and access to TB services in Kenya. While there may be other determinants that affect access to services, the impact of gender can be seen from a social, cultural and economic lens. This may differ from one county to county in Kenya.

In Kenya, there is a link between occupation, susceptibility to TB and gender; such as most miners are men, most *Matatu* crew are men, most truck drivers are men and most *boda boda* riders are men, all who are considered TB KPs by respondents. There could be a link between where men go for entertainment and susceptibility to TB; this link needs to be investigated further in Kenya.

There could be high TB transmission in bars, video dens and sports bars due to poor ventilation; all these places frequented mostly by men and not women. Men and women face different challenges and barriers in accessing TB services. The economic and social inequalities across the genders and a lack of robust studies and analysis on the health seeking behavior of men and women from a gender perspective dictates the need for a robust national study to address the broader social barriers to health, gender inequality and other human rights barriers to accessing health. Gender is an integral part in the delivery of TB services; therefore it is important for the national and county governments to carry out comprehensive surveys that will inform gender responsive TB services.

This assessment confirmed that Kenya has not carried out a holistic mapping on who the TB key populations are; which differ from county to county and depend on the lifestyle, occupation, region and other determinants. Mainly through borrowing from the mapping study on HIV key populations, the national TB programme identified some of the key

populations but the TB KP list should be finalized through evidence by a national study to determine TB key populations in all counties. There are new and emerging TB key populations in Kenya (such as the islanders) that need to be addressed.

In order to have a holistic approach in responding to TB, the government both at the national and county levels needs to embrace the human rights approach in the delivery of TB services. A human rights based approach to offering TB services will address any gender inequalities, discriminatory practices and any unjust power relations, which may be at the core of TB service delivery.

Additionally, this approach will address both the health rights and any other social economic inequalities that have an impact on accessing TB services including lack of housing, water, sanitation and nutrition. In the formulation of any programmes, the rights based approach will ensure the participation of all actors including the TB key populations.

We hope that this assessment will result in a national survey so as to inform effective gender responsive and key population centered TB policies and management.

End Notes

(Endnotes)

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Appendix 1: List of Recommendations with timelines

GENDER – TB RECOMMENDATION			
ACTOR	IMMEDIATE	SHORT TERM	LONG TERM
NATIONAL GOVERNMENT	Amendment of reporting tools to Capture of data on a regional basis	National survey on barriers to TB based services on gender and cultural norms	Develop policy to Increase the number of men as nurses and CHV where they are few
	Develop gender specific interventions based on analysis and use of data collected to inform decisions based on gender	Develop TB gender guidelines for men, women, boys and girls	Inclusion of TB in the KDHS
	Awareness on TB targeting men, women, boys, girls and KPs	Have an effective M&E programme that takes into account gender	
	Increase the health facility hours beyond 5.00p.m	Adapt gender responsive programming	
	Integration of TB services in antenatal clinics and maternal health clinics	Integrate a rights based approach in the design and implementation of programmes	
COUNTY GOVERNMENT	Amendment of reporting tools to capture of data on a sub county basis	National survey on barriers to TB based services on gender and cultural norms	Increase the number of men as nurses and CHV where they are few
	Develop gender specific interventions based on analysis and use of data collected to inform decisions based on gender	Adapt gender responsive programming for service delivery	
	Awareness on TB targeting men, women, boys, girls and KPs	Integrate a rights based approach in the design and implementation of programmes	
	Increase the health facility hours beyond 5.00p.m		
	Integration of TB services in antenatal clinics and maternal health clinics		
CSOs	Advocate for, participate in the development and ensure monitoring of the implementation of activities given to the national and county government		
KEY, VULNERABLE AND UNDERSERVED POPULATIONS AND GENDER RECOMMENDATIONS			
NATIONAL GOVERNMENT	Include transgender or other gender in the register of patients	Undertake a national mapping of KPs and their interaction with gender	
	Develop tools to help in the identification of TB KPs	Allocate more funding for TB to address KPs	
	Create awareness and enhance the capacities of health care workers to work with KPs	Develop guidelines on handling of KP TB patients	
	Inclusion of KPs in the planning, development and implementation of programmes		

GENDER – TB RECOMMENDATION

COUNTY GOVERNMENT	Include transgender or other gender in the register of patients	Undertake a national mapping of KPs and their interaction with gender	
	Create awareness and enhance the capacities of health care workers to work with KPs	Implement tools to help in the identification of TB KPs	
	Inclusion of KPs in the planning, development and implementation of programmes	Allocation of more funding on TB to address KPs	Allocation for more funding on TB
		Develop specific KPs programmes depending on the KPs in the county	
CSOs	Create awareness in the community about KPs	Create awareness on TB to the county governments and members of the assembly	
	Create awareness among KPs on their rights to health including TB services	Lobby for increase in funding for KPs and TB	
		Participate in the development of guidelines on KPs	
	Participate in the development of strategies on TB	Provide technical expertise on TB	
HUMAN RESOURCE AND COMMUNITY ENGAGEMENT			
NATIONAL GOVERNMENT	Engage the private sector include traditional herbalist on TB management	Develop policies and protocols (regulations guidelines and standards) on handling TB the private sector	Monitor and evaluate the partnership
	Enhance the capacities of the private sector	Develop an effective referral mechanism	
	Ensure the private sector meets the requirements of law/standards and guidelines for TB	Develop an effective referral mechanism	
COUNTY GOVERNMENT			
PRIVATE SECTOR		Enhance the capacities of the members of the private sector on TB	Invest in GeneXpert machines
NATIONAL GOVERNMENT	Build capacities of CHVs and CHEWs	Employ more experts on TB	Integration of CHV and CHEW in government set up
	Sensitization of HCW, CHV, CHEW and community on patients charter	Build capacities of CHV on policies, guidelines and standards on TB	Engagement of more men as CHVs
	Provision of TB protective gear to HCW and CHVs		

GENDER – TB RECOMMENDATION			
COUNTY GOVERNMENT	Sensitization of HCW, CHV, CHEW and community on patients charter	Employ more experts on TB	Integration of CHV and CHEW in government set up
	Provision of TB protective gear to HCW and CHVs	Build capacities of CHV on policies, guidelines and standards on TB	Engagement of more men engaged as CHVs
	Awareness creation to communities on TB	Mapping of CSOs in the county working on TB	
CSOs	Create awareness on TB	Enhance the capacities of CHV and HCW	Monitor performance of CHVs and HCW in the provision of health services on TB
POLITICAL WILL			
NATIONAL GOVERNMENT	National government ministry of health engaged	Enhance understanding of National Assembly (parliament and senate) on TB	Have a joint multi-sectorial body to oversee activities on TB
		Cultivate critical mass of members of the National assembly	Increase the number of GeneXpert machines
COUNTY GOVERNMENT	County government engaged on health	Enhance the capacity of the members of the county government and county assembly on TB	Have a multi-sectorial coordinating body on TB
		Cultivate a critical mass of members on TB	Increase the number of GeneXpert machines
LEGAL AND POLICY RECOMMENDATIONS			
NATIONAL GOVERNMENT	Repeal/amend the Public Health Act to take into account changes in treatment and guarantee human rights/ and or develop a specific law on TB	Develop a joint TB/HIV policy to guarantee a unified approach to the two disease	Develop Adopt and implement regional policies and strategies including a cross boarder referral policy on TB with other regional members
	Adopt and implement policies and guidelines including laws and guidelines on occupational hazards, screening guidelines for HCW	Include TB in the National schools Health policy and or Develop TB specific policies for schools and colleges	
	Include social protection benefits to TB/develop a specific TB social protection policy	Develop work place policies, infection control policy, sputum transportation guidelines	
	Finalize and adopt isolation policy	Develop policies and guidelines that guarantee free services for TB patients	
		Strengthen and amend prisons referral policies for better management of releases prisoners and refugees/migrants	

GENDER – TB RECOMMENDATION

GENDER – TB RECOMMENDATION			
		Integration of TB and HIV services into antenatal services	
COUNTY GOVERNMENT	Implement policies passed at the national government	Develop work place policies	
		Develop an infection control policy	
		Integration of TB and HIV services into antenatal services	
CSOs	Participate in the development of laws, policies and guidelines	Create awareness on laws and policies on TB	Monitor the implementation of the laws and policies on TB

Appendix 2: List of Participants at Buy in Workshop

Participants Name	Designation
1. Erick Okioma	COMET
2. Soloaka Pilipili	MOH
3. Esha Fumo	MOH
4. Karen Kuria	STP-K
5. Winnie Wachiuri	UNAIDS
6. Rebecca Awiti	Soweto PHC
7. Timpyian Leseni	TALAKU
8. Mary M. Asoyong	MOH
9. Maurice Oora	Lean on me
10. Elizabeth Odara	Community
11. Nancy Jaramba	Community
12. Donald Yara	MOH
13. Christine Mwamuidi	Amref Health Africa
14. Amos Ndobi	NTLD-P
15. Melissa Murihia	KP consortium
16. Sarah Chandi	MOH
17. Dr. Stella Bosire	Consultant
18. Reuben Yego	MOH
19. Joseph Mutiria	Prisons
20. Samuel Makau	GTBC
21. Brandley Njuhia	KEEWA
22. Judy Odundo	WOFAK
23. Khairunisa Suleiman	Consultant
24. Gatukuru Dennis	KANCO
25. Anne Ronoh	M.Francesco
26. Jennifer Ngulugu	NTLD-P

27. Geoffrey Okallo	NTLD-P
28. Jane Otieno	JOOTRH
29. Molly Ojwando	HENNET
30. Stephen Angula	Pamoja
31. Felix Mutiso	Kenerela
32. Christine Nahawa	KELIN
33. Patricia Ochieng	DACASA
34. Zacheas Muturi	AMREF
35. Eunice Mailu	NTLD-P
36. Jackie Wambui	NGAINA
37. Njeri Kuria	NTSA
38. Samuel Kyalo	KELIN
39. Rashid Bulize	MOH
40. Kim West	MSF
41. Wairimu Gitau	MSF

Appendix 3: Data Collection Tools

NTLD-P staff

1. Briefly describe your position.
2. How long you have been a policy maker for?
3. What are the gender related barriers to accessing TB in Kenya?
4. What are the solutions to these gender related barriers? Prompt for legal, policy, provider and self levels solutions
5. The National TB prevalence survey revealed that males are twice as likely to have TB than women, the annual report in 2016 showed the same trend in DR-TB cases. Women over 65 years were also found to have high TB burden. Girls in the 13-year age group were also found to have profoundly more DR-TB than boys at their age. Which interventions targeted towards young men, elderly women and girls will the TB programme put in place?
6. Are there policy barriers that impede access to TB prevention, diagnosis and treatment for different genders?
7. Do you intend to do a study looking into the health/TB seeking behaviour of males in Kenya?
8. In your opinion, which are the TB key populations in Kenya? Why?
9. Which barriers do these key populations face when accessing TB and TB-HIV services in Kenya?
10. Which solutions can be put in place to overcome these barriers?
11. What policies are currently in place that target TB key populations in Kenya?
12. When workshop stakeholders were asked to list the three Key populations in Kenya, they said LGB-

TI, Transgender and Refugees/Immigrants. The LGTBI and transgender populations are consistently unrecognized and ignored by Government, some technical and development partners, which feasible solutions can be put in place so that they don't experience barriers in accessing TB and TB-HIV services?

13. What can be done to remove barriers for refugees/immigrants in terms of accessing TB services?
14. What can be done to improve TB cross border surveillance and service provision within EAC?
15. How does gender interact with being in a key population when accessing TB services? Do these individuals unique face barriers to accessing TB services? Which solutions can be put in place to overcome these barriers?
16. Do you think legislation specifically targeting TB is needed, in addition to existing policies of the National Tuberculosis and Leprosy Control Programme?
17. What can be done to have effective TB-HIV integration in Kenya?

CTLCS:

1. Which county do you work in?
2. Briefly describe your role as a CTLC
3. Which gender and age group is most affected in terms of TB in your county?
4. What are the challenges you face in providing care to those affected by TB in your county?
5. What are the social norms regarding men and women in your county?
6. What are the health seeking behaviours of men and women who seek your services in your county?

7. (If not addressed in previous questions) How do social norms impact on TB seeking behaviour in your county?
8. How can TB services be improved in your county to cater for gender differences?
9. Which groups of people do you consider as TB key populations in your county?
10. What are the social norms regarding key populations such as MSMs, transgender, injected drug users, HCW, nomads refugees, truck drivers children under five etc.? (Prompt for any other KP that they mention for their county)
11. How is the health seeking behaviour of the KP (mention which ones) impacted by the social norms?
12. What are the challenges the KPs face in accessing TB services in your county (diagnosis, treatment and care)
13. What do you consider to be the major obstacles facing those affected by TB in obtaining testing and treatment?
14. How do you feel TB patients are generally treated in your county healthcare settings?
15. How do you feel TB patients who are in the KP (mention KP) treated in your county?
16. How can TB services be improved in your county to cater for KPs?
17. In relation to gender and key populations, do you have any further recommendations on how to improve TB services (diagnosis and treatment) to patients in your county?

Former TB patients (TB survivors)

1. Where are you from and what is your profession? What is your community and residence like? (To assess environmental determinants)

2. How long have you had TB? Is it drug - resistant?
3. Did your family or community treat you differently after they learned you had TB? If so, how? If not, why do you think you were not treated differently?
4. Have you been treated differently by your employer or co-workers because you have TB?
5. Did you think you had TB before you were diagnosed?
6. How much did you know about TB before you were diagnosed?
7. •What information did you receive about TB once you were diagnosed and undergoing treatment?
8. What were some of the difficulties you faced in obtaining testing and treatment for TB?
9. Was there a delay between when you thought you had TB and when you were diagnosed?
10. Have you ever considered stopping your treatment for any reason? If so, for what reason?
11. How do you feel people with TB are generally treated in healthcare settings?
4. What are the major gender related issues faced by people with TB? And TB-HIV co-infected people?
5. What gender related interventions, and strategies may be implemented to remove the gender related barriers when accessing TB and TB-HIV services (prevention, testing, treatment and care)?
6. What gender transformative legal or policy reforms would improve the prevention, treatment and care for those affected by TB? What reforms do you think are realistic?
7. What are the major barriers, including legal or policy barriers, for people affected by TB in accessing?
8. How can these barriers be removed to promote more effective prevention, treatment and care for people affected by TB?
9. Does civil society focus on TB key populations, such as the urban and rural poor, prisoners and migrants, in their work?
10. How receptive is the government to the input and advocacy of civil society and community groups in TB and TB-HIV co-infection activities?

Civil Society / Community Groups

1. What kind of work does your organization do in the area of TB? And TB-HIV co-infection?
2. What can practically be done to improve TB-HIV integrated services in Kenya?
3. How long you've worked for Civil Society?

Key Populations

1. If transgender: How do you identify yourself? (Prompt in the case of transgendered man or woman)
2. Have you had to access TB services or TB-HIV services or know someone who has?
3. What barriers do you face when accessing TB services (or TB-HIV services) as a transgender person?

4. What legal barriers exist in Kenya, which contribute to the barriers that you face while accessing TB and TB-HIV services?
5. What can be done to overcome these legal barriers?
6. What TB policy barriers exist in Kenya, which contribute to the barriers that you face while accessing TB and TB-HIV services?
7. What can be done to overcome these policy barriers?
8. What gender transformative strategies would you like to see in place that the TB programme implements?

Technical Partners specifically WHO

1. Kindly describe your role at your organization.
2. In your opinion what are the gender related barriers to accessing TB and TB-HIV services in Kenya? Prompt for legal, policy, self and provider level barriers, paucity of data.
3. What are the solutions to these barriers?
4. What is your opinion on legal protection of TB patients?
5. Can you kindly provide any guidance documents that the WHO has on TB, gender and key populations?
6. In your opinion, which are the TB key populations in Kenya? Why?
7. Which barriers do these key populations face when accessing TB and TB-HIV services in Kenya?
8. Which solutions can be put in place to overcome these barriers?

9. When workshop stakeholders were asked to list the three Key populations in Kenya, they said LGBTI, Transgender and Refugees/Immigrants. The LGTBI and transgender populations are consistently unrecognized and ignored by Government, some technical and development partners, which feasible solutions can be put in place so that they don't experience barriers in accessing TB and TB-HIV services?
10. What can be done to remove barriers for refugees/immigrants in terms of accessing TB services?
11. How does gender interact with being in a key population when accessing TB services? Do these individuals unique face barriers to accessing TB services? Which solutions can be put in place to overcome these barriers?
12. What can be done to have effective TB-HIV integration in Kenya?

Development Partners (CDC)

1. Kindly describe your role at your organization.
2. Briefly describe the TB related activities CDC is involved in, in Kenya.
3. In your opinion what are the gender related barriers to accessing TB and TB-HIV services in Kenya? Prompt for legal, policy, self and provider level barriers, paucity of data.
4. What are the solutions to these barriers?
5. Do you offer any technical support to the TB programme on how to implement gender responsive interventions when providing TB services? Why or why not?
6. Do you offer any technical support to the TB programme on how to implement KP responsive interventions when providing TB services? Why or why not?

7. In your opinion, which are the TB key populations (KP) in Kenya? Why?
8. Which barriers do these key populations face when accessing TB and TB-HIV services in Kenya?
9. Which solutions can be put in place to overcome these barriers?
10. How does gender interact with being in a key population when accessing TB services? Do these individuals unique face barriers to accessing TB services? Which solutions can be put in place to overcome these barriers?
11. When workshop stakeholders were asked to list the three Key populations in Kenya, they said LGBTI, Transgender and Refugees/Immigrants. The LGTBI and transgender populations are consistently unrecognized and ignored by Government, some technical and development partners, which feasible solutions can be put in place so that they don't experience barriers in accessing TB and TB-HIV services?
12. What can be done to remove barriers for refugees/immigrants in terms of accessing TB services?
13. What can be done to improve cross-border TB surveillance and TB service provision within the EAC?

Implementing and Technical Partners (e.g. MSF and Amref)

1. Kindly describe your role(s) at your organization.
2. Briefly describe the TB related activities your organization is involved in, in Kenya.
3. In your opinion what are the gender related

barriers to accessing TB and TB-HIV services in Kenya? Prompt for legal, policy, self and provider level barriers, paucity of data.

4. What are the solutions to these barriers?
5. Do you offer any technical support to the TB programme on how to implement gender responsive interventions when providing TB services? Why or why not?
6. Do you offer any technical support to the TB programme on how to implement KP responsive interventions when providing TB services? Why or why not?
7. In your opinion, which are the TB key populations (KP) in Kenya? And Why?
8. Which barriers do these key populations face when accessing TB and TB-HIV services in Kenya?
9. Which solutions can be put in place to overcome these barriers?
10. How does gender interact with being in a key population when accessing TB services? Do these individuals unique face barriers to accessing TB services? Which solutions can be put in place to overcome these barriers?
11. When workshop stakeholders were asked to list the three Key populations in Kenya, they said LGBTI, Transgender and Refugees/Immigrants. The LGTBI and transgender populations are consistently unrecognized and ignored by Government, some technical and development partners, which feasible solutions can be put in place so that they don't experience barriers in accessing TB and TB-HIV services?
12. What can be done to remove barriers for refugees/immigrants in terms of accessing TB services?
13. What can be done to improve cross-border TB surveillance and TB service provision within the EAC?

Prisons

1. Briefly describe your role at the Prisons
2. What is the burden of TB in Kenyan Prisons?
3. What are the average TB transmission rates in Kenyan prisons?
4. Which prison has the highest burden of TB?
5. Which prison has the lowest burden of TB?
6. What are the challenges you face in providing care to those affected by TB in prisons?
7. What are the health seeking behaviours of men and women who access services in your prisons?
8. (If not addressed in previous questions) How do social norms impact on TB seeking behaviour in your prisons?
9. How can TB services be improved in prisons to cater for gender differences?
10. Which groups of people do you consider as TB key populations in prisons?
11. Do you consider prison wardens as key populations? (If not mentioned)
12. What are the social norms regarding key populations such as prison wardens, MSMs, transgender, injected drug users? (Prompt for any other KP that they mention for their county)
13. How is the health seeking behaviour of the KP (mention which ones) impacted by the social norms?
14. What are the challenges the KPs face in accessing TB services in prisons (diagnosis, treatment and care)
15. What do you consider to be the major obstacles facing those affected by TB in obtaining testing and treatment?
16. How do you feel TB patients are generally treated in your prison settings?
17. How do you feel TB patients who are in the KP (mention KP) treated in your prisons?
18. How can TB services be improved in your prisons to cater for KPs?
19. In relation to gender and key populations, do you have any further recommendations on how to improve TB services (diagnosis and treatment) to patients in your prisons?

Appendix 4: List of Key Informants

No	Name of Interviewee	Designation	Type of Organization
1	Carolly Migwomba	CTLC Homa Bay	County Government
2	Bernard Bosire	CTLC Busia	County Government
3	Timothy Malika	CTLC Kisumu	County Government
4	Elizabeth Mueni	CTLC Nairobi	County Government
5	Eunice Mailu	M&E Officer	NTLD-P: National Government
6	Maureen Kamene	Head	NTLD-P: National Government
7	Joseph Mutiria and Ernest Kimutai (joint interview)	TB/HIV Prevention Officer and TB/HIV Clinical Officer	Prison Headquarters: National Government
8	Enos Masini	TB Technical Advisor	WHO: Technical/Development Partner (Non-state actor)
9	Ulo Benson and Anne Munene (joint interview)	Project Manager and Project Officer	*AMREF: Technical Partner (Non-state actor).
10	Alexander Vandenbulcke and Stephen Wanjala (joint interview)	Medical Coordinator and Deputy Medical Coordinator	MSF Paris: Technical Partner (NGO)
11	Evaline Kibuchi	National Coordinator	Stop TB Partnership Kenya Civil Society (NGO)
12	Nelson Otwoma	National Coordinator	NEPHAK: Civil Society (NGO)
		FGD	
13	Steve Anguva	Founding Member	Pamoja TB (CHV and TB survivor)
14	Alexandra Ogeta		Jinsi yangu

Appendix 5: List of Participants at Validation Workshop

Participants Name	Designation
1. Mary Katana	RCO/SCTLC
2. Eunice Mailu	MOH
3. Teresa Michieka	MOH
4. Khairunisa Suleiman	Consultant
5. Timpiyan Leseni	Talaku CBO
6. Mavisi Violet	Consultant
7. Jennifer Njuhigu	MOH
8. Zulfikar Ali	Community Health Advocate
9. Sam Kyalo	Lawyer
10. Geoffrey Munialo	Counselor
11. Gloria Kerubo	Sauti Skika
12. Kendi Anastacia	Nephak
13. Evaline Kibuchi	Stop TB – Kenya
14. Samuel Makau	GTBC
15. Carolly Mwiga	CTLC - MOH
16. Chrisantus A. Ndhawa	Community Health Advocate
17. Mercy Kinyua	TAC
18. Bernard Bosire	CTLC
19. Stephen Anguva	Pamoja TB group
20. Wariara Mugo	MSF
21. Joseph Mutiria	Kenya Prisons
22. Ernest Kinyua	Kenya Prisons
23. Rahab Mwaniki	KANCO
24. Sarah Chandi	SCTLC - MOH
25. Melissa Murihia	KP Consortium
26. Irene Kuria	KP Consortium
27. Dr Stella Bosire	Consultant
28. Patricia Asero	ICW - K
29. Timothy Wafula	KELIN
30. Alexandra Ogeto	Jinsiangu
31. Dr Jane Ong'ang'o	KEMRI
32. Winnie Wachiuri	UNAIDS
33. Geoffrey Okallo	NTLD-P
34. Solonka Pilipili	CTLC – MOH
35. Bradley Njukia	KESWA
36. Edward Omondi	Amref Health Africa
37. Teresa Michieka	MOH
38. Farijalla Olinia	MOH
39. Lucy Ghati	KELIN

Appendix 6: Gender and Equality Laws in Kenya

	LAW	POLICY	STRATEGY
1	Constitution	Vision 2030	The Second National Health Sector Strategic Plan (NHSSP 2012/13-2016/17)
2	Health act	Kenya health policy 2014-2030	The Kenya National Reproductive Health Strategy (2009-2015)
3	National Hospital Insurance Fund	National Reproductive health Policy	The Kenya National AIDS Strategic Plan (KNAPS)
4	Public Health Act	National AIDS Policy	The Vision 2030 Second Medium Term Plan (2013 -17
5	Employment Act	Public Sector Workplace Policy on HIV and AIDS 2010	The Division of Leprosy, Tuberculosis and Lung Diseases (DLTLD) Strategic Plan 2011-2015
6	Occupational Safety and Health act	Kenya National Social Protection Policy	The Ministry of Education Strategic Plan 2008-2012
7	Work Injury Benefits Act	National Adolescent Sexual and Reproductive health Policy	Guidelines for TB Infection Prevention and Control for Health Care Workers in Kenya 2014
8	Legal Aid Act	The National Human Rights Policy and Action Plan	Guidelines for HIV Testing in Clinical Settings 2006:
9	The Preservation of Human Dignity and Enforcement of Economic and Social Rights Bill	Session Paper No 2 of 2006 on Gender and Development	Guidelines for TB Prevention and Control for Health care workers in Kenya
10	Public Participation Bill	National Policy on Gender and Development (2000)	Occupational Safety and Health Policy Guidelines for the Health Sector in Kenya 2014
11	The HIV and AIDS Prevention and Control Act 2006		Ministry of Health: Kenya HIV Prevention Revolution Road Map: Countdown to 2030
12	Persons Deprived of Liberty Act 2014		National Guidelines for HIV Testing and Counseling in Kenya 2010
13	Prisons Act (cap 90)		Kenya Guidelines for Management of Tuberculosis and Leprosy 2013
14			National Strategic Plan on Tuberculosis, Leprosy and Lung Diseases (2015-2018) 15
15			National Reproductive Health and HIV and AIDS Integration Strategy 2009
16			Kenya Health Sector Strategic and Investment Plan (KHSSPI) 2013-2017
17			National Health Referral Strategy 2014-2018

	LAW	POLICY	STRATEGY
18			National Aids Control Council Strategy on Mainstreaming Disability Agenda in the National AIDS Control Council and the Country's HIV & AIDS Response (2014-2018)
19			Ministry of Public Health and Sanitation Strategic Plan 2008-2012
20			Global Fund TB and HIV Concept Note

Appendix 7: International and Regional Treaties to Enhance Gender Equality

	International and Regional treaties	International/regional strategies and guidelines
1	The Universal Declaration of Human Rights (1948);	Abuja Declaration and Frameworks for Action for the Fight against HIV/AIDS, Tuberculosis and other related diseases in Africa 2001
2	The International Covenant on Economic, Social and Cultural Rights (1966);	Dakar Declaration 1994
3	The Convention on the Rights of the Child (1989);	Greater Involvement of People with AIDS (GIPA) and Meaningful Involvement of People with AIDS (MIPA) principles
4	The International Covenant on Civil and Political Rights (1966) and its two Optional Protocols	African Unions' Abuja call for Accelerated Action towards Universal Access for HIV/AIDS 2006
5	The Convention on the Elimination of All Forms of Discrimination against Women (1979);	African Union Roadmap on Shared Responsibility and Global Solidarity for AIDS, TB, Malaria Response in Africa 2012
6	The Convention on the Protection of the Rights of All Migrant Workers and Members of Their Families (1990);	Grand Bay (Mauritius) Declaration and Plan of Action, 1999
7	The Convention on the Rights of Persons with Disabilities (2006).	Political Declaration on HIV and AIDS: Intensifying our Efforts to Eliminate HIV and AIDS, 2011
8	The African Charter on Human and Peoples' Rights (1981)	United Nations General Assembly Special Session on HIV/AIDS (UNGASS) 2001 United Nations
9	The Protocol to the African Charter on Human and Peoples Rights on the Rights of Women in Africa (Maputo Protocol)	General Assembly Special Session on HIV/AIDS (UNGASS) 2001
10	The African Charter on the Rights of the Child	Sustainable Development Goals
11		World Health Organization: The End TB strategy
12		The Patients' Charter for Tuberculosis Care: Patients' Rights and Responsibilities
13		East African Community Health Protocol 2013
14		East African Community: HIV and AIDS/STI and TB Multi-sectorial Strategic Plan and Implementation Framework 2015-2020
15		The East African East African HIV & AIDS Prevention and Control Act:

Appendix 8: TB Management in Kenya

TB is managed through the ministry of health under the National Tuberculosis, Leprosy and Lung Disease Program (NTLD-P), which is under the Division of Communicable Disease Prevention and Control Directorate of Preventive and Promotive health Services. The program is linked to the county level through the 47 County Tuberculosis, Leprosy and Lung Disease Coordinators (CTLCS) who provide technical and implementation support to the sub county coordinators. The NTLD-P's mandate includes development of policies, guidelines, setting standards, identifying and mobilizing resources.

In 2002, in recognition of high TB-HIV co-infection, attempts were made to bring HIV and TB care and control into one administrative unit. This attempt did not work very well and NLTD-P and the National AIDS and STI Control Program (NASCO) continued to run independently at national levels. However, there are close collaborations between the programs at the facility level where there is integration of TB and HIV services. In 2012 for example, over 93% of patients with TB were tested for HIV. Some 98% of TB-HIV co-infected patients received Cotrimoxazole Preventative Therapy and 74% were started on ART. TB and HIV services were offered in 75% of the facilities. However, there has been limited use of Isoniazid Preventive Therapy in PLHIV and among child contacts of people diagnosed with TB. TB "Infection control practices were found to be inconsistent, and generally sub-optimal in many health facilities serving patients with TB" (National Tuberculosis, Leprosy and Lung Diseases Strategic Plan 2015-2018)

Notably collaboration of the TB and HIV program at national level is wanting, which is illustrated by limited joint strategic planning of the two programs, although joint collaborative activities do exist. There are also no indicators at national level to show contributions of each program towards managing TB-HIV co-infection; such as attendance levels and contributions of the HIV program to TB policies, algorithms and performance review meetings. The National strategic plan of the NLTD-P 2015-2018 acknowledges the effects of HIV on TB patients. But this is not supported by activities or strategies to deal with the co-infection at a policy level. The NTLD-P strategic plan noted that though there were gains made in the implementation of collaborative activities, key elements to support a sustainable TB/HIV practices were either lacking or were weak.

Nairobi Office
4th floor Somak House Mombasa Road

-  112 - 00202 Nairobi
-  +254 788 220 300
-  +254 708 389 870
-  info@kelinkenya.org
-  www.kelinkenya.org
-  @KELIKenya

Kisumu Office
Aga Khan Road Opp Jalaram Academy

-  17708 - 40100 Kisumu,
-  +254 (57) 253 2664
-  +254 708 342 197
-  info@kelinkenya.org
-  www.kelinkenya.org
-  [Facebook/kelinkenya](https://www.facebook.com/kelinkenya)