

Partners in the fight against TB

Report on Pharmacy Engagement Initiative (2012-17)







#### Preface

#### Greetings from REACH

uberculosis (TB) is a disease that is preventable and curable but remains the largest killer among communicable diseases, affected people in the 15-49 age group. TB is also the leading cause of death among people with HIV and increasing multidrug resistance is a critical public health challenge. Every year, 4.8 lakh people are estimated to die of TB in India.

Responding to these challenges, the Government of India has declared its commitment to eliminating TB by 2025, ahead of the SDGs goal. To achieve this target, we need the concerted efforts of the public and private healthcare sectors, and this includes private pharmacies. Engaging all care providers is an essential part of the End TB Strategy and has been in the country's National Strategic Plans over the years as well.

Since our inception, REACH has been working on establishing a sustainable network of providers, communities and patients. Among the many healthcare providers, we felt that it was critical to engage pharmacists and saw tremendous scope in involving them to control TB. Pharmacists can identify those with TB symptoms in the early stages and refer them to the appropriate diagnostic and treatment facilities. They can also be treatment observers and providers and play the role of an effective counselor, who can motivate patients and support them to complete treatment.

With support from the Lilly MDR-TB Partnership (now Lilly Global Health), REACH has implemented a five-year initiative to engage with pharmacies in Chennai. Our primary objectives included facilitating private pharmacies to actively identify and notify TB patients and to establish their role as important stakeholders in the TB response.

This document highlights some of our key activities and achievements over the last five years. We hope you will find this useful and we welcome your feedback.

**Dr. Nalini Krishnan**Director - REACH

# Acknowledgements

**K** EACH thanks the Central TB Division, State TB Officer, District TB Officers, Chennai Corporation and the RNTCP team for their constant support in the implementation of the Pharmacy Engagement Initiative.

REACH also thanks the State Drug Controller of Tamil Nadu who provided us with support and encouragement from the very beginning and has been instrumental in the successful implementation of this model.

Our special thanks to the Pharmacy Associations at the National, State, District and Zonal levels for their enthusiastic support and participation in the fight against TB.

We acknowledge the valuable support, cooperation and contribution of all the Drug and Chemist Associations of Chennai city who provided us with a platform to reach out to their member pharmacists.

We thank all the pharmacies who adopted the DIRECT strategy and supported TB patients by referring them to quality TB care services. We are deeply appreciative of your involvement in the lives of your clients and customers.

We thank Dr. S N Misra for his inputs to this report.

We especially thank Ms. Amy Israel, Global Health Thought Leadership & Policy Director, Lilly Global Health and Ms. Sunita Prasad, former Program Manager, Lilly MDR-TB Partnership for their wholehearted support and encouragement throughout the project period.

Finally, we extend our gratitude to all the community volunteers who have, tirelessly and dedicatedly, worked to support TB patients and their families.

# Table of CONTENTS

**Executive Summary** 

Background

1

2

3

4

5

REACH PPM model for TB control

**Engaging private pharmacies for TB control** 

Process of engaging with pharmacists

**Key findings** 

**Conclusion** 

## Acronyms

ART Anti-Retroviral Therapy

ATT Anti TB treatment

CBNAAT Cartridge Based Nucleic Acid Amplification Test

DALYS Disability Adjusted Life Years

DMC Designated Microscopy Centre

DMC Designated Microscopy Centre

DOT Directly Observed Treatment

DOTS Directly Observed Treatment Short course

DST Drug susceptibility testing

**GP** General Practitioner

HIV Human Immuno Deficiency Virus

IEC Information, Education and Communication

MDRTB Multi Drug Resistant TB

MoU Memorandum of Understanding
NGO Non-Governmental Organization

NTP National TB programme

PPM Public-Private Mix

RNTCP Revised National Tuberculosis Control Program

SDGs Sustainable Development Goals

STCI Standards for TB care in India

TNCDA Tamil Nadu Chemist and Druggist Association

TB Tuberculosis

WHO World Health Organization

YLLs Years of Life Lost

# **Executive Summary**

India's achievements in Tuberculosis (TB) control over the last decade are remarkable but we continue to have the world's highest TB burden. The estimated incidence and mortality in 2015 was 2.8 million and 480,000 respectively. In recent years, several new initiatives and policy changes have been introduced including the introduction of mandatory notification in 2012 which requires all healthcare providers to notify every TB cases diagnosed and/or treated to local authorities; the banning of serological tests for diagnosis of active TB; and most recently, the introduction of fixed dose combinations or the daily treatment regimen, marking a shift from intermittent therapy. There have been enhanced efforts to engage with private providers, given that over half of all TB patients first seek care in the private sector. In this context, there is considerable evidence to show that private pharmacies or drug retailers are often the first point of contact for common health ailments.

In 2012, REACH, with support from the Lilly MDR-TB Partnership, embarked on a five-year plan to establish a sustainable partnership for TB control with private pharmacies in Chennai, Thanjavur and Tiruchirappalli districts of Tamil Nadu. The initiative's key objectives and achievements include establishing a sustainable partnership with private pharmacists for TB control by facilitating prompt referral of those with symptoms and TB patients; creating awareness on TB and DOTS among communities through private pharmacies and encouraging pharmacists to act as DOT providers.

Over the five-year period, REACH trained 2264 pharmacies, sensitised 2323 community members and also trained 600 pharmacy students. REACH received 2919 referrals to government and PPM centres. This included 2116 individuals with symptoms of TB, of whom 285 were diagnosed with TB and started on treatment as well as 803 TB patients, of whom 671 were linked to appropriate treatment and care. In all, 143 pharmacists provided DOT to 258 TB patients. The trained and engaged pharmacists have in turn, been motivating other pharmacists to join the fight against TB. All engaged pharmacists have participated in this initiative on a voluntary basis, and have not received any financial incentives. Their role in TB control has been recognized by the State Drug Department and the State and District TB Offices, which has been a source of encouragement for the pharmacists. REACH has facilitated several meetings of pharmacists with these officials, where their contribution to the TB control program has been showcased. Encouraged by the success of this model of pharmacy engagement, there are plans to replicate this in other districts of Tamil Nadu as well as other states across the country.

Through this initiative, REACH has demonstrated that the contribution of private pharmacies to the TB response is considerable and it is critical to engage with them in a sustained manner.

#### **About REACH**

REACH is a non-governmental organisation based in Chennai in South India, dedicated to the fight against TB for two decades. Managed by an Executive Committee with Prof M S Swaminathan as Chairman, REACH works as an interface between the public and private healthcare sectors and has taken a lead role in introducing several innovative and effectual interventions for TB control.

REACH believes in an integrated, multi-sectoral approach to community and public health issues and is committed to ensuring that those affected by TB receive the highest quality of treatment and care that they deserve.

REACH's mandate includes providing care and support for TB patients as well research, strategic advocacy, public education and communications on TB.

### About the Lilly MDR-TB Partnership

The Lilly MDR-TB Partnership was established in 2003 to reduce suffering due to TB and MDR-TB. With the majority of the world's TB burden in India, China, Russia and South Africa, the Lilly MDR-TB Partnership brought together government leaders, global health organisations, country-level healthcare providers, community and advocacy organisations and other stakeholders in their countries.

Their work involved piloting new models of care and healthcare provider training that, if proven to be effective, could be replicated in other communities.

The Lilly MDR-TB Partnership is supported by the Lilly Foundation and United Way Worldwide. REACH has been working with support from the Lilly MDR-TB Partnership since 2009.

# Background

ndia's achievements in Tuberculosis (TB) control over the past decade have been remarkable. More than 90 million people have been tested, more than 19 million TB patients detected and treated, and millions of lives saved by the RNTCP's efforts. India's ambitious new National Strategic Plan (NSP) for 2017 to 2025 aims to achieve universal Access to quality TB diagnosis and treatment.

Despite these achievements, India continues to have the highest TB burden in the world in terms of the absolute numbers of incident cases each year. Mortality due to TB is the third leading cause of Years of Life Lost (YLLs), in the country. The estimated incidence (new TB cases per year) is 2.8 million cases in 2015. The estimated mortality due to TB is 480,000 (TB India Report 2017). In 2013, India achieved complete geographical coverage for diagnostic and treatment services for Multi-Drug Resistant TB (MDR-TB), with nearly 93,000 persons with MDR-TB diagnosed and put on treatment till 2015.

In India, the private health sector is massive and heterogeneous. Studies have shown that more than 60% of TB patients seek care in the private sector. This reinforces the need to seek and establish effective partnerships with the private healthcare sector in the country. A recent report in The Lancet estimated that there could be 2.4 million TB patients taking treatment in the private sector in India.

Studies conducted since the 1990s have documented the extent to which TB is diagnosed and treated in the private sector, as well as the prevalence of largely inappropriate diagnostic and treatment practices. As a result, there are delays in diagnosis, out-of-pocket expenditure and irrational or unsupported treatment. Patients from low-income households lose several months of their income in the process of paying for inappropriate diagnostics and treatment before starting approved therapy.

Similarly, public health services such as surveillance, adherence monitoring, contact investigation, and outcome recording rarely reach privately-treated TB patients. Thus diagnosis and treatment of TB in the private sector remains largely unknown. In spite of mandatory notification, many patients are not notified to the RNTCP. This, combined with the absence of drug quality controls, leads to drug resistance. There has been a low uptake of RNTCP PPM schemes and a noticeable absence of a policy for private sector engagement. Two decades of attempts to improve collaboration between the public and private sectors, have not yet worked except in a few innovative pilots and this situation urgently necessitates enhanced engagement of the private sector.

Engaging Private Pharmacies in TB control: Both regulated and unregulated privatesector retail drug outlets, also known as pharmacies, chemists, drug shops, drug sellers, drug vendors, or informal drug sellers, are often the preferred first point of contact for common health ailments due to their inexpensive services, ease of access and lack of waiting time compared to public health facilities.

This is especially the case for TB, where about 50% of TB patients' first contact with the health system is a private pharmacist. Out of six countries (China, India, Indonesia, Nigeria, Pakistan and South Africa) which account for 60% of the cases, India has the highest TB burden, as well as the largest antibiotic consumption.

Antibiotics (and other medicines) are readily available over the counter, resulting in drug resistance. People who get their medicines without a prescription are often misdiagnosed and get the wrong medication or the wrong dosage, or do not take the medication for long enough. Previous studies have identified private pharmacies as a neglected link in TB control.

A recent paper published in the Journal of Pharmaceutical Practice and Policy observed that after more than 10 years, only 5-9% of private pharmacies had been successfully engaged in helping with TB control efforts.

In this context, REACH has been working to engage private pharmacies in Chennai in Tamil Nadu in South India.

#### REACH PPM model for TB control

The REACH PPM strategy aims at integrating and harnessing the synergies between the private and public health sectors, by supporting private practitioners to actively identify, diagnose and treat TB patients.

This initiative, which started with 30 health care providers, has evolved into a sustainable model, where REACH acts as an intermediary to provide TB care services. The main stakeholders in the initiative are private practitioners, private hospitals, patients, RNTCP team, and the community.

The PPM was set up as an informal non-profit model initiated bv REACH. Tuberculosis Research Centre (TRC) Chennai, an institute of the Indian Council of Medical Research (ICMR), provided technical support. The objectives of the PPM model were to increase patient



access to RNTCP services by involving private health care providers and to devise innovative methods to overcome barriers to engagement of private providers. This model was outside the RNTCP-evolved schemes for PPs and NGOs.

In this model training of PPs and engaging them in RNTCP was carried out by REACH. In addition, patient care and support for patients referred from PPs was provided by REACH from PPM centers (centers set up in private hospitals). The Corporation of Chennai provided logistic support for the PPM, which included treatment cards, laboratory supplies, registers and patient-wise drug boxes to the PPs through REACH.

# Engaging Private Pharmacies for TB Control

In 2006, REACH carried out a pilot intervention in Chennai, whereby pharmacists were sensitised about RNTCP and invited to contribute to the program by educating their clients about TB and referring patients or those with symptoms to appropriate treatment facilities.

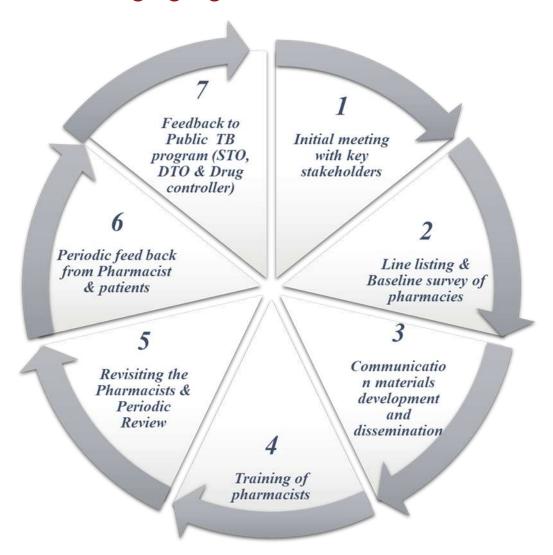
During the pilot, it was observed that by educating pharmacists about symptoms of TB and involving them in the program, it was possible to increase the number of patients screened for TB and reduce delays in diagnosis. The encouraging preliminary results supported scale up in order to make a significant impact.

With support from the Lilly MDR-TB Partnership, the Pharmacy Engagement Initiative was formally rolled out in 2012.

#### Objectives of the Pharmacy Engagement Initiative:

- Establish a sustainable partnership for TB control with the private pharmacies in Chennai
- Encourage referrals of TB symptomatics / patients from private pharmacies to REACH PPM centers / RNTCP
- Promote awareness on TB and DOTS through private pharmacies
- Facilitate pharmacists to act as DOT providers & thereby increase access to RNTCP at the community level by involving pharmacies
- Improve the quality of DOTS in the private sector.

# Process of Engaging with Pharmacists



Several activities were undertaken as a part of this Initiative, which included liaising with the local pharmacies and pharmacy associations; conducting a baseline survey to assess existing knowledge and beliefs about TB, its symptoms, diagnosis, treatment & referral process; and provision of relevant training and communication (IEC) materials. The pharmacists were also trained to be DOT providers. There were regular follow-up visits by the field staff to supervise and assess on ground implementation.

This project was primarily implemented in the city of Chennai and a light touch model was initiated in Thanjavur and Tiruchirapalli districts of Tamil Nadu. This document describes the activities and key findings based from Chennai.

## Key Features of The Initiative

#### Project inauguration





Launch of The Pharmacy Engagement Initiative in Chennai

The pharmacy initiative was inaugurated in Chennai on 13<sup>th</sup> September 2012. The launch was attended by Dr Preetha Reddy, Managing Director, Apollo Hospitals; Dr G Selvaraj, State Drug Controller, Tamil Nadu; Dr Arunagiri, State TB Officer, Tamil Nadu; Dr Jaya Shreedhar, Media Trainer and Health Communications Consultant; and Ms. Sunita Prasad, Consultant, MDR-TB & CSR, Eli Lilly India. The programme was also attended by partners from other organisations working on TB, pharmacists and journalists.

#### Working with Pharmacy Associations

As a first step, REACH identified and coordinated with the various branches of the pharmacy associations in Chennai.

Several rounds of discussions were held to discuss the feasibility and modality of field-level implementation of the proposed activities, and their inputs were incorporated into development of the pharmacy engagement strategy.



## **DIRECT Strategy**

A strategy was evolved in consultation with different stakeholders on how private pharmacists could be engaged in the TB control program. This strategy was named DIRECT.



Display of TB information



Identification of TB symptomatic



Referral of TB symptomatic & Patients



Education of TB patients



Counselling for TB patient



**T**reatment Providers

#### Coordination with State/District Health officials

REACH works closely with the State and District TB Officers and the pharmacy engagement process was developed in coordination with them. They were also appraised about the initiative periodically. Through this initiative, REACH was able to facilitate interactions between the Drug Controller and the State TB Officer in 2013. Through these meetings, a collective decision was taken to work in close coordination with each other for the purpose of TB Control. REACH visited the Drug Controller every quarter and updated him on the progress of the initiative. This provided an opportunity to brief him on the process and to discuss potential solutions to challenges that emerged.

#### Communication Materials developed and disseminated

Several different types of communication materials on TB were developed and disseminated to the pharmacists, who in turn disseminated these to their clients, TB patients and the community.

- → Patient booklet: This was developed both in English and Tamil for distribution during the workshops.
- → Patient information leaflets: These were designed containing basic facts on
  TB in an easy to understand pictorial manner.
- ✓ Envelopes: Basic information on TB (in Tamil) along with the REACH TB Helpline number was printed on envelopes and distributed to the clients by the pharmacies.
- ✔ Posters: Different posters on TB symptoms, where / when to seek care and cough hygiene were developed and displayed in the pharmacies.
- Referral slip: These had a counterfoil for referring patients to the nearby TB diagnostic centre and were given to TB patients or those who had symptoms of TB.
- ✓ **Newsletters**: These contained information on TB as well as pharmacists' experience in participating in TB control. This was a quarterly newsletter in Tamil with a circulation of more than 1000.
- ✓ **Flip Chart**: This was developed in Tamil for sensitising pharmacies during the one-on-one visits.

# ஒன்றிணைவோம் – உயிர்களை காப்போம் டிபியைத் தடுப்போம் Join Hands – Save lives – Stop TB!!!

2 வாரங்கள் தொடர்ந்து இருமலா? TBயின் அறிகுறியாக இருக்கலாம் Do you have cough for more than 2 weeks? This could be a symptom of **TB** 











#### Sensitisation Workshops



workshops Sensitisation were organized with the support of different zonal chemist and druggist association members in Chennai. The sessions addressed basics on TB and the role that the pharmacists could play in preventing and treating TB. The training sessions also discussed the importance and use of communication materials on TB, indicated the locations of DMC & government facilities and how to refer patients. In addition, pharmacists were also trained on providing DOT for TB patients.

These training sessions were also used as an opportunity to collect feedback from the pharmacists about the initiative, as well as to gain insights and suggestions for strengthening collaboration between pharmacists and the TB program.

#### One-to-one sensitisation meetings

REACH Staff sensitised the pharmacists on a one-to-one basis by visiting them at their pharmacies and providing the communication materials on TB that they could display.

The pharmacists as well as those who managed the shops were sensitised using visual aids including flip charts.



#### Periodic follow-up visits



REACH staff visited the trained pharmacists on a regular basis to identify challenges and opportunities, and to follow up on referrals and facilitate linkages for those with TB symptoms to diagnostic facilities.

#### Community Outreach



Community meetings were conducted with the support of local pharmacists, who helped in identifying communities in their neighborhoods, focusing on the most vulnerable who lived in slums and other settlements. The aim was to raise awareness regarding the importance of TB care & control, fight stigma and rally community support for patients undergoing TB treatment.

## Sensitisation of Pharmacy College Students



To complement the training sessions for the pharmacists, REACH also sensitised students from various pharmacy colleges on their potential role in the TB response.

# Sensitisation and Refresher Training of Pharmacy Association Members



Refresher trainings were conducted on a periodic basis for pharmacists with the support of the associations, to sensitise new members and motivate them to adopt the DIRECT strategy.

#### Participation in the zonal level review meetings of Pharmacists



The pharmacy associations held regular meetings for their members at the zonal level. REACH was often invited to participate in these meetings, to share success stories, motivate others to participate and provide updates on the contribution of pharmacies to TB control.

#### Sensitisation meetings with RNTCP



Meetings were organised with the RNTCP program staff in Chennai to provide regular updates on the progress under the Pharmacy initiative. The meeting, chaired by Dr Lavanya, the District TB officer (DTO) of Chennai, was used as a platform to discuss the challenges faced and suggestions were invited to improve the partnership of pharmacists with the RNTCP program.

#### Coordination with core PPM activities

Co-ordination with core PPM activities was done to facilitate additional support services to TB patients including provision of nutritional support, support for diagnosis and treatment and screening of household contacts of TB patients.

#### REACH TB Helpline

Operational since 2010, the helpline was set up to provide timely information on TB and guide the general public. Pharmacists as well as patients they referred used the helpline .



The information printed on the envelope and the TB posters displayed at the pharmacies have also been instrumental in prompting people to access the Helpline.

# Kits for private patients taking treatment with private pharmacists developed

A paper bag containing a handkerchief, pamphlet and 'get well soon card' to carry medicines in was given to the TB patients by the pharmacists.

To encourage the practice of cough hygiene, a handkerchief was also given as part of the kit. A pamphlet containing precautions to be taken while coughing and the TB helpline was put together for this kit.

As a small gesture to motivate the patient and make them feel cared for, a 'get well soon card' was included.

Simple, easily comprehensible pictorial representations of hygienic cough practices were printed on the back side of the get well soon card.

# World TB Day observations in coordination with pharmacists

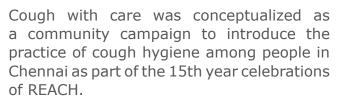






#### Cough with Care Campaign





Pharmacies were involved in this campaign and helped us reach out to many community members. Posters were displayed in several pharmacies and many people who visited the pharmacies were able to easily comprehend the messages on cough hygiene.

The campaign received positive feedback from pharmacists who stated that the posters were particularly helpful. Through the campaign, the pharmacists were able to connect with community members and help direct them towards proper treatment and care.

Medicine envelopes with illustrations on cough hygiene were also distributed to pharmacists.







#### Regular Communication with stakeholders

REACH shared information and updates regarding various activities undertaken as part of the Pharmacy initiative with a range of stakeholders at regular intervals through:

- Quarterly reports to the Central TB Division, State and District TB Officers, and State Drug Controller.
- External Newsletter of TNCDA to pharmacists highlighting their contribution towards TB care and control.
- External Newsletter of REACH to a wide audience with information about the organisation and services provided.
- Circulation of pharmacy newsletter in Tamil to over 1000 trained pharmacists.
- Presentations at various national and international conferences and meetings.





Pharmacists who were actively participating in the initiative and had adopted the DIRECT strategy were felicitated by the State TB Officer, State Drug Controller and the District TB Officer.

# Key findings

#### Referral process of symptomatics and TB patients

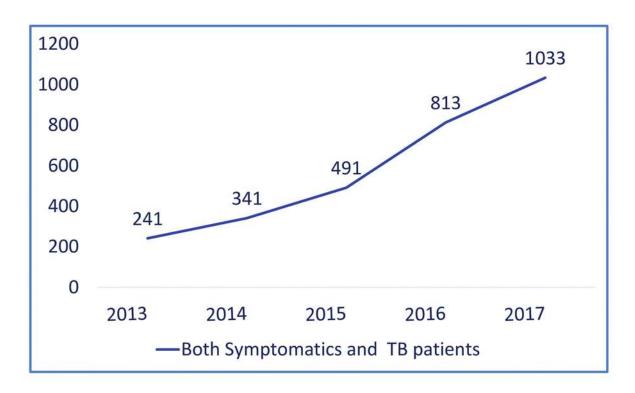
The trained pharmacists were responsible for referring those with TB symptoms to the nearest DMC or Government hospital using referral coupons. The pharmacists also maintained a record of the presumptive patient's contact information, symptoms, and the name of the center they were referred to.

After referral patients diagnosed with TB were helped in identifying the most convenient pharmacy for DOT and a designated pharmacist was made responsible for the patient throughout the period of treatment.

#### Numbers at a glance

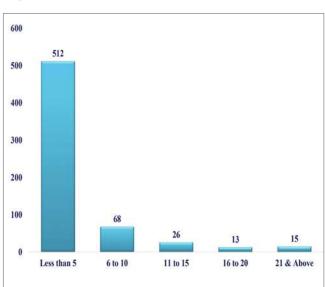
No. of trainings held for pharmacists		
No. of pharmacists trained on TB and RNTCP		
Types of communication materials developed		
No. of community meetings held		
No. of community members trained	2797	
No. of volunteers identified through community meetings	154	
No. of Pharmacy review meetings held		
No. of pharmacists participated in the review meetings	1422	
No. of workshops held for students	5	
No. of Pharmacy students Sensitized on TB	624	
No. of pharmacists who provided DOT	134	
No. of patients who received DOT from pharmacists		

#### Year-wise referrals from Pharmacies

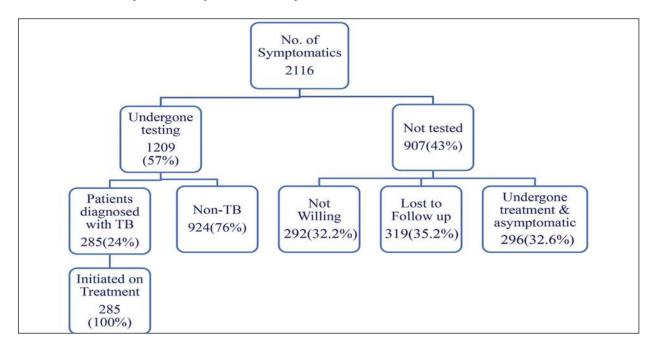


# Year-wise engagement of pharmacists

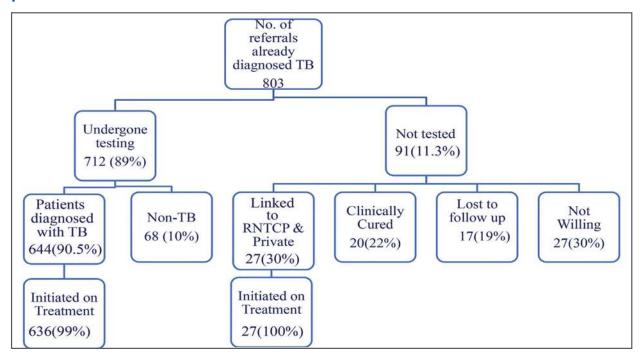
# Range of referrals by Pharmacists



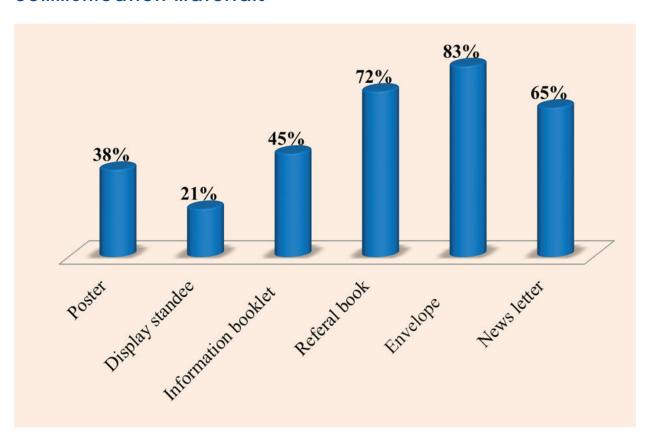
## Referral of presumptive TB patients (Jan 2013- Dec 2017)



# Referral of TB patients already diagnosed with TB in the private sector (Jan 2013- Dec 2017)



# Proportion of pharmacies using different types of communication materials







# Key Achievements

Objectives	Achievements
To establish a sustainable partnership for TB control with Private pharmacies in Chennai city	We have established close working relationships with the pharmacists and have engaged them in different components of TB control efforts such as referral of TB symptomatics and patients, spreading awareness about TB in the community, counseling and educating symptomatic / TB patients etc.  We worked in close coordination with office bearers of pharmacy association. This helped in conducting TB sensitization workshops for the pharmacists and for participation in review meetings of pharmacists.
To encourage referrals from private pharmacies of symptomatic to REACH PPM centers/ RNTCP	Pharmacies referred TB symptomatics / patients to the nearest TB care facility (both government and PPM facility managed by REACH) for diagnosis and treatment services.  Interactions with the pharmacists during the workshop and the review meetings have emphasised the fact that they have understood the importance of referring patients, especially those who cannot afford treatment.
To promote awareness on TB and DOTS through private pharmacies	Pharmacists played an important role in displaying TB related information. This helped in spreading awareness about the disease in the community. In addition information on TB symptoms was printed on envelopes for tablet dispensing.  Besides this, community meetings organised in association with the pharmacists among the vulnerable sections of population helped in highlighting these pharmacies as centers for obtaining / accessing TB related information.

To facilitate pharmacists to act as DOT providers	Pharmacists functioned as DOT providers and were engaged by the district TB officials for patients in government sector.
To increase access to RNTCP services at the community level by involving pharmacies	By involving the pharmacies in active case referral and in spreading basic information about TB and DOTS among the community, the access to RNTCP services has increased for patients.
To improve quality of DOTS in the private sector	By encouraging the pharmacists to act as DOT providers, the quality of DOTS has improved in the private sector. In addition, the pharmacists also refer patients or those with symptoms to the PPM centers.
To facilitate the participation of private pharmacies as key stakeholders	Private pharmacies are being engaged in a sustained manner and their role in TB control has been recognised.

#### Key Learnings

The following are some key learnings from the initiative:

- The best approach for engaging with pharmacies is through Pharmacy Association office bearers.
- The willingness of pharmacists to participate in the initiative without receiving any incentives was established.
- Pharmacists were able to motivate patients on private prescription to take medicines regularly and complete their treatment.
- Pharmacists who were referring TB symptomatics/patients and those who were functioning as DOT providers felt that by engaging in TB control efforts, their standing in the community improved tremendously and the bond with their clients was strengthened.
- The trained pharmacists motivated and engaged other pharmacists to join the Pharmacy initiative, which led to an increase in the number of pharmacists engaged. As a result, there was also an enhanced sense of ownership among pharmacists regarding the initiative.
- Pharmacists were willing to display posters in their shops and distribute envelopes with TB messages.
- The community meetings conducted through the initiative helped in highlighting the local pharmacies as centers for accessing TB information, which helps in sustaining TB control efforts at the community level.
- Linkages were established between pharmacists and RNTCP staff. This has resulted
  in the government TB health staff engaging directly with the pharmacists for their
  TB patients.
- The robust feedback and follow-up process for the pharmacists have resulted in better monitoring of referred TB patients and identification of gaps & challenges, thereby constantly improving on ground implementation of the program.
- Linking pharmacists directly to the RNTCP program was beneficial as patients were more comfortable taking medicines under the supervision of the pharmacists.
- By integrating the pharmacy initiative within a holistic private sector engagement model, those with TB symptoms and TB patients referred from pharmacists were provided access to TB diagnosis, examination, second opinion, treatment and nutritional support at the PPM centres.

#### Feedback from TB patients receiving treatment from pharmacists

"Pharmacists respect TB patients"

"Pharmacists don't disclose the TB status to anyone and maintain confidentiality"

"Pharmacists ensure intake of medicines under their supervision."

"Choosing pharmacists as DOT providers helped reduce travel expenses due to their proximity."

#### **In their words - Pharmacy Association Office bearers**

"This initiative reaches out to the poor TB patients and ensures availability of TB care services. It is also useful for controlling Tuberculosis and we the Pharmacists are happy and proud to be involved as it provides us immense satisfaction".

#### - Mr. P.Trilok Chander,

Treasurer, Chemists and Druggists Association, Chennai

"As pharmacists, we are able to reach out and serve the community. We participate by making our customers more aware about TB and the TB care services. By reducing their fear of TB we are able to motivate and encourage them undergo appropriate tests and seek proper treatment. It gives us an opportunity to be in touch with the patients and thus play an important role in TB control. On their path of recovery, we also get their blessings, which give us more satisfaction and joy".

#### - Mr.M.Balasubramaniam,

Chairman, Retailer Wing, Chemists and Druggists Association, Chennai

#### In their words - Pharmacists

"I knew about Tuberculosis only after the trainings held under the pharmacy initiative. I learnt that I could support the TB control program in my area. I am able to counsel the patients to adhere to the treatment and complete it."

#### - Mr.V.Vijayakumar,

Pharmacist, Star Medicals, Chennai

"I feel very happy when patients buy medicine from my shop, but it makes me doubly happy when I am able to give medicines without charging for them. Being a DOT provider for 3 patients, enables me to do just that - give medicines free of cost. An opportunity for me to do a service and I feel very motivated. I would like to share my experience with others in the association meetings."

#### Mr.S.Mani,

Pharmacist, Sri Lakshmi Pharmacy, Thiruvotriyuir, Chennai

#### In their words - TB Survivors

"I live with my daughter in Senji and work as a barber. Once, I was visiting my son's house and he noticed that I had been coughing for quite some time. He took me to Shafi Pharmacy to buy tablets. The pharmacist explained about TB and referred us to PPM-Sugam Hospital for testing. When the result came, I was found to have TB. The field staff gave a letter to the concerned staff in my area to give treatment for me. When I took the referral slip and letter I was immediately started on treatment for TB".

#### - TB survivor

"I did not know what to do when I was sick. I had to also care of my little baby and family. I did not have much time to access a government hospital and so used to buy drugs from the pharmacist for my cough. I was told about the initiative by my pharmacist and he referred me to the PPM hospital of REACH. I was diagnosed with lymph node TB and started on treatment. The advantage for me has been that I did not have to spend much time, treatment was free and I could take treatment with confidentiality. At present I am in the last month of treatment. Thanks to my pharmacist, who guided me towards care"

#### - TB survivor

#### Key Challenges

**Filling up of the referral slips** - The pharmacists were not able to fill up all patient details in the referral slips due to lack of time. This made follow-up of symptomatics difficult.

**Inaccessibility of diagnostic facilities for patients** - When those with TB symptoms were referred to Designated Microscopy Centres, they were also referred for X-ray to another public health centre (usually tertiary centres and Medical College Hospital), which were usually crowded and had a considerable waiting time. This often meant that those who were unable to wait had to travel to different facilities and chose not to go for diagnosis. Pharmacists have recommended that all services be provided under one roof.

**Reasons for non- referral** included unwillingness of the patients to take treatment in the government sector, a perceived loss of confidentiality in the private sector and encouragement by doctors/private providers to buy medicines privately.

**Involving hospital based Pharmacies** was challenging because of their administrative setup.

**Percolation of information** from trained pharmacists to other full/ part time staff at the pharmacy stores were limited.

#### **Opportunities for scale-up of pharmacy engagement**

Encouraged by the success of this model of pharmacy engagement, REACH now plans to replicate this at various levels:

**City level:** The pharmacy engagement will continue across Chennai under Nakshatra - private health sector response to end TB which is part of the TB-free Chennai initiative.

**State Level:** Pharmacy sensitization and engagement was rolled out in Project Axshya districts in Tamil Nadu.

#### **National Level through the TB Call to Action Project:**

Through the TB Call to Action Project supported by USAID, REACH has introduced the pharmacy model in four states – Bihar, Odisha, Jharkhand and Assam. This is being initiated as a collaboration between REACH, State TB Cell, Drug Controller's Office and Pharmacy Associations, with clear roles and responsibilities for each stakeholder. Pilot districts have been chosen in each state (9 in Bihar, 3 each in Assam and Jharkhand and 5 in Odisha). There is commitment from the State TB Cell to expand to all districts in a phased manner, based on results from pilot districts.

### Conclusion

Through this initiative, REACH has shown that it is possible to successfully engage pharmacists in the TB control program.

Traditionally, pharmacists' contributions have been restricted to their role as 'drug-dispensers' and to provide physician-prescribed treatment to notified TB patients. In reality, pharmacists can contribute to TB care and control in several ways. However, their capacity to facilitate TB case detection, or to comprehensively support patients receiving treatment, has remained untapped.

As part of the Public Private Mix (PPM) for TB care and prevention, it is imperative that pharmacists are sensitized towards the need for TB prevention and management, with specific guidance on symptom screening, appropriate referral, and treatment support.

Pharmacists play a pivotal role in improving the awareness about TB and its symptoms in the community. They also help in directing those with symptoms and TB patients to appropriate TB care services for diagnosis and treatment in a timely manner, thereby improving access to free and quality diagnostic and treatment services. Through the pharmacists, REACH could also access TB patients on private treatment, counsel and motivate them to complete treatment.

By displaying a supportive and sensitive attitude (in terms of maintaining patient confidentiality regarding the TB status) and providing accessible and convenient TB treatment to their clients, pharmacists have been able to build and improve their relationships within their communities.