

NEW DELHI TUBERCULOSIS CENTRE

ANNUAL REPORT

2020 - 2021

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डॉ. मनसुख मंडाविया
DR. MANSUKH MANDAVIYA
माननीय केंद्रीय मंत्री
Hon'ble Union Minister
स्वास्थ्य और परिवार कल्याण मंत्रालय
Ministry of Health & Family Welfare



डॉ. भारती प्रवीण पवार
DR. BHARATI PRAVIN PAWAR
माननीय राज्य मंत्री
HON'BLE MINISTER OF STATE
स्वास्थ्य और परिवार कल्याण मंत्रालय
Ministry of Health & Family Welfare

Message from Chairman

New Delhi Tuberculosis Centre since its inception in 1940 has a magnificent journey and growth to achieve its present stature. Today it holds a place of pride amongst the National level institutes serving the patients with TB and other respiratory diseases. It is a matter of immense pleasure and satisfaction for me to be associated with this institution.

During Covid-19 pandemic, the laboratory of the Centre was designated as ICMR approved Covid-19 testing laboratory. The Laboratory provided the facility of Covid-19 testing on CBNAAT and TrueNat machines for patients referred from designated Delhi Government dispensaries. The faculty of laboratory also provided training to microbiologists and technicians of both public and private sector laboratories. In addition, supervision and monitoring of assigned laboratories was also conducted by its faculty in close association with Delhi government Coordinators.



Dr. L.S. Chauhan

In recognition of its expertise in the areas of TB research, training and programme implementation, it has been designated as State TB Training and Demonstration (STDC) center and Intermediate Reference Laboratory (IRL) under NTEP for the state of Delhi to monitor NTEP activities and designated microscopic centers of Delhi state.

The institute is providing necessary support to State TB Cell in enhancing the notification of TB cases in Delhi by public as well as private health facilities. It is actively participating as a state partner in Active Case Finding (ACF), a strategic national activity under NTEP.

I extend my heartiest congratulations and wish that the institute expands, diversifies and flourishes more and more to impart quality health services to TB patients. I am grateful to Ministry of Health & Family Welfare, Government of India, Central TB Division and Government of Delhi for extending their support to the Institute. I express my heartiest gratitude and appreciation to the learned faculty, technical staff and employees for their constant cooperation and efforts towards building this center as a National level Institute.

Dr. L.S. Chauhan
Chairman

From Director's Desk



The New Delhi TB Centre has completed 81 years of its glorious journey in the field of TB control activities. The Centre is not only providing patient care for TB and respiratory diseases cases, but also contributing in TB elimination activities in form of laboratory support of rapid diagnostics, research; both basic and operational in TB control activities and providing monitoring and supervising support in implementing NTEP services in Delhi State.

During the Covid-19 pandemic in the current year, the Centre also provided training and supervising support for Covid-19 diagnosis both in public and private sector in Delhi State. As TB patients could not attend DOT Centre, the Centre provided adherence support to patient by providing telephonic consultation and anti TB drugs to patients belonging to any part of India. This year a total of 5535 patients attended the OPD of the Centre and total 18565 patients availed the facility of laboratory services.

Clinical section is providing diagnostic and treatment services for TB and respiratory diseases patients referred from all parts of Delhi and surrounding states. This year a new

digital X-ray machine has been added in the section which will help in providing radiological support to OPD as well as active case finding cases.

Laboratory of the Centre is equipped with all diagnostic facilities starting from microscopy to whole genome sequencing. This year more than 52,000 tests were done in the laboratory. In addition, laboratory facility is being used for teaching and training of medical and paramedical staff. A number of research projects are being conducted. This year laboratory also added the testing for Covid-19. The laboratory not only provided diagnostic facility for Covid-19 cases, but also trained microbiologists and laboratory technician of both public and private sector laboratories to set up Covid-19 diagnostic facility. Faculty of our laboratory also supervised their functioning. Efforts are in to renovate the laboratory so as to cope up with the increasing workload.

Training section of the Centre trained 3520 personnel during the year. ECHO platform is also being used for training and programme review purposes. Efforts are on to make use of e-module and frequent use of ECHO platform so as to reduce the time and POL expenses for personally attending the training and review sessions. Due to Covid-19 pandemic, most of training sessions were held on virtual mode.

The faculty of the Centre is actively involved in conducting research activities in clinical, bacteriological and programme related aspects. During the year, 21 papers were published in journals and 2 were communicated for the publication.

I am grateful to the Ministry of Health & Family Welfare and Central TB Division for the financial support. I am grateful to all the members of Managing Committee and State TB Control Officer Delhi State for their valuable help and cooperation for strengthening the infrastructure at New Delhi Tuberculosis Centre. I am also grateful to the TB Association of India since its inception for helping and guiding in improving activities of the Centre.

Dr. K. K. Chopra
Director

Important Landmarks in History of NDTB Centre

- Established in 1940 as a model TB clinic by an agreement between TB Association of India and Government of India. Since its inception, the Government of India is providing grant in aid to the Centre for smooth functioning.
- In 1951, it was upgraded as the first TB Demonstration cum Training Centre of the country.
- In 1966, the Centre became a referral institute for tuberculosis patients.
- The Centre was part of 1955-58 ICMR project to estimate the prevalence of TB in community.
- The Centre was responsible for pioneering the concept of Organized Home Treatment (OHT) which was later on incorporated in National TB Programme (NTP) as domiciliary treatment for TB.
- Eight longitudinal disease prevalence surveys in domiciliary area of the Centre conducted over a period of 30 years during 1962-92 which gave deep insights into natural history of TB in the community and its trends, providing vital information for TB control Programme planning at the national level.
- In 1966, NDTBC became a referral centre for TB patients from five northern states in the country.
- Part of multi-centric Short Course Chemotherapy (SCC) trials during 80s leading upto the formal adoption of SCC under the national programme.
- Prevalence of initial and acquired drug resistance in Delhi and north India during 1992 feeding into strategies for treatment of Drug Resistant TB (DR-TB).

- In 1998, NDTBC started implementation of DOTS strategy of RNTCP in 4 lakh population with establishment of four DOTS cum Microscopic Centres under its ambit.
- In 2005, it was upgraded to State TB Training and Demonstration Centre with added responsibilities besides continuing to function as a referral clinic for TB and Respiratory Diseases, training the entire staff in Delhi and to provide diagnostic services as mandated for an Intermediate Reference Laboratory, which became a Biosafety level-3 facility in 2008 when MGIT was added for early diagnosis of MDR cases. This IRL was certified by Central TB Division for First line Line Probe Assay (LPA) in 2013 and for second line LPA in 2014. Further, Gene sequencer has been added in 2018. The laboratory got NABL accreditation in 2018.
- The laboratory of NDTBC has recently been equipped with Illumina MiSeq bench top sequencer system and is being developed as one of the five Whole Genome Sequencing facilities under NTEP.
- In 2020, during pandemic COVID 19 testing and training of microbiologists and technicians of government and private laboratories was started.
- The Centre has been actively involved in monitoring of NTEP activities.
- It has produced landmark research publications impacting TB control policies at the national level.

MANAGING COMMITTEE

Vice- Chairman Tuberculosis Association of India	Chairman
Vice Chairman (Research and Publication) Tuberculosis Association of India,	Financial Adviser
The Additional Secretary & FA Ministry of Health & Family welfare, Govt. of India	Member
The Joint Secretary (Health) Ministry of Health & Family Welfare, Govt. of India	Member
The Deputy Director General (TB) Ministry of Health & Family Welfare, Govt. of India	Member
The Director National Institute of TB & Respiratory Diseases, New Delhi	Member
The Director VP Chest Institute, New Delhi	Member
The Director of Health Services Delhi Administration	Member
The Director Medical Services New Delhi Municipal Committee	Member
The Honorary General Secretary Delhi Tuberculosis Association	Member
The Secretary General Tuberculosis Association of India	Member
The Director H&F Welfare Directorate of Health Ministry of Railway	Member
The Director New Delhi TB Centre	Member Secretary

SCIENTIFIC ADVISORY COMMITTEE

Dr. L.S.Chauhan Chairman New Delhi Tuberculosis Centre	Chairman
Dr. Ashwani Khanna State TB Officer Delhi State	Member
Dr. Raj Kumar Director V P Chest Institute	Member
Dr. Varinder Singh Professor – Pediatric, Kalawati Hospital Lady Harding Medical College	Member
Dr. M. Hanif K.M. Bacteriologist New Delhi Tuberculosis Centre	Member
Dr. Nishi Aggarwal Statistician New Delhi Tuberculosis Centre	Member
Dr. K.K. Chopra Director New Delhi Tuberculosis Centre	Member Secretary

ETHICAL COMMITTEE

Prof. Nandini Sharma Director Prof. and Head Community Medicine Department Maulana Azad Medical College	Chairman
Dr. Vishal Khanna Chest Physician and District TB Officer Lok Nayak Hospital	Member
Dr. C.P. Baveja Professor Maulana Azad Medical College	Member
Dr. M. Hanif, K.M Bacteriologist New Delhi Tuberculosis Centre	Member
Dr. Rajesh Kumar Prof. Community Medicine Department Maulana Azad Medical College	Member
Shri Tajinder Ahluwalia Secretary General Tuberculosis Association of India	Member
Mr. Santosh Srivastava Advocate	Member
Dr. Nishi Aggarwal Statistician New Delhi Tuberculosis Centre	Member
Sh. Sree Kumar Pillai Delhi TB Association	Member
Sh. Ved Prakash Community Person	Member
Dr. Shanker Matta Epidemiologist New Delhi Tuberculosis Centre	Member Secretary

SENIOR STAFF MEMBERS

Dr. K.K. Chopra M.B.B.S., M.D., D.T.C.E	Director
Dr. Sanjay Rajpal M.B.B.S., D.T.C.D., F.N.C.C.P.	Chest Physician
Dr. Mahmud Hanif Ph.D	Bacteriologist
Dr. Nishi Aggarwal Ph.D	Statistician
Dr. Shanker Matta M.B.B.S., M.D	Epidemiologist
Dr. Shivani Pawar M.B.B.S., D.T.C.D.	Medical Officer
Mr. S.K. Saini B.Com, AICWA	Administrative Officer

Abbreviations

ACF	Active Case Finding
ATT	Anti-tubercular Treatment
CB-NAAT	Cartridge-based Nucleic Acid Amplification Test
CDST	Culture and Drug Sensitivity Testing
CME	Continuing Medical Education
CTD	Central Tuberculosis Division
DBT	Direct Benefit Transfer
DMC	Designated Microscopy Center
DOT	Directly Observed Therapy
DOTS	Directly Observed Therapy Short-course
DR-TB	Drug Resistant Tuberculosis
DST	Drug Susceptibility Testing
DS-TB	Drug-Sensitive Tuberculosis
DTC	District Tuberculosis Center
DTO	District Tuberculosis Officer
ECHO	Extension for Community Health Outcomes
EPTB	Extra-pulmonary Tuberculosis
EQA	External Quality Assurance
ICF	Intensified Case Finding
ICMR	Indian Council of Medical Research
ICT	Information and Communication Technologies
ICTC	Integrated Counseling and Testing Center
IEC	Information, Education, and Communication
IRL	Intermediate Reference Laboratory
LIMS	Laboratory Information Management System
LPA	Line-probe Assay for detection of drug resistance
LTBI	Latent Tuberculosis Infection
MDR	Multidrug Resistance

MDR-TB	Multidrug Resistant Tuberculosis
MoHFW	Ministry of Health and Family Welfare
MOTC	Medical Officer Tuberculosis Centre
NGO	Non-governmental Organization
NGS	Next-Generation Sequencing
NIKSHAY	Web-enabled electronic TB case notification/monitoring system
NPY	NIKSHAY Poshan Yojana (nutritional support to TB patients)
NRL	National Reference Laboratory
NSP	National Strategic Plan
NTEP	National Tuberculosis Elimination Program
OR	Operational Research
OSE	On-Site Evaluation
PLHIV	People Living with HIV/AIDS
PMDT	Programmatic Management of Drug Resistant Tuberculosis
PPM	Public-Private Mix
RBRC	Random Blinded Re-checking
SL-DST	Second-line Drug Susceptibility Testing
STC	State Tuberculosis Cell
STCI	Standards for Tuberculosis Care in India
STDC	State Tuberculosis Training and Demonstration Center
STLS	State Tuberculosis Laboratory Supervisor
STO	State Tuberculosis Officer
STS	Senior Treatment Supervisor
TBHV	Tuberculosis Health Visitor
TOG	Technical and Operational Guidelines
True Nat MTB	Chip-based nucleic acid amplification test to detect <i>M. tuberculosis</i>
True Nat MTB-RIF Dx	Chip based nucleic acid amplification test to detect Rifampicin resistant <i>M. tuberculosis</i>
UDST	Universal Drug Susceptibility Tests
XDR-TB	Extensively Drug Resistant Tuberculosis

RESEARCH AND PUBLICATIONS

(A) Research papers published

During the year 2020-21, the following research papers have been published or submitted for publication by faculty of the Centre in national and international journals.

1. **COVID – 19 and Tuberculosis : A mathematical model based forecasting in Delhi India.** Article published in *Indian JI of Tuberculosis*, 2020, Vol. 67 : 49-51
2. **Trend and treatment outcomes of multi drug – resistant tuberculosis in Delhi, India (2009-14) : A retrospective record based study.** Article published in *Indian JI of Medical Research*, 2020, Vol 151
3. **COVID -19 and Tuberculosis.** An editorial published in *Indian JI of Tuberculosis*, 2020, Vol. 67 : 149-151
4. **Awareness and perspectives on expansion of latent TB management among public sector physicians and medical trainees in Delhi, India.** Paper published in *Indian JI of Tuberculosis*, 2020, Vol 67 : 208-212
5. **Covid-19 and social stigma: Role of scientific community.** Paper published in *Indian JI of Tuberculosis*, 2020, Vol 67 : 284- 285
6. **A comparison of patient treatment pathways among multidrug resistant and drug sensitive TB cases in Delhi, India : A cross sectional study.** Original article published in *Indian JI of tuberculosis*, 2020, Vol. 67: 502-508.
7. **Tuberculosis – Newer Diagnostic Tests : Applications and Limitations.** Paper published in *Indian JI of Tuberculosis*, 2020, Vol. 67, Special issue.
8. **Laboratory diagnosis of Novel Corona virus (2019-20, Cov) Present and future.** Paper published in *Indian JI of Tuberculosis*, 2020, Vol. 67, Special issue.
9. **Advances in diagnosis of tuberculosis : Journey from smear microscopy to whole genome sequencing.** Paper published in *Indian JI of Tuberculosis*, 2020, Vol. 67, Special issue.
10. **Disposable Covid Box – A new invention.** Article published in *Indian JI of Tuberculosis* 2020, Vol. 68, Special issue.
11. **Lessons to be learnt from 100 year old 1918 influenza pandemic viza viz 2019 Xoroa pandemic with an eye on NTEP.** Article published in *Indian JI of Tuberculosis*, 2020, Vol. 67, Special issue.
12. **NATCON virtual 2020 –Challenges and way ahead.** Editorial published in *Indian JI of Tuberculosis*, 2021 vol 68, 1-2
13. **Morbidity and mortality trends of Covid – 19 in top 10 countries.** Article published in

Indian JI of Tuberculosis, 2020, Vol. 67, Special issue.

14. **Upfront Xpert MTB/RIF for diagnosis of pediatric TB – Does it work, experience from India.** Article published in *Plos one*, 2020.
15. **Benefits and limitations of serological assays in COVID – 19 infection.** Published online in *Indian JI of Tuberculosis* . <http://doi.org/10.1016/ijtb.2020.07.034>
16. **Transbronchial lung cryobiopsy by twin bronchoscopes (kissing technique).** Article published in *Indian JI of Tuberculosis*, 2021, Vol 68 : 16-19
17. **Conference update: NATCON 2020-highlights.** Article published in *Indian JI of Tuberculosis*, 2021 Vol 68 : 152-153
18. **Radiology quiz- dancing ball.** A case report published in *Indian JI of Tuberculosis*, 2021, Vol 68 :157-159
19. **Predictors of success and failure of non invasive ventilation use in Type – 2 respiratory failure.** Paper published in *Indian JI of Tuberculosis*, 2021, Vol 68.
20. **White paper on challenges and opportunities for TB elimination with focus on COVID and post COVID era : Developed through scientific round table resolution at NATCON 2020.** Letter to editor published in *Indian JI of Tuberculosis*, 2021, Vol 68 : 134-138.
21. **Adherence to isoniazid preventive therapy among children living with tuberculosis patients in Delhi, India – An exploratory prospective study.** Paper accepted for publication to *Indian JI. of Tuberculosis*.
22. **Covid- 19 vaccine and new mutant strains impacting the Covid pandemic.** Editorial submitted for publication in *Indian JI of Tuberculosis*.
23. **Genetic footprints of extra genital tuberculosis in infertile women: Comparisons of various diagnostic modalities.** Paper submitted for publication to *Indian JI of Tuberculosis*.

(B) Research Projects

1. **Active Case Finding Campaign of Tuberculosis among People Who use Intravenous Drugs in New Delhi.**

Active case finding campaign was an activity propagated by the programme. This was a house to house survey for finding TB cases among people who use intravenous drugs. The objective of the study were (a) Early identification of presumptive TB cases (b) Early diagnosis (c) Treatment preparedness (d) Linking of diagnosed cases to treatment and care. Targeted population was persons who Inject drugs in the area of Delhi of Yamuna Bazaar and Hanuman Mandir in Connaught Place of New Delhi. After sensitization of field teams, active case find was started in both fields area with the help of New Delhi Municipal Corporation (NDMC) and Pilli Kothi Chest Clinic. A total of 1716 persons were sensitized. Based on 4's symptoms criteria, 256 identified symptomatic were investigated. 30 patients detected with TB and were put on treatment and 12 were under observation. The final project report is submitted to State TB Cell.



MDR patient being counselled at home



MDR patient being counselled at DRTB Centre

2. Effect of counseling intervention on outcome among MDR – TB Patients in Delhi.

It is an interventional study. MDR-TB has a high LTFU (Left to follow up) rate and counseling support could be an intervention to reverse it. A professional trained counselor was recruited for this purpose. The objectives were to assess the effect of the counseling intervention by :

- a. Treatment adherence among DR TB patients.
- b. Loss to follow up among DR TB patients.
- c. To provide psycho social support to DR TB patients and their family members.
- d. Early detection of TB among households of patients.
- e. Linking the patient with existing social support services.

106 MDR cases have been included in the study. The study is complete. Report is prepared and submitted to State TB Cell.

3. Mapping of Anti-Mycobacterial Drug Resistant Hotspots under National Tuberculosis Elimination Programme (NTEP) in Delhi State.

The study is being conducted by NDTB Centre and TB Association of India, funded by Delhi state OR Committee. Study is to map out hotspots of Drug Resistant TB cases in Delhi State so as to provide adequate diagnostic and therapeutic services in the selected areas. A trial run was done with help of GIS Agency among 20 MDR cases detected in Central Delhi area. Based on the results, the study has been expanded to entire Delhi. The study analysis is in process.

4. BEAT (Building Evidence for Advance Treatment Against Tuberculosis) study:

Laboratory is actively taking part in BEAT (Building evidence for advance treatment against tuberculosis) research project entitled “To Evaluate the Efficacy and Safety of a Combination regimen of Bedaquiline, Delamanid, Linezolid and Clofazimine in Adults with Pre-extensive (Pre-XDR) and Extensively Drug-resistant Pulmonary Tuberculosis (XDR-TB)”. This is a prospective Cohort Study being conducted in collaboration with RBIPMT and NIRTD with following objectives:

- a. To evaluate the safety and tolerability of a treatment regimen of 24 – 36 weeks (6-9 months) duration consisting of BDQ, DLM, LZD and CFZ in patients with pre-XDR or XDR-TB.
- b. To determine the time to sputum culture conversion with this combination treatment regimen.
- c. To determine the steady state C-min levels of DLM, BDQ and their metabolites at weeks 2, 8 and 16
- d. To explore the steady state pharmacokinetics (PK) of BDQ and DLM in a subgroup of pre-XDR and XDR-TB patients on the combination treatment regimen (intense PK) Study is in progress and is expected to be completed on time.

5. Standard Treatment Regimen of Anti-tuberculosis drugs for patients with MDR- TB (STREAM) study:

Laboratory of this centre is a part of a clinical trial entitled STREAM. This clinical trial is in collaboration with the International Union Against Tuberculosis and Lung Disease or The Union and Institute of Tropical medicine (ITM), Belgium. Patient enrolment, treatment, follow-up and data base management is being done at RBIPMT and laboratory support is being provided by this site. Objective of this study is to assess the proportion of participants with a favourable efficacy outcome at week 76 on regimen consisting of Bedaquiline, clofazimine, Ethambutol, Levofloxacin and Pyrazinamide given for 40 weeks supplemented by isoniazid and prothionamide for the first 16 weeks (intensive phase). Presently trial is in progress.

6. National TB Prevalence Survey:

The Central TB Division (CTD), Government of India in collaboration with Indian Council of Medical Research (ICMR), New Delhi, National Institute for Research in Tuberculosis, Chennai (NIRT) and World Health Organization (WHO), India is conducting a National TB Prevalence Survey in India. NIRT Chennai is has been identified as a Nodal and coordinating centre. This national level survey has objective of estimating the point prevalence of pulmonary tuberculosis in India. For this purpose CTD has selected many IRLs and NRLs including our laboratory to participate in the survey and to provide diagnostic facilities. Laboratory received samples from selected clusters and has processed them for culture and drug susceptibility testing. The field work in Delhi State is complete.

7. Utility of Stool Cartridge Based Nucleic Acid Amplification Test in Diagnosis of Pulmonary Tuberculosis in Children

This study is being conducted at New Delhi TB Centre in collaboration with LN Hospital. All pediatric age group patients attending Chest clinic, Lok Nayak hospital are being evaluated for pulmonary TB in Department of Pediatrics and screened for enrolment. A detailed history and clinical examination will be done among enrolled cases and routine TB workup including CXR and Mantoux test will be done. Gastric aspirate sample (5ml) as well as a Stool sample (5g) will be obtained from these cases. The sample will be processed at the NDTB Centre as per the current operational guidelines. Mycobacterial Growth Indicator tube cultures will be put up from both samples. After the testing process, the data collected will be entered in Microsoft Excel Sheet and analysed. The categorical variables such as Stool CBNAAT and Gastric Aspirate CBNAAT positives will be expressed as proportions.

8. TB prevalence and interventions for reducing TB and LTBI in high risk key population of rickshaw drivers and construction workers.

The study will generate evidence to positively influence the national policy for providing TB preventive therapy to rickshaw drivers & construction workers in addition to PLHIV and children. Detecting and treating LTBI among rickshaw drivers & construction workers will have a long

term gain in bringing down the annual notification of incident TB by preventing development of new LTBI infections, reduced annual risk for TB infection (ARTI) and curtailing TB transmission. This is a ICMR funded project.

9. Improving TB diagnosis at Designated Microscopic Centres by introduction of Quality Management System (QMS) and optimum utilization of rapid molecular diagnostics and its cost implications.

Introduction of QMS at DMCs leads to improvement in the quality of TB testing by rapid molecular diagnostics. QMS provides an effective mechanism for health system improvement yielding long-term benefits in the quality, cost-effectiveness, and sustainability of public health programs. We establish models of laboratory-driven quality systems at DMCs that lead to overall improvements in TB diagnosis by rapid molecular diagnostics as it focuses attention on areas of greatest need and accelerating improvement in areas such as staff competency, supply chain, instrument maintenance etc. This is an ICMR funded project.

10. Non-tuberculous mycobacterial (NTM) disease study:

Reference laboratory of this Centre is involved in a study entitled “Prevalence, risk factors and laboratory diagnosis of non- tuberculous mycobacterial (NTM) disease: a multicentre study”. This is a multicentric study involving six different sites in the country and is being funded by Indian Counsel of Medical Research (ICMR), New Delhi. Study is in progress and has following objectives:

1. To determine the prevalence of NTM disease among TB suspects in Delhi, Chandigarh, Wardha and Tirupati regions
2. To study various risk factors of NTM disease
3. To characterize species and sub species of confirmed NTM isolates
4. To perform drug susceptibility testing (DST) of speciated NTM isolates
5. Clinical, microbiological and radiological follow-up of the confirmed NTM disease patients
6. To do cost-effective analysis of various lab techniques used for the diagnosis of NTM disease

Research Papers presented / submitted in Virtual Union Conference 2020

1. TB care in prisons of New Delhi.

E-Poster presented in the Union World Lung conference.

2. Experience describing co-creation of an assessment framework for implementation of a virtual learning platform: Tuberculosis Extension for Community Healthcare outcomes (TB ECHO) implementation in India.

Poster presented in the Conference.

3. **Active Case Finding Campaign of Tuberculin with people who inject drugs in New Delhi.**

Poster submitted for presentation in the conference.

MD/MS/DNB Theses is being conducted in collaboration with Medical Colleges

1. **Evaluation of TrueNat with CBNAAT for detection of Tubercular Meningitis in children and adolescents.**

- All the pediatric patients presented in the Lok Nayak Hospital, New Delhi will be evaluated for Tubercular Meningitis (TBM) in Department of Pediatrics and will be screened for enrollment.
- After obtaining informed consent, a detailed history, clinical examination and routine TBM workup will be done.
- CSF sample will be obtained aseptically. Half of this sample will be used for cytology and biochemistry.
- Remaining samples will be processed at NDTB Centre for diagnosis of M. tuberculosis through TrueNat and CBNAAT as per the standard protocol.
- Data collected will be entered in MS Excel and analyzed using SPSS 25.0 software. Categorical variables such as M. Tb positives will be expressed as proportions. Chi square test will be used to assess the association between TrueNat and CBNAAT.

2. **Isoniazid resistance in Rifampicin sensitive pulmonary tuberculosis in children and adolescents.**

- Patients will be screened for enrollment from Outpatient and Inpatient Department of Pediatrics, MAMC and Chest Clinic, LNJP Hospital, New Delhi.
- Sputum/ Gastric aspirate sample will be obtained from all the patients with suspected pulmonary tuberculosis.
- One part of the sample will be subjected to CBNAAT for detection of tuberculosis. M. tuberculosis positive and Rifampicin sensitive will be enrolled in the study and written informed consent will be obtained.
- Detailed history and clinical examination of enrolled cases will be obtained.
- Second part of the sample will be processed at NDTB Centre for growth of M. tuberculosis by Mycobacterial Growth Indicator Tube (MGIT) culture as per standard guidelines.
- Drug Susceptibility Testing (DST) for Isoniazid, Ethambutol and Pyrazinamide will be done by following standard procedure.
- Culture positive isolates will be subjected to DST by genotypic (Line Probe Assay) and phenotypic methods for detection of resistance to Isoniazid.

- 3. To study the effectiveness of Fluorescein Diacetate (FDA) vital staining in comparison to culture in follow up of first six months of treatment in multidrug resistant, pre-extremely drug resistant and extremely drug resistant pulmonary tuberculosis patients on longer regimen under National Tuberculosis Elimination Program.**
- Newly diagnosed drug resistant pulmonary tuberculosis patients reporting to Kingsway Chest Centre Outpatient Department and Inpatient Department of Rajan Babu Institute of Pulmonary Medicine and Tuberculosis (RBIPMT) and registered under NTEP will be taken up in the study.
 - Written informed consent will be obtained from all the enrolled cases. Detailed history, clinical examinations, etc, will be done.
 - Two sputum samples will be collected for FDA vital staining and culture on 3rd, 4th, 5th and 6th after starting treatment to NDTB Centre.
 - Statistical analysis to find the sensitivity and specificity of FDA vital staining will be done.
- 4. Role of cartridge based nucleic acid amplification test (CBNAAT) in the rapid diagnosis of cutaneous tuberculosis and detection of rifampicin resistance.**
- Patients presented in the Dermatology Department of Lok Nayak hospital were evaluated for cutaneous tuberculosis and screened for enrollment. Written informed consent was obtained from all the enrolled cases. Detailed history, clinical examinations, etc, were done.
 - Adequate quantity of sample (at least 0.5 ml in case of discharge and 3 mm minimum diameter for tissue sample) were taken in a sterile container in saline and transported at room temperature to the NDTB Centre.
 - Samples were processed as per standard protocols for Acid Fast Staining, culture (Mycobacterium Growth Indicator Tube) and drug sensitivity testing.
 - Study is ongoing.
- 5. Utility of stool Cartridge Based Nucleic Acid Amplification Test (CBNAAT) in diagnosis of pulmonary tuberculosis in children.**
- Patients presented to the Chest clinic, Lok Nayak hospital were evaluated for pulmonary TB in Department of Pediatrics and screened for enrollment. Written informed consent was obtained from all the enrolled cases. Detailed history, clinical examinations, routine TB workup including chest X-Ray and Mantoux were done.
 - Samples namely Gastric aspirate (5ml) and Stool sample (5g) were obtained from each enrolled cases. Samples were processed CBNAAT at the NDTB Centre as per the current operational guidelines. MGIT cultures were also performed for both the samples.
 - Study has now been completed with good outcome.

6. Urogenital tuberculosis in married females with recurrent urinary tract infection.

- Patients presented to the Gynecology clinic of Lok Nayak hospital were evaluated for urogenital TB in screened for enrollment. Written informed consent was obtained from all the enrolled cases. Detailed history, clinical examinations, etc were done.
- Patients were counselled to give three consecutive early morning samples which were processed in the laboratory on the same day. Endometrial biopsy samples were also collected in premenstrual phase from married female patients in normal saline.
- Samples were processed for Acid Fast Staining, culture (Lowenstein-Jensen medium and Mycobacterium Growth Indicator Tube). Drug sensitivity testing were also performed on *M tuberculosis* positive isolates.
- Study has now been completed.

Achievements of NDTB Centre in recent years

1. NABL accreditation of NDTB Centre Laboratory

Microbacterial laboratory of the Centre is functioning as Intermediate Reference Laboratory for Delhi State providing diagnostic services with all available rapid diagnostics to patients referred from NTEP as well as from private sector. To ensure quality services, the laboratory has been accredited with NABL.

2. Gene Sequencing facility in Laboratory

Our laboratory is one of the five sites where whole Gene Sequencing facility is available under NTEP. This will be used for diagnosis as well as drug resistance surveillance purpose as per TB programme guidelines

3. Installation of Digital X-ray Machine in Clinical Section

A digital X-ray machine has been installed in Clinical Section in addition to already existing conventional X-ray machine. The machine has been provided from Delhi State NTEP funding and is being used for patients in Clinical Section as well as Active Case Finding cases and surveillance purpose.

4. COVID 19 Laboratory

During Covid-19 Pandemic, our laboratory was one of the ICMR approved sites for diagnosis of Covid-19 on CBNAAT and True Nat machines. Suspects from Delhi Government designated sites are referred to our laboratory for testing.

5. Training of Microbiologists and Laboratory Technicians in Covid–19 diagnosis.

Delhi Government designated our laboratory as training Centre for microbiologists and laboratory technicians both from public and private sector proposed to be Covid-19 laboratories. Microbiologists of our laboratory are part of the Delhi State CBNAAT and True Nat Core Committee involved in supervising and monitoring the activities of Covid-19 testing laboratories in public and private sector.

6. Active TB Case finding among vulnerable groups

In recent years, a number of operational researches have been conducted in vulnerable population like jail inmates, female sex workers, intervenuous drug users, slum dwellers and night shelters. These operational studies have been approved and financed by Delhi State NTEP. Active TB case finding have been conducted as per national guidelines.

7. ECHO clinics for paramedical staff

NDTB Centre is STDC- Delhi State hub for ECHO platform with all chest clinics as spokes. In every first Wednesday of the month, a session is conducted for paramedical staff of NTEP Delhi state, in which one didactic by an expert is given and one case is discussed which is presented by paramedical staff.

8. Review of NTEP activities on ECHO platform

Due to Covid pandemic during last year and also this year, physical monitoring visits and review meetings were not possible, so all review meetings and check list based supervising activities were conducted on ECHO platform. During the year, performance of all the 25 Chest Clinics was reviewed via ECHO hub including monitoring of laboratory performance of Designated Microscopy Centers.

9. Supporting in publication of Indian Journal of Tuberculosis

TB Association of India is publishing a quarterly journal which includes articles on Tuberculosis and Respiratory Diseases. Faculty of NDTB Centre is supporting the publication of IJT as associate executive editor, assistant editor and members of editorial board.

10. Active participation in NATCON.

National Conference on TB and Respiratory Diseases is conducted by TB Association of India annually in various parts of country in rotation. Faculty of NDTB Centre is actively participating in the conference every year in organizing the conference, finalizing scientific programme and participating in different scientific sessions as chair persons, moderators and speakers.

11. Laboratory Information Management System (LIMS)

Our Laboratory is now equipped with LIMS, in which laboratory data and reporting is done online. All the steps of testing are entered online and final report is generated and sent to field and NIKSHAY portal directly.

12. Infrastructure Development

During last few years, renovation work of building and addition of new furniture has been done in all sections of the Centre including beautification of executors.

13. Training and Dissertation of students

The laboratory is supporting various institutions and universities in conducting training and dissertation work of their students in the field of tuberculosis.

PARTICIPATION IN SCIENTIFIC EVENTS

A) PARTICIPATION IN NATCON 2020

NDTB Centre faculty is actively involved in conducting the national level TB conference which is conducted every year in one of the states for the last 75 years in collaboration with TB Association of India.

Faculty of NDTB Centre is involved in planning and deciding the state to conduct the conference and framing scientific programme. During the conference, faculty is actively involved in conducting various scientific sessions, administrative meetings in addition to chairing scientific sessions and presenting research papers.

75th NATCON was held virtually from 18th to 20th December 2020. Dr. K.K. Chopra, Director and Dr. Sanjay Rajpal, Chest Physician attended the conference. Participation of NDTB Centre included :

- a) Dr. K.K. Chopra, Director chaired the following sessions :
 - i. Research leading to paradigm shift in efforts to End TB by 2025:All hands on deck to finish the job by 2025
 - ii. Meet the Experts – Tuberculosis, NTM
 - iii. COVID 19 and Respiratory system way forward
- b) Dr. K.K. Chopra, Director delivered following lectures :
 - i. MDR-TB in special situations – Pregnancy, HIV, Hepatitis & Chronic renal patients.
 - ii. Newer Drugs – Impact on treatment outcomes of DR-TB
 - iii. Expansion of DBT in the country, leading to better adherence
 - iv. DRTB Guidelines
 - v. Meet the Expert - NTM - Diagnosis and Management
- c) Management of ADR including hepatotoxicity in MDR - TB regimes lecture delivered by Dr. Sanjay Rajpal.



NATCON-2020

E-Poster Title : TB CARE IN PRISONS IN NEW DELH

KK Chopra, AK Khanna¹, Shanker Matta², Shweta Singh³
¹Director, New Delhi TB Center, Delhi, India
²New Delhi State TB Officer, Delhi, India
³Epidemiologist, New Delhi TB Center, Delhi, India
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E-Poster No. EP31-398-24

THE 51ST UNION WORLD CONFERENCE ON LUNG HEALTH

Intro

- Increased risk of contracting TB among prisoners
- TB prevalence rates 84 times higher among prisoners.
- Tihar is largest Jail in South Asia. More than 15000 inmates.
- Project to screen all inmates for TB symptoms using ACF tools.

- Prison staff sensitized about TB.
- A quantitative study using ACF data collection tools.
- Symptomatics were offered X-ray chest, sputum exam. and CBNAAT test as per diagnostic algorithm.
- Detected TB cases linked to DOT Centres.
- After release, referred to area DOT Centre.

- 18492 prisoners were screened.
- 1018 were found TB symptomatics.
- 132 were diagnosed as confirmed TB cases.
- Overall prevalence was 714/ 100000.
- 83% were 21-40 years, mostly males.
- 120 cases put on treatment at prison DOT Centre.

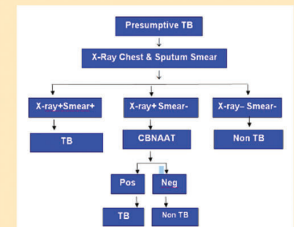
Discussion

- Inmates are at increased risk, so are the communities to which they return.
- Jail authorities have to come up with a mechanism to ensure continuation of treatment by developing referral mechanism after release from prison.
- Active case finding has major benefits.

CONCLUSIONS

- TB is many times more in inmates.
- ACF is fruitful activity.
- Most cases could be started on treatment in prison DOT Centre.
- Most cases not properly referred to treatment centres after release.
- Operational linkage system after release from prison is need of the hour.

Extra Tables & Figures



Prisons screened	18492
TB Symptomatics	1018
Confirmed TB cases	132
Cases put on treatment	120

E-Poster presented in 51st Union World Conference on Lung Health

B) PARTICIPATION IN OTHER SCIENTIFIC EVENTS

1. An ECHO clinic was held on 1st April 2020 from STDC hub for para medical staff of Delhi state NTEP. Dr. K.K. Chopra, Director sensitized the staff about COVID-19 diseases, its symptoms, diagnosis, management and prevention.
2. Preliminary session on True NAT beta Covid-19 testing held on 21st April, 2020. Faculty and technical staff of NDTB centre laboratory participated in the discussion.
3. Video conference from ECHO platform was held by Central TB Division on 23rd April 2020 on Laboratory data collection tools. Faculty and technical staff of laboratory of NDTB Centre attended and participated in the discussion.
4. True Nat BETA COV' virtual training (practical aspects) held on ZOOM platform for Delhi state laboratory staff on 24th April 2020. Faculty and technical staff of NDTB Centre's laboratory attended the session.
5. A meeting to finalize linkage between COVID19 labs and hospitals of Delhi held on 4th May 2020 in NDTB Centre. State TB Officer, Nodal officer of Delhi government for Covid-19 proposed to conduct COVID19 tests on existing gene-expert and True Nat machines. It was decided to conduct tests on urgent samples of MAMC in NDTB Centre lab.
6. An ECHO clinic was held on 6th May 2020 from STDC hub regarding infection control practices in workplaces for health care workers in chest clinics. All DTOs, MOs and para medical staff of chest clinics attended the session. Total 225 participants attended the session via ECHO platform.
7. A meeting on ECHO platform was held on 8th May, 2020 regarding sensitization of nodal officers of quarantine centers in Delhi about sample collection of COVID19 cases for testing on True NAT machines. COVID19 nodal officer of Delhi state also discusses linkages of labs with different quarantine centers. About 125 participants attended the meeting.
8. Ethical committee meeting of NITRD was held on 13th May 2020 via ZOOM platform. Dr. K.K. Chopra, Director attended the meeting as Addl. Chairman of ethical committee of NITRD. Two research projects were discussed and approved during the meeting. During the meeting, a sub-committee was constituted to monitor severe adverse events (SAE) in clinical trials under the chairmanship of Dr. K.K. Chopra, Director, NDTBC.
9. Delhi NTEP review meeting was held on 14th May 2020 via ECHO platform. The meeting was organised from STDC Hub. District wise performance of Delhi state for the 1st quarter was analysed and presented by Dr. K.K. Chopra, Director. Measures to improve performance of individual chest clinic discussed with respective District TB officer. In addition, challenges faced in maintaining NTEP services in COVID19 era were also discussed. All DTOs, MOs, Supervisors and para medical staff participated in the discussion. About 80 participants attended the meeting.
10. Review of NITRD DRTB linked District DRTB centers conducted for 1st quarter 2020 through ECHO platform on 19th May 2020. District TB Officers of linked centers gave their presentation

and their issues were resolved.

11. Central TB Division conducted video conference on 22.5.2020 with Delhi and Tamil Nadu state to review the status of NTEP activities in states during COVID19 situation and how states have tried to overcome the challenges. State TB officers, STDC faculty and nodal officers of DRTB sites and laboratories attended the review meeting.
12. State level COVID testing coordination committee meeting held in NDTB Centre on 1st June 2020. Faculty of NDTBC laboratory, MAMC microscopy lab, nodal officers of state and central district participated in the meeting. Linkages of different labs with catchment area were re-defined.
13. Video conference discussion organised by Central TB Division to finalise PMDT e-module for private practitioners on 3rd June, 2020. Faculty of NDTB Centre, The Union and WHO participated in the discussion.
14. State level sensitization held for MOs, STLS and DEO working in chest clinics of Delhi and in the states of Bihar and J&K held on 15th June, 2020. The session was on “Online reporting format for Annexure M and CBNAAT indicators”. Dr. M.Hanif, Bacteriologist and Dr. Zeeshan took the sensitization session. Around 145 participants attended the session.
15. Supervisory visit to True Nat COVID laboratory of RMK Hospital done on 22nd June 2020. Dr. Zeeshan, Microbiologist visited the laboratory with state team for inspection.
16. State level PMDT review of Delhi state held on ECHO platform on 18th June, 2020 from STDC hub. Nodal officers of CDST laboratories gave their presentation. State level report was presented by Dr K.K. Chopra, Director. About 165 participated attended the discussion.
17. State level meeting to review PMDT templates held at NDTB Centre on 23rd June, 2020. STO Delhi state, STDC faculty, WHO consultant, State TB Cell medical officers participated in the discussion.
18. A video conference meeting held with Central TB Division on 25th June, 2020. The meeting was to know the Update on Amikacin - Kanamycin containing regimen intervention in MDR TB cases.
19. Dr. Zeeshan visited AIIMS Covid-19 Laboratory on 26th June, 2020. This was part of evaluation visit of state team for certification of COVID Lab by CBNATT and True NAT.
20. Review of two districts of AIIMS DRTB site held on 2nd July 2020 on ECHO platform. Respective district TB officers presented their data and it was reviewed by STO, STDC Director and nodal officers of AIIMS DRTB site.
21. A virtual meeting of sub-committee of the NITRD Ethics Committee was held on 8th July 2020 to review SAE of regulatory BEAT trials of NITRD. Dr. K.K. Chopra, Director attended the meeting as Chairman of Sub-committee.
22. LNH Nodal DRTB Centre PMDT review meeting was held via zoom on 10th & 15th July 2020. All DTO/Medical Officers of linked chest clinics present the data of their respective Chest Clinic. Dr. K.K. Chopra, Director attended the meeting.

23. On Monday, the 13th July, 2020, a sensitization session from STDC Hub was conducted for all DTOs, Medical Officers, and Data Entry Operators working under NTEP. The session was on “Procurement & Implementation of Digital Signature Certificate (DSC) for DBT payments”.
24. Zonal Task Force meeting of North Zone was held on 14th July, 2020 via Zoom to review ZTF activities for the north zone for 2020. Dr. K.K. Chopra, Director and Dr. Matta, Epidemiologist attended the programme.
25. Video conference discussion organised by Central TB Division to review the content of the e-module for MO cadre uploaded on the SEG platform on 16th and 17th July 2020. Faculty of NDTB Centre, The Union, WHO and DTOs of four chest clinics participated in the discussion.
26. In order to support the State/UTs in adopting the Revised Guidance Document on Partnerships (2019) while contracting NGO/PP in the districts, the Central TB Division has conducted one day long sensitization on the Revised Guidance Document for Andhra Pradesh and Delhi on 21st July 2020. Dr. K.K. Chopra, Director and Dr. Matta, Epidemiologist attended the programme via zoom.
27. In order to help Chest Clinics to resolve any issues related to the programme implementation at field level, issues related to Nikshay/ Nikshay Aushadhi etc, State TB Cell has planned an interactive session with DTO/MO/Supervisors/DEOs and to do hand holding with Chest Clinic Staff on Virtual Platform. The session was conducted on 24th July 2020 for Chest Clinic GTB Hospital and on 31st July 2020 for Moti Nagar Chest Clinic. The State TB Officer along with Dr. K.K. Chopra, Director, NDTBC resolved the issues faced by chest clinics.
28. Third party Evaluation of activities and expansion of TB Alert of India was held on 27th July 2020 via zoom. Dr. K.K. Chopra, director joined as an expert.
29. Central TB Division, Govt. of India under the Chairpersonship of JS (MoHFW, GoI) held meeting with all States to review NTEP activities on 29th July 2020 through Virtual Platform, where all the parameters of the programme were reviewed. Dr. K.K. Chopra, Director attended the meeting.
30. Ethical committee meeting of NITRD was held on 30th July 2020 via ZOOM platform. Dr. K.K. Chopra, Director attended the meeting as Addl. Chairman of ethical committee of NITRD.
31. For the introduction and guidance to undergo e-modular training (adverse drug reaction management), a session on zoom was held on 7th August 2020 for District TB Officers of Delhi state. Faculty of NDTB Centre and The Union and CTD representatives were facilitators.
32. Delhi state NTEP review meeting was held on 20th August 2020 via ECHO platform. The meeting was organised from STDC Hub. District wise performance of Delhi state for the 2nd quarter was analysed and presented by Dr. K.K. Chopra, Director. Measures to improve performance of individual chest clinic discussed with respective District TB officer. In addition, challenges faced in maintaining NTEP services in COVID19 era were also discussed. All DTOs, MOs, Supervisors and para medical staff participated in the discussion.
33. The Central TB Division has organised E-launch event for pilot testing of PMDT Modules. Dr.

K.S. Sachdeva, DDG (TB) inaugurated the modules on 24th August, 2020. Dr. K.K. Chopra, Director, Dr. M. Hanif, Bacteriologist and Dr. Shankar Matta, Epidemiologist attended the programme.

34. PMDT Second Quarter Review meeting of RBIPMT DRTB site under Capacity Building Project was held on 1st and 2nd September 2020. Dr. K.K. Chopra, Director, Dr. M. Hanif, Bacteriologist and Dr. Shankar Matta, Epidemiologist attended the review meeting.
35. Video Conference through ECHO Platform was held on 3rd September 2020 through STDC Hub to track the DBT NPY progress of each Chest Clinic. All the staff of chest clinics dealing with DBT NPY payments attended this session.
36. Dr. Zeeshan visited different private laboratories for monitoring of COVID 19 testing on 4th, 11th and 18th September 2020.
37. Virtual meeting to review the changes made in PMDT modules for PP and a DSM module and also to review the flow of contents for STS, STLS and Treatment Supervisors modules in detail was held on 9th September 2020. Dr. K.K. Chopra, Director and Dr. M. Hanif, Bacteriologist attended the meeting.
38. Delhi State PMDT review meeting for 2nd quarter 2020 was held on 15th September 2020 in STDC Delhi. Microbiologist of IRLs, C&DST Labs & Nodal Officers of DR TB Centre sites presented their reports for the quarter. Dr. K.K. Chopra, Director presented the analysis of performance of individual chest clinics during 2nd quarter 2020. Various issues related to labs and nodal DRTB Centers were discussed and resolved.
39. A meeting of 'COVID and TB' state level supervisory committee was held on 24th September, 2020. Dr. K.K Chopra, Director attended the meeting as its member.
40. Delhi State Task Force meeting of Delhi State NTEP was held on 24th September 2020 through ECHO platform. All the 13 medical college representatives presented their activities. Faculty of NDTB Centre participated in the meeting as its members. Dr. K.K Chopra, Director delivered a lecture on COVID and TB.
41. Delhi State NTEP TB HIV State Technical Working Group (STWG) meeting was held on 29th September 2020 through Virtual Platform where performance of individual ART Centers was discussed. All the ART Centre staff attended the meeting. Dr. K.K. Chopra, Director attended the meeting and presented the data on different parameters like Status of TB-HIV Co infected patients, status of TPT to PLHIV etc.
42. PMDT Second Quarter Review meeting under Capacity Building Project of AIIMS DR TB Site was held on 6th October, 2020. Dr. K.K Chopra, Director attended the meeting as its member.
43. Ethical committee meeting of NITRD was held on 21st October and 24th October 2020. Dr. K.K. Chopra, Director attended the meeting. Two research projects were discussed in detail during the meeting and approved.

44. The 51ST Union World Conference on Lung Health was held from 20th to 24th October, 2020. During the conference, e-poster entitled “TB CARE IN PRISONS IN NEW DELHI” presented by Dr. K.K. Chopra, Director.
45. A proposal to start active case finding for inmates of night shelters has been planned. A sensitization session on ECHO platform was conducted on 10th November 2020 for DTOs and supervisory staff to discuss with them regarding modalities and process of conducting the project.
46. Meeting of Scientific Committee of 75th NATCON was held on 25th November 2020 organised by TB Association of India to finalise the scientific programme for NATCON. Dr. K.K. Chopra, Director attended the meeting as one of the member of the committee.
47. For Improvement of Quality of DRTB Care in the Public Sector in India, a Quality Improvement Meeting (QIM-2) and Cross- Learning Session was held at DRTBC- Amritsar, Punjab on 25th November, 2020. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “ADR Monitoring”.
48. National Pulmonology Update 2020 via virtual platform was organised by Government Medical College & Hospital Chandigarh from 27th to 28th November 2020. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “Recent changes in DRTB guidelines”.
49. Meeting of Scientific Committee of 75th NATCON was held on 1st December 2020 organised by TB Association of India to finalise the scientific programme for NATCON. Dr. K.K. Chopra, Director attended the meeting as one of the member of the committee.
50. Scientific committee meeting of RBIPMT was held on 2nd December 2020. Dr. K.K. Chopra, Director and Dr. M. Hanif, Bacteriologist attended the meeting as its member.
51. For Improvement of Quality of DRTB Care in the Public Sector in India, a Quality Improvement Meeting (QIM-3) and Cross- Learning Session was held at Faridkot, Punjab on 4th December, 2020. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
52. A meeting was held under the Chairmanship of DDG TB on 23rd December 2020. The discussion was to discuss the new leveraging technological solutions to evolve the concept of blended training where the physical presence can be shortened to enable more participants to attend the modular training due to current COVID situation. Dr. K.K. Chopra, Director attended the meeting.
53. A virtual meeting was held on 30th December 2020 to discuss the ICMR funded project entitled “Prevalence, risk factors, and laboratory diagnosis of nontuberculous mycobacterial (NTM) disease: a multicentre study”. The meeting was attended by Director, NDTB Centre, DDG (TB), Scientist ICMR and project coordinator.
54. A virtual meeting of Ethical Committee of NITRD held on 30.12.2020 to discuss one scientific project and report on severe adverse events in different research projects going on in the institute. Dr. K.K. Chopra, Director attended the meeting as its member.

55. Capacity building workshops was held for para medical staff of Delhi NTEP on 5th January, 2021. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
56. A meeting was called to discuss the progress in NTM project on 5th January 2021. Dr. K.K. Chopra, Director and Dr. Hanif, Bacteriologist attended the meeting as co-investigators of the project.
57. A scientific meeting of RBIPMT was held on 7.1.2021 to discuss one scientific project. Dr. K.K. Chopra, Director attended the meeting as its Chairman.
58. For Improvement of Quality of DRTB Care in the Public Sector in India, a Quality Improvement Meeting (QIM-3) and Cross- Learning Session was held for Meerut, UP DRTB Site on 7th January, 2021. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
59. Lok Nayak Hospital, PMDT site review meetings for Q2 and Q3 was held on 7th and 12th of January 2021. Dr. K.K. Chopra, Director attended the meeting.
60. Orientation programme on adverse drug reactions (ADRs) was held on 13th January 2021 at Delhi TB Association. On this occasion, Dr. K.K. Chopra, Director given presentation on Adverse Drug Reactions.
61. LIMS, FIND in conjunction with KPMG has developed the “Logistic Module” for the consumables used in C& DST Laboratories. The module is expected to ease out challenges related to Logistics Management in C&DST Laboratories. To learn about these modules a virtual training was conducted for the staff posted at C& DST Laboratories from 19th - 22nd January 2021.
62. Quarterly Quality Improvement Meeting and Cross-Learning session was held for the Nodal DRTB Center Jhansi and Gorakhpur in the Uttar Pradesh state under the project “Improvement of quality of DRTB care in the public sector in India” on 21st January 2021. Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
63. Virtual meeting with Central TB Division was held on 23rd January 2021 regarding blended training proposed under NTEP for medical officers.
64. 75th NAPCON was held virtually from 28th to 31st January 2021. Dr. K.K. Chopra, Director attended the conference. Dr. Chopra delivered a lecture on “Linezolid in MDR TB” and also judged the oral presentations held on “Tuberculosis - Molecular Diagnostics”.
65. Quarterly Quality Improvement Meeting and Cross-Learning session was held for the Nodal DRTB Center Ghaziabad and Allahabad in the Uttar Pradesh state under the project “Improvement of quality of DRTB care in the public sector in India” on 28th January 2021. Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
66. ICMR has sanctioned two research projects entitled “Improving TB diagnosis at Designated Microscopic Centers by introduction of Quality Management Systems and optimum utilization of rapid molecular diagnostics and its cost implications” and “TB prevalence and interventions

for reducing TB and LTBI in high risk key population of rickshaw drivers and construction workers”. The principal investigator of these two projects is SHARE INDIA and the Centre faculty is acting as co-Principal Investigator. To discuss the SOPs, Dr. K.K. Chopra, Director held meeting with SHARE INDIA on 1st, 3rd and 4th February 2021.

67. A virtual meeting of PG Ethical Committee of NITRD was held on 5th and 15th February 2021 to discuss 19 projects (DNB thesis). Dr. K.K. Chopra, Director attended the meeting as its Chairman.
68. Faculty Ethical committee meeting of NITRD was held on 9th February 2021. Dr. K.K. Chopra, Director attended the meeting as its chairman. Four research projects of faculty and notifications of ongoing projects were discussed.
69. For Improvement of Quality of DRTB Care in the Public Sector in India, a Quality Improvement Meeting (QIM-3) and Cross- Learning Session was held for Basti and Bareilly, UP DRTB Site on 11th February, 2021. On this occasion, Dr. K.K. Chopra, Director delivered a lecture on “ADR Management in MDR TB treatment”.
70. A CME under JEET Project was organised in Sir Ganga Ram Hospital on 23rd February 2021. Dr. K.K. Chopra, Director attended the CME and delivered a lecture on “Latent TB Infection”.
71. District level Capacity Building Workshop for TB Survivors was held from 25th to 27th February 2021. On this occasion, Dr. K.K. Chopra, Director was a part of panel discussion and delivered talk on “Role of TB survivors in ending TB”.
72. Dr. Kaushal, Microbiologist, STDC made a monitoring visit to COVID laboratory established in Venkateshwara Hospital, Dwarka on 1st March, 2021 as a member of State CBNAAT and Truenat Committee.
73. Dr. K.K. Chopra, Director nominated as expert member of Indian TB Research Consortium of ICMR. He attended meeting on 5th March 2021 of National TB Research Consortium of ICMR for preliminary discussion on call for proposals on implementation research.
74. Employees of Delhi Zoological park attended the OPD of the Centre for screening to detect active TB from 9th to 12th March, 2021. Total 17 staff members screened, out of which 5 members had evidence of some disease and called for further investigations.
75. Delhi State PMDT review meeting was held on 10th March 2021 in STDC Delhi. Nodal officers of culture DST labs and DRTB centres presented their reports of the quarter. Various issues related to labs and nodal DRTB Centres were discussed.
76. Dr. Zeeshan, Microbiologist, STDC made a monitoring visit to COVID laboratory established to Dr. Suri Lab Pvt. Ltd, Pusa Road, New Delhi on 16th March, 2021 as a member of State CBNAAT and Truenat Committee.
77. Sensitization about performance indicators monitoring and review meeting of Delhi State NTEP for 4th quarter 2020 was held at STDC on 16th March, 2021. Dr. K.K. Chopra, Director presented the district wise performance of chest clinics and gave the feedback. Dr. K.K.

Chopra, Director also presented in detail about active case finding campaign. DTOs and field staff were sensitized about the performance indicators being monitored by Central TB Division and how to analyse their own performance periodically.

78. A CME under JEET Project was organised at Primus Hospital on 18th March 2021. Dr. K.K Chopra, Director attended the CME and delivered a lecture on “ Update on LTBI”.
79. AIIMS Pulmocrit-2021 was conducted from 13th to 14th March 2021. On the occasion, Dr. K.K. Chopra, Director chaired a scientific session on tuberculosis.
80. On occasion of World TB day many activities were done at New Delhi Tuberculosis centre from 18th March 2021 - 25th March 2021. This year also various programmes were conducted with SPYM (Society for the promotion of Youth and masses). Children were encouraged to participate. Various activities like painting competition, slogan writing competition and poem recitation competition on TB were undertaken. IEC along with health talk was also conducted. A community meet in the Hauz Qazi area of Delhi was also undertaken whereby the community was sensitized about Tuberculosis, its treatment and prevention. The conclusion of TB week celebration was undertaken on 25th March 2021 at the New Delhi Tuberculosis centre where a health talk on Tuberculosis was organized for the patients and winners of Painting and poem competition were awarded prizes.
81. Faculty Ethical committee meeting of NITRD was held on 22nd March 2021. Dr. K.K. Chopra, Director attended the meeting as its chairman.
82. IMAAMS (Haryana Chapter) & Indian Chest Society (Haryana Chapter) organised a Webinar on World TB day on 24th March 2021. On the occasion Dr. K.K Chopra, Director delivered a lecture on “ Recent changes in PMDT”.
83. Government Medical College, Chandigarh organised a conference on World TB day on 24th March 2021. On the occasion Dr. K.K Chopra, Director delivered a lecture on “ Update on latent TB infection”.
84. AIIMS, Bhopal organised a Webinar on World TB day on 24th March 2021. On the occasion Dr. K.K Chopra, Director delivered a lecture on “ Guidelines for PMDT - Practical Considerations”.
85. Central TB Division, Ministry of Health & FW organised World TB Day at Dr. Ambedkar International Centre on 24th March 2021. The Hon’ble Minister of Health & Family Welfare, Dr. Harsh Vardhan, graced the occasion. Faculty of NDTB Centre attended the programme.
86. NCPI organised community awareness programme on 25th March 2021. On the occasion, Dr. Shanker Matta, Epidemiologist delivered a lecture on tuberculosis.
87. Delhi State Task Force meeting of Delhi NTEP was held on 30th March 2021 via ECHO Platform. All the 14 medical college representatives presented their activities. Faculty of NDTB Centre participated in the meeting as its members.
88. During the occasion of World TB Day, Dr. K.K. Chopra, Director delivered Live Talk on DD News on “Tuberculosis” on 28.3.2021.

MEETINGS

1. A meeting to decide on to maintain records in TB Association of India was held on 20th July 2020. Dr. K.K. Chopra, Director attended the meeting as an expert.
2. Dr. K.K. Chopra (Director) participated in the meeting of TB Association of India on 1st August 2020. During the meeting, TB Seal design which is to be released on 2nd October 2020 was discussed and finalized.
3. A virtual meeting under the chairmanship of DDG TB was held on 17th September 2020. The meeting was regarding transitioning of Laboratory HR supported through FIND and status of progress made in the establishment of Culture & DST laboratories.
4. MACP Promotion Committee meeting of NDTB Centre was held on 13th October 2020. Cases of promotion of staff members were discussed and approved.
5. A Managing Committee meeting of NDTB Centre was held on 18th November, 2020. Various issues related to staff and pending matters of NDTB Centre were discussed in the meeting.
6. The Ministry of Health & FW has formed a panel of experts for peer review of National Institute of Tuberculosis & Respiratory Diseases (NITRD), New Delhi, an autonomous Institute under Ministry of Health and Family Welfare (MoHFW). The Ministry asked the panelists to undertake the review of NITRD from 14th to 18th December 2020. Dr. K.K Chopra, Director was one of the panelists and he visited NITRD for the review.
7. The Union organised a preliminary meeting on 13th January 2021 to discuss creation of “TB Fund” under TB Association of India. Dr. K.K. Chopra, Director attended the meeting as stakeholder.
8. Confederation Industry of India (CII) in partnership with Central TB Division has organised a series of State Round Table conferences across the country. For Delhi state, a round table meeting was held on 15 January 2021 where Dr. K.K. Chopra, Director delivered a talk on “Delhi State Prospective”.
9. Virtual meeting was held with Enactus, Delhi College of Arts and Commerce (voluntary international student body organisation) on 18th January 2021 regarding supporting and providing TB services to unprivileged and marginalised people of our country through social entrepreneurship models. Dr. K.K. Chopra, Director discussed about the various options of conducting these activities. Eight members of the voluntary organisation attended the session.
10. A meeting was held with ECHO India newly joined Vice President on 4th February 2021 where review of ongoing activities were undertaken and further expansion of activities through TB Association of India were discussed.
11. ICMR has sanctioned two projects in which the Centre faculty is acting as co-Principal Investigator. The interview was conducted on 4th March 2021 for human resources under these two projects where Dr. K.K. Chopra, Director was a member of interview board.
12. Virtual interview was conducted on 11th March 2021 to select persons for various positions in ICMR sanctioned NTM project. Dr. K.K. Chopra, Director and Dr. M. Hanif, Bacteriologist participated as experts.

TRAINING AND MONITORING SECTION

NTEP Trainings

Training of various categories of staff (MO's, STS, STLS, nursing) and workshops is an integral part of NTEP and are conducted round the year by NDTBC staff in collaboration with the State TB Cell, Central TB Division and WHO. NTEP trainings and workshops are regularly conducted at NDTBC. The staff are also regularly sensitized on any revised guidelines. Various sensitization programmes are also conducted for nursing students of various colleges regarding NTEP, signs and symptoms of Tuberculosis, diagnosis, treatment modalities, DOTS adoption, MDR TB diagnosis and its treatment. Other topics like infection control in health care settings, roles and responsibilities of nursing personnel for care of TB patients and prevention against tuberculosis are also included.

Main highlights of trainings under NTEP are :

- Imparting modular and practical training to medical and para medical staff working under NTEP
- Assessment of training needs preparation of training curriculum.
- Preparation of annual training calendar.
- Identification of resource persons, venue etc.
- Maintaining updated directory of trained manpower for Delhi state
- Organization of training at the State level.
- Periodic supervision and assessment of quality of training conducted at district and sub district levels.
- Standardisation of training evaluation methods.

Resource persons for trainings are faculty of NDTBC, MAMC and District TB Officers of Delhi State.

The details of trainings are given below :

1. The Government is planning to start COVID-19 testing in BSL-3 laboratory of NDTB Centre. The process has already been started. For this purpose, zoom training was conducted on 14th April, 2020 for laboratory staff of NDTB Centre.
2. Dr. Zeeshan, Microbiologist attended one day training on Bio safety in Covid – 19 testing at Institute of Liver and Biliary & Sciences (ILBS) on 2nd May, 2020.
3. Hands-on Training of technical staff of NDTB Centre lab and MAMC labs on TrueNAT machines to carry out COVID19 tests held in laboratory of NDTB Centre on 4th and 5th May, 2020. Technical staff of NDTB Centre and MAMC lab staff attended the hands-on training session.
4. One day Hands –On training conducted for Lab staff from LNJP Hospital and UCMS on

Truenat for Covid – 19 in laboratory of NDTB Centre.

5. Microbiologists and laboratory technician of GTB Hospital and UCMS Medical Colleges were given hand-on training for TrueNAT Covid testing at IRL NDTB Centre on 24th June 2020.
6. Doctors and Laboratory technicians of Hamdard Hospital and Rajiv Gandhi Cancer institute attended Induction training at NDTB Centre regarding Genexpert for Covid-19 testing on 25th June 2020.
7. Laboratory staff of GB Pant Hospital was given hand-on training for TrueNAT Covid 19 testing at IRL NDTB Centre on 29th June 2020.
8. Sensitization of MOs, STLS and DRTB Supervisors conducted on ECHO platform from STDC hub on 1st July 2020. They were sensitized about how to fill up entries in PMDT goggle sheet, sources of data, to correct discrepancies in 1st quarter 2020 data. Their queries were also resolved. 125 participants attended the session.
9. Doctors and Laboratory technicians of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 6th July 2020. Similar training sessions were also held on 9th July, 2020 and 22nd July, 2020.
10. Sensitization of Nodal Officer, Nodal DRTB Centres/DTOs/MOs/Sr MO DRTB Centre/SA/ District DRTB/TB HIV Coordinators conducted on ECHO platform from STDC hub on 30th July 2020. The session was on “Transition to Nikshay Based Reporting for DRTB patients”.
11. Microbiologists and Laboratory technicians of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 6th August 2020.
12. A training session from STDC Hub was conducted on 10th August, 2020. The training is on ‘Implementation of Phase IV CBNAT EQA as per NTEP Lab guidelines’. The session was through ECHO platform. The microbiologists of IRL, NDTB Centre were facilitators.
13. Microbiologists of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 10th September 2020.
14. Sensitization session on PMDT Reporting formats and Transition to Nikshay was held for MOs, STLSs and Dots Plus Supervisors for all the chest clinics of Delhi state as detailed below :
 - On 20th October, 2020 for SPM Hospital and Karawal Nagar Chest Clinics
 - On 21st October, 2020 for NITRD and Ch. Deshraj Chest clinics
 - On 22nd October, 2020 for DDU Hospital and Shahdara Chest Clinics
 - On 27th October, 2020 for Kingsway Chest Centre and GTB Chest Clinics
 - On 28th October, 2020 for Nehru Nagar and Jhandewlan Chest Clinics
 - On 29th October, 2020 for Malviya Nagar and Narela Chest Clinics

15. Microbiologists and laboratory technicians of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 23rd October 2020.
16. Sensitization session on PMDT Reporting formats and Transition to Nikshay was held for MOs, STLs and Dots Plus Supervisors for all the chest clinics of Delhi state as detailed below :
 - On 3th November, 2020 for BSA Hospital and SGM Chest Clinics
 - On 5th November, 2020 for BJRM, RTRM and Ch. Desh Raj Chest clinics
 - On 10th November, 2020 for NDMC, Gulabi Bagh Chest Clinics
 - On 11th November, 2020 for Patparganj and RKM Chest Clinics
 - On 12th November, 2020 for Bijwasan and Lok Nayak Chest Clinics
 - On 17th November 2020 for Pili Kothi and Hedgewar Hospital chest clinics
17. Microbiologists and laboratory technicians of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 25th November 2020.
18. The NDTB Centre (STDC) in coordination with State TB Cell have conducted interactive hand Holding sessions with all the Chest Clinics of Delhi via Virtual Platform. During these sessions all the Indicators related to the programme were explained in detail and relevant staff were told to update/rectify the data entries in Nikshay portal. The sessions were held on 18th, 21st, 22nd, 23rd and 24th December, 2020 for different chest clinics.
19. Sensitization about performance indicators monitoring and review meeting of Delhi Sate NTEP for 3rd quarter 2020 was held at STDC on 29th December, 2020. Dr. K.K. Chopra, Director presented the district wise performance of chest clinics and gave the feedback. Dr. K.K. Chopra, Director also presented in detail about active case finding campaign. DTOs and field staff were sensitized about the performance indicators being monitored by Central TB Division and how to analyse their own performance periodically.
20. Induction training regarding Truenat and Genexpert for Covid-19 testing was organised for Laboratory staff working under NTEP on 22.1.2021, 25.1.2021, 27.1.201 and 28.1.2021.
21. Microbiologists and laboratory technicians of private diagnostic centres attended Induction training at NDTB Centre regarding Truenat and Genexpert for Covid-19 testing on 29th January 2021.
22. One day sensitization/training of Medical Officers on NTEP guidelines were organised on 2nd and 4th February 2021 at NDTB Centre. Medical Officers of District TB Centres of Delhi, referral units and nodal DR TB centres attended the session.
23. Hands on training in Truenat Machines was held for Laboratory Technicians in NDTB Centre in four batches (from 23rd to 26th February 2021).



Sensitization of NGO workers at Delhi TB Association



Covid 19 Training of Microbiologists and Technicians



CME at Sir Ganga Ram Hospital



Participation in Panel discussion on TB Dignostics at AIIMS

24. One day training session was conducted on 12th March 2021 at RBIPMT Hospital regarding Good Clinical Practices in clinical trials. Dr.K.K. Chopra, Director and Dr. M. Hanif, Bacteriologist attended the session as chairperson and member of Ethical Committee of RBIPMT. This was a pre requisite for renewal of ethical committee.

**Details of Trainings held for at New Delhi TB Centre (STDC)
from 01st April 2020 to 31st March 2021**

S.No.	Training	No. of Participants
1	NTEP personnel (Medical and Para Medical)	2295
2	Miscellaneous trainings (virtual trainings for different states by NDTBC faculty)	1101
3	Training of private practitioners	124
	Total	3520

54 days of training sessions were conducted between April 2020 to March 2021 and 2295 personnel were trained regarding various aspects of the NTEP. Various topics are discussed like NTEP, TB signs and symptoms, diagnosis, treatment modalities, DOTS, adoption of new techniques for MDRTB diagnosis and its treatment. PMDT guidelines hands-on training on TrueNat, Genexpert on Covid-19 testing etc. Topics like infection control for health workers, roles and responsibilities of nursing personnel for care of TB patients and prevention against Tuberculosis were also discussed in detail. In all 13 training sessions were undertaken for DRTB for doctors and supervisors of Punjab and UP state whereby 1101 personnel were trained via virtual meet. Apart from the above 124 medical private doctors were also sensitized during this year. The details of all trainings are given in the table below:-

Table: Details of Trainings held for Delhi state NTEP personnel (Medical and Para Medical) at New Delhi TB Centre (STDC) from 01st April 2020 to 31st March 2021

S. No.	Training	Participants title	Date	Virtual/ Physical	No. of Participants
1	Sensitization about COVID-19 diseases, its symptoms, diagnosis, management and prevention for para medical staff of Delhi state	Entire Para Medical staff of NTEP	01.04.2020	Virtual	85
2	Training for laboratory staff to start COVID-19 testing in BSL-3 of NDTB Centre.	Laboratory Technicians	14.04.2020	Hands-on-training	20

3	Hands on session on True Nat beta Covid testing for faculty of NDTBC and Delhi NTEP	Laboratory Technicians	21.04.2020	Hands-on-training	20
4	TrueNat beta COV virtual training for staff of Delhi state NTEP	Entire Para Medical staff of NTEP	24.04.2020	Virtual	25
5	Hands on Training of technical staff of NDTBC and MAMC lab to carry out COVID-19 testing on TrueNat	Microbiologists and Laboratory Technicians	04.05.2020 to 05.05.2020	Hands-on-training	14
6	Training workshop for infection control and prevention practices to be adopted during COVID-19 for DTOs, MOs and para medical staff of chest clinics of NTEP Delhi	DTOs, MOs and para medical staff of chest clinics of NTEP Delhi	06.05.2020	Virtual	225
7	Sensitization workshop for nodal officers of quarantine centres in Delhi about sample collection of COVID-19 cases for testing on Truenat machines	Nodal officers of quarantine centres in Delhi	08.05.2020	Virtual	125
8	Delhi state sensitization cum review meeting of DTOs	DTOs, MOs and supervisors	14.05.2020	Virtual	150
9	Review of NITRD-DRTB linked district DRTB centre conducted for 1 st quarter 2020	DRTB Site nodal officers, microbiologist, DTOs	19.05.2020	Virtual	32
10	Hands-on training held for lab staff of LNJP and UCMS for COVID 19 testing	Microbiologists, Lab. Tech.	26.05.2020	Hands-on-training	12
11	Training cum state level COVID testing	Microbiologist, Nodal officers	01.06.2020	Physical	10

	coordination meet for faculty of NDTBC, MAMC, Nodal officers of state and centre. Training was on linkages of different labs with catchment area.	of state			
12	Sensitization for para medical staff and MOs regarding data updation of PHIs and health facilities in private sectors.	DTOs, MOs and Supervisors	03.06.2020	Virtual	125
13	Training cum sensitization for MOs, STLS, DEOs of Delhi, Bihar and J&K. The session regarding Online reporting format for Annexure M and CBNAAT indicators.	MOs, STLS, DEOs of Delhi, Bihar and J&K.	15.06.2020	Virtual	145
14	Delhi state sensitization cum review meeting on PMDT activities	DTOs, MOs, Nodal officers of CDST labs and DRTB sites	18.06.2020	Virtual	165
15	Training of microbiologist and LTs of GTB and UCMS regarding Truenat CO	microbiologist and LTs	24.06.2020	Hands-on-training	5
16	Training of Microbiologist and LTs of Hamdard Hospital and Rajiv Gandhi Institute regarding Genexpert for COVID 19 testing	Microbiologists and LTs	25.06.2020	Hands-on-training	4
17	Training of laboratory staff of GB Pant Hospital for Truenat COVID-19 testing	Microbiologists and LTs	29.06.2020	Hands-on-training	5
18	Sensitization of Medical Officers and supporting staff regarding MDR data entry on Google spread sheet	MOs/STLS/DRTB supervisors	01.07.2020	Virtual	125

19	Training of DTOs, MOs & DEOs on “Procurement and implementation of DST for DBT payments”	DTOs, MOs & DEOs	13.07.2020	Virtual	85
20	Sensitization of nodal officers, DTOs, MOs & Coordinators on “Nikshay based reporting for DRTB patients”	Nodal officers, DTOs, MOs, and Coordinators	30.07.2020	Virtual	90
21	Induction & guidelines for e-modular training on adverse drug reaction management for DTOs	DTOs	07.08.2020	Virtual	12
22	Training of DTOs, MOs and STLS on implementation of Phase IV CBNAAT EQA as per NTEP guidelines	DTOs, MOs and STLS	10.08.2020	Virtual	85
23	Delhi state sensitization cum review meeting of DTOs	DTOs, MOs and Supervisors	20.08.2020	Virtual	95
24	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	20.10.2020	Hands-on-training	6
25	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	21.10.2020	Hands-on-training	5
26	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	22.10.2020	Hands-on-training	6
27	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	27.10.2020	Hands-on-training	5
28	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	28.10.2020	Hands-on-training	7

29	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	29.10.2020	Hands-on-training	5
30	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	03.11.2020	Hands-on-training	7
31	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	05.11.2020	Hands-on-training	6
32	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	10.11.2020	Hands-on-training	6
33	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	11.11.2020	Hands-on-training	6
34	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	12.11.2020	Hands-on-training	6
35	Sensitization session on PMDT reporting & transition to Nikshay	MOs, STLS and DPS	17.11.2020	Hands-on-training	7
36	Interactive hand Holding session on all the Indicators related to the programme to update/ rectify the data entries in Nikshay portal. (Batch 1)	MOs, DPS and Data Entry Operator	18.12.2020	Virtual	30
37	Interactive hand Holding session on all the Indicators related to the programme to update/ rectify the data entries in Nikshay portal. (Batch 2)	MOs, DPS and Data Entry Operator	21.12.2020	Virtual	30
38	Interactive hand Holding session on all the Indicators related to the programme to update/	MOs, DPS and Data Entry Operator	22.12.2020	Virtual	30

	rectify the data entries in Nikshay portal. (Batch 3)				
39	Interactive hand Holding session on all the Indicators related to the programme to update/ rectify the data entries in Nikshay portal. (Batch 4)	MOs, DPS and Data Entry Operator	23.12.2020	Virtual	32
40	Interactive hand Holding session on all the Indicators related to the programme to update/ rectify the data entries in Nikshay portal. (Batch 5)	MOs, DPS and Data Entry Operator	24.12.2020	Virtual	35
41	Delhi state sensitization about performance indicators monitoring	DTOs and MOs	29.12.2020	Virtual	125
42	Capacity building workshops for para medical staff of Delhi NTEP for management of ADRs	Para Medical Staff	05.01.2021	Virtual	137
43	Orientation training programme on adverse drug reactions (ADRs) for para medical staff of Delhi TB Association	Para Medical Staff	13.01.2021	Hands-on-training	6
44	Induction training regarding Truenat and Genexpert for Covid-19 testing for Laboratory staff working under NTEP	STLS and LTs	22.01.2021	Hands-on-training	3
45	Induction training regarding Truenat and Genexpert for Covid-19 testing for Laboratory staff working under NTEP	STLS and LTs	25.01.2021	Hands-on-training	5

46	Induction training regarding Truenat and Genexpert for Covid-19 testing for Laboratory staff working under NTEP	STLS and LTs	27.01.2021	Hands-on-training	6
47	Induction training regarding Truenat and Genexpert for Covid-19 testing for Laboratory staff working under NTEP	STLS and LTs	28.01.2021	Hands-on-training	6
48	Initial training of Medical Officers on NTEP guidelines	Medical Officers	02.02.2021	Modular training	8
49	Initial training of Medical Officers on NTEP guidelines	Medical Officers	04.02.2021	Modular training	7
50	Hands on training in Truenat Machines	Laboratory Technicians	23.02.2021	Hands-on-training	8
51	Hands on training in Truenat Machines	Laboratory Technicians	24.02.2021	Hands-on-training	8
52	Hands on training in Truenat Machines	Laboratory Technicians	25.02.2021	Hands-on-training	11
53	Hands on training in Truenat Machines	Laboratory Technicians	26.02.2021	Hands-on-training	12
54	Delhi state sensitization cum review meeting on PMDT of DTOs and Medical officers	DTOs, Microbiologists and Nodal officers of DRTB Centre	10.03.2021	Virtual	65
	Total				2295

Miscellaneous trainings:

The Union conducted different sessions under the project “Quarterly Quality Improvement Meeting and Cross Learning Sessions” on ADR Monitoring (Orientation on common ADRs, ADsM, and ADR Toolkit) for doctors and supervisors of Punjab and UP state NTEP. The training were given via zoom platform on the following dates:

S. No.	Training Site	Participants title	Date	Virtual/ Physical	No. of Participants
1	Patiala DRTB Site	Doctors and Supervisors	30.10.2020	Virtual	125
2	Amritsar DRTB Site	Doctors and Supervisors	25.11.2020	Virtual	110
3	Faridkot DRTB Site	Doctors and Supervisors	04.12.2020	Virtual	110
4	Meerut DRTB Site	Doctors and Supervisors	07.01.2021	Virtual	60
5	Jhansi DRTB Site	Doctors and Supervisors	21.01.2021	Virtual	88
6	Gorakhpur DRTB Site	Doctors and Supervisors	21.01.2021	Virtual	103
7	Ghaziabad DRTB Site	Doctors and Supervisors	28.01.2021	Virtual	56
8	Allahabad DRTB Site	Doctors and Supervisors	28.01.2021	Virtual	59
9	Basti DRTB Site	Doctors and Supervisors	11.02.2021	Virtual	135
10	Bareilly DRTB Site	Doctors and Supervisors	11.02.2021	Virtual	125

In addition, following training sessions for doctors of following medical institutes were also conducted by faculty of NDTB Centre :

S. No.	Training	Participants title	Date	Virtual/ Physical	No. of Participants
11	Webinar at IMAAMS (Haryana Chapter) & Indian Chest Society (Haryana Chapter)	Doctors	24.03.2021	Virtual	58
12	CME at Government Medical College, Chandigarh on “Update on latent TB infection”.	Doctors	24.03.2021	Virtual	24
13	Webinar at AIIMS, Bhopal on “Guidelines for PMDT - Practical Considerations”.	Doctors	24.03.2021	Virtual	48
	Total				1101

Training of Private practitioners (other than NTEP personnel)

S. No.	Training	Participants title	Date	Virtual/ Physical	No. of Participants
1	Training of doctors and LTs of private laboratories regarding Truenat and Genexpert for COVID 19 testing	Doctors and Laboratory Technicians	06.07.2020, 09.07.2020 and 22.07.2020	Hand-on-training	24
2	Training of doctors and LTs of private laboratories regarding Truenat and Genexpert for COVID 19 testing	Doctors and Laboratory Technicians	06.08.2020	Hand-on-training	13
3	Training of doctors and LTs of private laboratories regarding Truenat and CBNAAT for COVID 19 testing	Doctors and Laboratory Technicians	10.09.2020	Hand-on-training	2
4	Training of doctors and LTs of private laboratories regarding Truenat and CBNAAT for COVID 19 testing	Doctors and Laboratory Technicians	23.10.2020	Hand-on-training	4
5	Training of doctors and LTs of private laboratories regarding Truenat and CBNAAT for COVID 19 testing	Doctors and Laboratory Technicians	25.11.2020	Hand-on-training	8
6	Training of doctors and LTs of private laboratories regarding Truenat and Genexpert for COVID 19 testing	Doctors and Microbiologists	29.01.2021	Hand-on-training	11
7	CME at Sir Gangaram Hospital on Latent TB Infection	Private practitioners	23.02.2021	Virtual	31
8	CME at Primus Hospital on Update on LTBI	Private practitioners	18.03.2021	Virtual	31
				Total	124

New Delhi Tuberculosis Centre is also engaged in training and guiding of postgraduate students posted from the Maulana Azad Medical College, Department of community Medicine. A one week posting for all post-graduate students, whereby they were posted in various departments of NDTB Centre round the year. Idea behind this is to equip the students with the recent guidelines and

functioning of NTEP along with a practical exposure. The exposure covered various topics like Nikshay, DRTB management, TB notification and its significance, clinical management of TB patients etc. Interns of MAMC are posted in the Clinical Section of NDTB round the year whereby they are exposed regarding NTEP, DRTB management and functioning of DOTS centre. This year 173 interns were posted at NDTB between April, 20 to March, 21 and were trained/sensitized on various aspects.

Trainings/Sensitization held for Medical interns of Maulana Azad Medical College at New Delhi TB Centre (STDC) from 1st April, 2020 to 31st March 2021

S.No.	Month	No. of Participants
1	April, 20	18
2.	May, 20	24
3.	June, 20	16
4.	July, 20	23
5.	August, 20	12
6.	September, 20	20
7.	October, 20	20
8.	November, 20	20
9.	December, 20	20
	Total	173

Analysis of Quarterly Cohort Reports

Compilation and preparation of quarterly reports (Sputum Conversion, Treatment Outcome and Programme management) of all chest clinics under NTEP of Delhi state and their feedback is one of the major activities of STDC. The analysis of the quarterly report for each chest clinic in Delhi is carried out and the feedback, which includes necessary instructions for improvement is prepared and are discussed at the quarterly review meetings with the District TB Officers. All these feedbacks and complied reports of the state are sent to the DTOs and copies of these are also submitted to State TB Control Officer and to Central TB Division, Ministry of Health & Family Welfare.

District Wise Total TB Case Notification in Delhi State from 1/1/2020 to 31/12/2020

S.No	Name of Chest Clinic	TB Cases Notified from Public Sector	TB Cases notified from Private Sector
1	Bijwasan	540	946
2	BJRM Chest Clinic	1221	329
3	BSA Chest Clinic	2781	10059
4	CD Chest Clinic	1112	546
5	DDU Chest Clinic	2907	1009
6	GTB Chest Clinic	2390	748
7	Gulabi Bagh	690	121
8	Hedgewar Chest Clinic	889	337
9	Jhandewalan	415	121
10	Karawalnagar	2058	931
11	KCC	2629	692
12	LN Chest Clinic	2651	341
13	NITRD	11903	1189
14	MNCH Chest Clinic	2659	458
15	Moti Nagar	2762	1547
16	Narela	1406	481
17	NDMC	4491	291
18	Nehru Nagar	3404	1839
19	Parparganj	3714	601
20	RK Mission	595	1372
21	RTRM Chest Clinic	1160	224
22	SGM Chest Clinic	2365	204
23	Shahadara	1746	577
24	SPM Marg	814	918
25	SPMH Chest Clinic	2401	1425
	Total	59703	27306

In all a total of 87,009 cases were notified from Delhi State which includes 59,703 cases from Public sector and 27,306 from private sector from 1st January 2020 to 31st December, 2020.

Quarter wise Outcome of Registered TB cases under NTEP in Delhi State from Public and Private Sector during 2020.

Quarter Wise	Total Notified Assigned	Total Outcome	Cured	Died	Treatment Completed	Treatment Failure Changed	Treatment Regimen	Lost of Folow Up	Not Evaluated
Qt-1	25227	20025	4072	518	12367	155	324	1188	801
Qt-2	31942	26467	5689	635	17475	184	543	1419	522
Qt-3	26258	21878	4507	629	14311	132	354	1210	735
Qt-4	23547	19186	3875	632	12396	91	378	978	836
Total	106974	87556	18143	2414	56549	562	1599	4795	2894

Total of 1,06,974 cases were notified during 2020 in Delhi State and 87,556 were assigned for outcome. Out of which 85.3% were cured, 2.7% died, 1.8% treatment regimen changed.

Quarter wise Outcome of Notified TB cases under NTEP in Delhi State during 2020.

Quarter Wise	Total Notified Assigned	Total Outcome	Cured	Died	Treatment Completed	Treatment Failure Changed	Treatment Regimen	Lost of Folow Up	Not Evaluated
Qt-1	26270	21003	5049	610	12595	179	473	1294	803
Qt-2	17301	11600	2939	420	6948	81	417	701	94
Qt-3	23193	10151	2120	573	6059	80	552	712	55
Qt-4	21024	2086	231	354	711	18	414	358	0
Total	87788	44840	10339	1957	26313	358	1856	3065	952

Table shows that total 87,788 cases were notified during 2020 from Delhi State. Out of which 44,840 were outcome assigned. Out of which about 82% cured.

Outcome of Notified TB cases under NTEP in Delhi from Public and Private Sector during 2020.

Sector	Total Notified Assigned	Total Outcome	Cured	Died	Treatment Completed	Treatment Failure Changed	Treatment Regimen	Lost of Folow Up	Not Evaluated
Private	61308	34703	9727	1440	18768	262	1838	2217	451
Public	27663	10928	380	729	8593	61	202	731	232
Total	88971	45631	10107	2169	27361	323	2040	2948	683

Among total 88,971 notified cases from Delhi State during 2020, 68% were from public sector and 32% from Private Sector. 82% cases were cured from outcome assigned cases in Public Sector similar 82% cure rate was observed among private sector.

CLINICAL SECTION

OPD Services

The OPD of the Centre are having patients of TB and Respiratory diseases for diagnosis and opinion. The Centre caters to patients of TB and allied diseases referred for diagnosis and opinion from neighbouring LN Hospital, GB Pant Hospital and Guru Nanak Eye Centre. Many private practitioners and doctors of various hospitals of Delhi and neighbouring states also refer patients for expert opinion on diagnosis and treatment. In addition, visa cases from different embassies are also referred for opinion and treatment.

Although, it is an OPD within a State-level TB Centre, there is a vast influx of patients with diverse pulmonary conditions, ranging from Asthma, COPD, Pneumonia, ILD, Pulmonary hydatidosis and Malignancy, along with all cases of undiagnosed extra pulmonary TB as well. The daily OPD is fully supported by our radiology, pharmacy, medical social worker and laboratory services.

Due to COVID 19, attendance was low as patients were not physically reporting to hospital. Although, patients were followed by mail/telephonically. During 2020-21, physically 5179 patients attended the OPD of the Centre for diagnosis, treatment and follow up.

COAD Clinic

COAD (Chronic Obstructive Airways Disease) clinic is conducted daily in OPD. It provides solutions and relief to patients of airway obstruction on an OPD basis. Patients are diagnosed and periodically followed for dose adjustment. During 2020-21, total 543 patients attended for COAD.

DOT cum Microscopy Centre

One DOT cum Microscopy Centre is situated in the complex of the centre. This DOT Centre covers a population of one lakh. Here free diagnosis and treatment is provided to patients belonging to the area, according to NTEP guidelines. The doctors of the centre screen the TB suspects, advise investigations and categorize the patients suffering from TB for treatment. Patients of the DOT centre also visit our OPD for management of side effects due to intake of Anti-TB drugs. During 2020-21, total 356 patients put on DOTS at NDTB DOT Centre.

Radiological examination

There are two X ray machines in the Centre used for diagnostic purpose for patients attending clinic, for Active Case finding also and for cases screened among vulnerable populations.

In the past there was MMR Machine and Mobile X-ray Van also which were used for survey purpose. During 2020-21, total 1216 x-rays are done of those patients who attended the OPD of the Centre.

Mantoux testing

Mantoux test is done at the NDTB Centre. Apart from being referred from the OPD of NDTB Centre the patients are also referred from various government hospitals as well as treatment by private practitioners for Mantoux Screening. During 2020-21, total 850 tuberculin tests are performed in the Centre.

The following *seminars / case discussions / reviews* were conducted this year:-

CLINICAL SKILLS

1. Common pulmonary signs
2. Chronic cough
3. Haemoptysis
4. History Taking
5. Chest X-ray
6. Pulmonary function tests

TUBERCULOSIS

1. Laboratory diagnosis of TB
2. New diagnostic tests
3. TB in special conditions: diabetes, HIV & co morbidities
4. TB in special populations: children, pregnancy and elderly
5. Side-effects of ATT
6. Management of Drug Resistant TB (MDR & XDR)
7. Extra-pulmonary TB

OTHER

1. COVID-19: Clinical presentation and diagnostic tests
2. CSS in COVID
3. Mutant strains Covid-19
4. Brochiectasis

5. Pleural effusion
6. Hypersensitivity Pneumonitis
7. GINA guidelines
8. GOLD guidelines
9. Community acquired pneumonias
10. Pulmonary Rehabilitation

In addition to patient care, the clinical section has a *key role in providing hands-on training and teaching to medical and Para-medical staff*, with opportunities for professional development. In the last one year, 173 Interns and MBBS gradates of MAMC have been trained here. They attended regular teaching activities, including *11 seminars and 18 clinical case discussions, 22 Journal Reviews and 14 Case Reviews*. Hypersensitivity Pneumonitis and COVID-19 were the key focus areas for the doctors of the clinical section in this year.

All basic skills of history-taking, clinical examination, interpretation of chest X-ray, and all relevant diagnostic tests and treatment skills were imparted to them. Hands on clinical training in the field of pulmonary medicine, radiology and TB are the strong point of the OPD running at the centre. Due emphasis on history taking and correct diagnosis involving basic clinical skills and radiology along with sputum examination is followed day in and day out.

EPIDEMIOLOGICAL SECTION

Epidemiology section is involved in activities related to NTEP Programme monitoring and evaluation of Delhi state. The activities are analyzed, compiled and present in state and national level review. From this year, even PHI wise district reviews have also be started, wherein district TB level performance indicators are assessed at each PHI in district so as to find out PHI lacking in performance and sort out if an issues are there for the low performance. Details of this activity during the year are given in the monitoring and supervision section.

Planning and conducting operational research is another activity of the section. During the year, following operational research projects are undertaken by the section

1. “Active Case Finding Campaign of Tuberculosis with people who inject drugs in New Delhi, India”
2. “Effect of counseling intervention on outcome among MDR TB patients in Delhi”

Screening the workers of various organizations is also conducted by the section. During the year, 27 workers of Delhi Zoo and 101 inmates of SPYM were screened for TB at the Centre, investigated and those find confirm TB cases, were put on treatment.

NDTB CENTRE-STDC’S ECHO TB HUB

1. INTRODUCTION:

Extension for Community Health Outcomes (ECHO) endeavours to transform the public health knowledge network in India thereby impacting lives of millions of people in the country. ECHO India also partnered with the Central TB Division (CTD) under the Ministry of Health and Family Welfare, Government of India to deliver upon their request to initiate TB ECHOs across the country to support the National Tuberculosis Elimination Programme (NTEP) program and responded to that by strengthening the technological capacities of the State TB Cell (STC) and the State TB & Demonstration Centre (STCDs) by equipping them and thereafter, providing continuous support to achieve the Government of India’s (GOI) aim of eliminating TB by 2025.

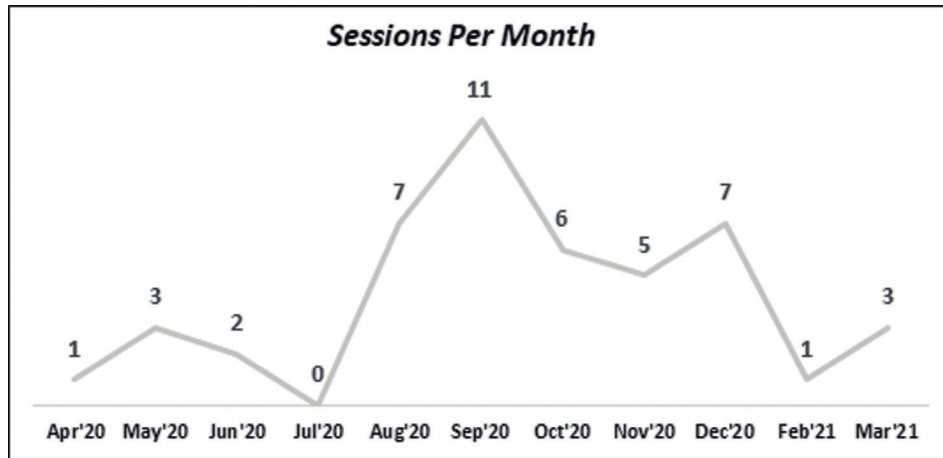
2. ECHO TB Hub at STDC Delhi:

ECHO TB Hub established at STDC in 2018 and they conducted their 1st session on 4th Jan. 2018. ECHO TB Hub supported Delhi NTEP to conduct virtual trainings, review meetings with various category of NTEP and general health care administrators / providers at State and District level using ECHO Platform. ECHO TB activities were coordinated by Director, STDC Delhi and other Technical Experts and WHO Consultants.

During the reporting period (April 2020 to March 2021), ECHO Hub conducted 46 sessions in reaching 2,599 persons from NTEP and General Health system have participated from entire Delhi state. ECHO TB Hub ensured uninterrupted connectivity between clinicians (STDC) and various

health care providers (for example: DTOs and Para-medical Staff) during COVID 19 times.

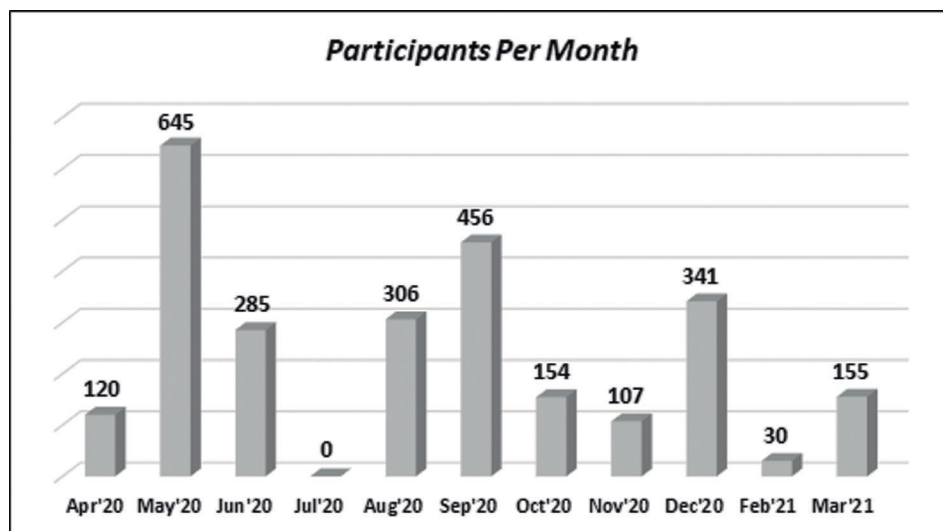
During this period, we can clearly notice that in the initial phase April'20 – July'20 the number of sessions conducted were less because of the COVID19 1st wave. But, as pandemic was not going to end, we started conducting meetings online using the ECHO platform.



The sessions/meetings were majorly on the following mentioned topics:

- Para-medical staff training during COVID19.
- Chest Clinic Reviews per week for different district.
- State PMDT NTEP Review to discuss the achievement of the state.
- Virtual sensitization workshop.
- State Task Force meetings.
- Majorly participants are from Nodal DRTB Centre, District Tb Officers, Medical officers, WHO Consultant, State TB Officer, and para-medical staff (STLS, STS, PPM Co-coordinator etc.).

These meetings/sessions chaired by Dr. K.K Chopra and Dr. Ashwani Khanna.



PUBLIC HEALTH SECTION

Public health section works with the aim to improve health of public having personnel like public health nurse, medical social worker and multipurpose health worker to accomplish the said goals. They are involved in planning of various intensified programmes on TB with specific objective to improve public health through various community based programmes. The activities of the section are as follows:

Health talk

Various tools are used to create awareness amongst masses: One of them is health talk. Health talk is about talking to individual on different issues, focusing on certain points to make them aware that how important it is for an individual to maintain good health. Keeping this thought in mind health talk on TB on regular basis is delivered on regular basis is delivered in the OPD hall. The patients are made aware about basic information on TB by using flip charts which they can see and read. During the year more than 60 students of class 9th to 12th were sensitized regarding TB diagnosis, prevention and its treatment followed with question answer session.

TB awareness

Round the year health talks are given to vulnerable groups well as general population with the help Nukkad natak/dramatics, lectures, flipcharts, painting competitions etc.

TB Supervisors course

TB supervisor course is a 3 month long course conducted by the NDTB. The Public Health section in association with clinical section is undertaking the TB Supervisor course. It is a three month duration course whereby students from various parts of the country are selected. The course covers various aspects of Tuberculosis whereby teaching, practical training, field visits and demonstrations. are an integral part of the training. The students are rotated in various departments of the Centre which include the epidemiology section, clinical section, DOTS centre and Mantoux room. They are also involved in various activities of the Centre like giving health talk to patients to build up their confidence, counselling patients etc. At the end of the course, a practical as well as a theory examination is taken and after successful completion of the course, students are awarded a TBHV completion course certificate. The course accredited by the NTEP. During the 3 months period students were sensitize about:

- Tuberculosis
- NTEP
- General aspects about TB including community based interaction

Patient Provider Meetings

Supervised treatment refers to helping patients to take their TB medication regularly and to complete TB treatment. It is also meant to ensure that the providers give proper care and are able to detect

treatment interruption. Patient provider meetings ensure that patient take : RIGHT ATT at RIGHT DOSE at RIGHT INTERVALS. TB is a public health problem and its transmission poses a risk to the community, ensuring regular intake of all the drugs by the patients is the responsibility of health staff. And care can only be achieved if patients and health staff work together. In the DOT Centre, patient provider meeting is done weekly by para medical staff.

Community Meets

The community meetings under NTEP are regularly arranged throughout the state. At NDTB also these meets are conducted on regular basis. These meetings, are mobilized by the staff of NDTB / TBHV students. On an average, about 20-30 patients on treatment/cured TB patients and their family members are present in each meeting to share their experiences regarding treatment facilities and remove any doubts regarding the treatment. Idea behind this activity is to create mass awareness regarding Tuberculosis and its treatment.

Mantoux test

Mantoux test is done at NDTB Centre. Apart from being referred from the OPD of NDTB; the patients are also referred from various government hospitals as well as by private practitioners for Mantoux screening. During the period of April 2020 to March 2021, 850 Mantoux tests were done at the NDTB Centre. Out of these; results of 753 patients were available of which 406 were reactors >10mm.

Tuberculin skin test report for the period from April 2020 to March 2021

Month	Total test	Test read	Reactors >10mm	Reactors <10mm
April,20	7	4	3	1
May,20	0	0	0	0
June.20	15	14	7	7
July,20	17	15	8	7
August,20	27	22	10	12
September,20	28	26	14	12
October,20	23	18	8	10
November,20	17	13	8	5
December,20	20	16	9	7
January.21	74	69	42	27
February,21	223	192	117	75
March,21	399	364	180	184
Total	850	753	406	347

Anti TB Week Celebration

Every year in the month of March we celebrate Anti TB week to celebrate World TB Day i.e. on 24th March, 2021. Keeping in mind the current Covid-19 scenario this year we celebrated the above said week in bit different manner between 18th March, 2021 to 25th March 2021. Due to Covid pandemic this year all the health programmes were organized at different destination by their own staff, except inaugural and valedictory function and we had provided them the facilitation how to conduct different programme to avoid inmates travelling to NDTB Centre.

Following were the programmes

- Painting competition
- Poem Competition
- Slogan Competition
- Health Talk
- Community meet

Painting Competition

Painting completion was held by the children of SPYM (Secretary for promotion for youth and masses) Male and female both inmates. They painted the painting on various aspects of TB e.g. types of TB, signs and symptoms of TB, treatment etc. Best paintings were awarded in the concluding session

Slogan Competition

Different slogans on TB was written by the female inmates of SPYM, Parda Bagh. Total 25 students participated in the competition on 22nd March, 2021. Best slogans were awarded accordingly.

Poem Competition

Poems on TB were written by inmates of SPYM (Male) Daryaganj. Best poems were awarded accordingly.

Activities carried out by New Delhi TB Centre on occasion of World TB Day celebration 2021

Date & Time	Venue	Programme	Methodology	Participants
18.3.2021	NDTBC OPD Hall and Park No. 2	Inauguration of ANTI TB Week with health talk and display play card in park as well as OPD hall	By using Flash cards the audience will be informed about the TB and its harmful effects in human body.	All patients and their relatives present in OPD Hall

19.3.2021	Hauz Qazi	Community meet	Residents of Hauz Qazi will be taught about the Tb and its harmful effects along with its precaution and treatment	Hauz Qazi resident
20.3.2021	SPYM Night shelter, Daryaganj	Painting competition	The inmates (Male) of night shelter will paint. The painting on TB	Inmates of SPYM
21.3.2021	SPYM (Women)	Painting competition	The inmates (Female) of night shelter will paint. The painting on TB	Inmates of SPYM
22.3.2021	SPYM (Women)	Slogan competition	The inmates will write slogan on TB	Inmates of SPYM
23.3.2021	SPYM MALE	Health talk SPYM night shelter Poem competition	By using flash card they will be informed about Tb and its effect on human body	Staff and inmates of SPYM
24.3.2021	Valedictory function	Prize Distribution	Staff	Lunch of all staff

Community meet

A Community meet was organized on 19th March, 2021 by the community residents trained by the staff of New Delhi Tuberculosis Centre to avoid travelling outside due to Covid 19 pandemic. The community resident had a health talk on TB where by basic information was shared by the community worker to community group.

Details of other community meets are as follows:

Date	Event
31.5.2020	On World TB Day a talk was given to TB patients who visited DOTS Centre that day and they were told the harmful effects about Tobacco.
5.6.2020	Two patients were asked to plant one tree each at their resident of nearby and asked to share photo of activity.
1.7.2020	On World Doctors Day Medical Social work had talk with TB patients and were shared TB information.
13.8.2021	Two youth patients were interacted by HV to discuss youth problem and their possible contribution to eliminate TB.
18.3.2021 to 25.3.2021	Anti TB Week Celebration 18.3.2021 to 25.3.2021

Anti TB Week celebration

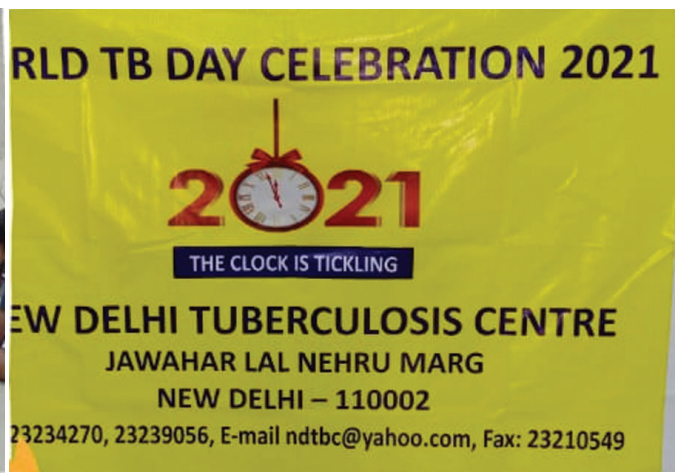


Sensitization of NGO inmates



Participation in TB awareness programme on DD News

Anti TB Week celebration



Painting and slogan competition at SPYM

MYCOBACTERIAL LABORATORY

The laboratory of New Delhi Tuberculosis Centre is certified as Intermediate Reference Laboratory for the state of Delhi by Central TB Division, Ministry of Health & Family Welfare. The laboratory is also accredited by National Accreditation Board for Testing and Calibration Laboratories (NABL), Department of Science & Technology, Government of India.

The laboratory is responsible for the overall supervision of the External Quality Assurance Activities (EQAS) of smear microscopy for the entire state. This laboratory regularly participates in annual Proficiency Testing (PT) for smear microscopy, LPA as well as culture and DST by the National Reference Laboratory, National Institute of Tuberculosis and Respiratory Diseases, New Delhi.

Laboratory is linked to 17 out of 25 National TB Elimination Program designated TB districts (also called as chest clinics) of Delhi state for diagnosis and treatment follow-up under PMDT activities. Laboratory is equipped with latest molecular diagnostic assays such as Cartridge Based Nucleic Acid Amplification Test (CBNAAT), TrueNat, Line Probe Assay (LPA) and Next Generation Sequencing on Illumina MiSeq platform. Laboratory also has automated liquid culture system (MGIT-960) to perform culture and phenotypic Drug Susceptibility testing against First and Second line Anti TB drugs.

In addition, laboratory of NDTB Centre also plays following roles:-

Trainings

The laboratory is responsible for conducting various training of laboratory staff under NTEP. This includes modular trainings on smear microscopy, quality assurance of sputum microscopy, CBNAAT and other diagnostic modalities. The laboratory also provides technical support to other C&DST labs whenever required.

Quality Assurance

The laboratory conducts onsite evaluation visits to 25 districts and reports the findings to the State TB Officer and National Reference Laboratory.

Data Collection

IRI is responsible for collection and compilation of data from districts and submit the compiled data to the concerned authorities. This includes Annexure M, Annexure G, CBNAAT indicators and various other performance indicators.

Research

The laboratory actively participates in various National and International research projects. The recent projects of importance include The STREAM trail, The Beat Trial, National DRS project. The laboratory also plays an important role in various operational research protocols approved by Delhi NTEP.

Procurement

The laboratory is helping the State NTEP in the procurement and quality assurance of laboratory chemicals and consumables.

Maintain SOPs in CDST Laboratories

Provide technical support to the other culture & DST laboratories (including CBNAAT labs) in the state or of other states when assigned.

Accreditation by NABL: How it helped the laboratory

Mycobacteriology laboratory of New Delhi TB Centre got accreditation in the field of medical testing in July, 2018. Due to accreditation the laboratory has got the following benefits:

- ❖ Reports issued from the accredited laboratory increases confidence and satisfaction of the client.
- ❖ Better control of laboratory operations as sound Quality Assurance System is in place.
- ❖ Savings in terms of time and money due to reduction or elimination of the need for retesting.

For getting accreditation, laboratory developed following work culture and documents:

- ❖ Laboratory trained two of its Microbiologist in ISO 15189:2012 and designated them Quality Manager and Technical Manager.
- ❖ Laboratory prepared nearly 30 quality system procedures, Technical SOPs and SOPs for all major equipments.
- ❖ Quality manual, Sample collection manual, Biosafety manual, safety SOPs and Directory of services were also prepared.
- ❖ Internal Audit and Management Review Meeting; as per structured plan & schedule, being conducted every year.
- ❖ Risk assessment and risk management policies have been defined and implemented where ever possible
- ❖ Reagent/ Kits acceptance testing is now being done prior to use in patient testing
- ❖ Corrective and Preventive action (CAPA) along with root cause analysis which was done before but not being documented are now being documented appropriately

Training Calendar for laboratory staff have been prepared and put in use. Competency Assessment Form used for different sections .

Role played by the laboratory in COVID-19 Pandemic

The laboratory of New Delhi Tuberculosis Centre has played a critical role in response to the current COVID-19 pandemic. In addition to providing helping hand in the testing requirements of the state, the laboratory is also a hub for distribution of Truenat and CBNAAT consumables for various laboratories engaged in COVID-19 testing. The laboratory has extended help to the state in conducting trainings and audit inspection of various Truenat laboratories in public as well as the private sector. A brief point wise description of the roles played by laboratory is given below:

- ❖ Despite having a tuberculosis diagnosis workload in excess of 100 samples per day, the laboratory offered helping hand in augmenting the COVID-19 testing capacity of the state. So far the laboratory has performed more than 1100 Truenat tests. The laboratory initially shared the sample load from central Delhi, then from GB Pant hospital and Aruna Asif Ali hospital.
- ❖ In order to strengthen the testing capacity of the state, the laboratory is helping the state in conducting trainings of Truenat and CBNAAT laboratories in public as well the private sector. These training in addition to providing technical training also cover various bio safety and bio security related issues. The laboratory is actively involved in helping the state in performing audit inspection of new Truenat facilities in public and private sector. So far the laboratory has trained 16 batches and more than 22 Truenat laboratories have been audited.
- ❖ The laboratory is a central hub for the distribution of Xpert SARS CoV-2 cartridges and Truenat cartridges and consumables supplied by the Central to various sites across Delhi. All the related inventory management is being done by the laboratory.

As per the direction issued by GOI through D.O. No Z-28015/192/2020-TB dated August 11th, 2020 regarding convergence in efforts for surveillance and case finding for COVID-19 and Tuberculosis, the laboratory as a part of Bi-directional TB-COVID testing is performing GeneXpert for TB diagnosis among ILI/SARI (Influenza like illness/ Serious acute respiratory illness) cases admitted in Lok Nayak Hospital.

Table : Microscopic activities under NTEP (2020-2021) of Delhi state

District	No. of Adult OPD	No. of Presumptive TB examined for diagnosis	No. of Presumptive TB found positive	No. of Presumptive TB under-going repeat	No. of TB Presumptive TB found positive on repeat	Nos.of follow-up patients examined	Nos. of Follow-up patients found to be positive	Total No. of Positive and negative slides examined
BJRM	158949	1726	148	1	0	1800	2	5035
GTBH	142710	3609	526	0	0	1767	60	8968
HEDGEWAR	74780	1170	166	0	0	731	10	3023
KCC	84110	2109	259	3	1	1417	19	5635
LNH	49679	2502	243	0	0	459	22	5508
JHANDEWALAN	16081	680	137	0	0	678	32	3027
S.P.M.MARG, PILI KOTHI	71767	835	183	0	0	542	17	2273
R.K. MISSION	19962	1207	206	0	0	826	23	3238
NEHRU NAGAR	207913	7236	1206	0	0	4847	197	19091
MOTI NAGAR	345302	5748	899	1	0	3015	99	14496
R. T.R.MHOSPITAL	64970	3327	464	0	0	1412	91	8015
NARELA CHEST CLINIC	65036	3437	735	0	0	2023	147	8677
KARAWAL NAGAR	0	3259	629	1	0	2459	57	9069
NDMC CHEST CLINIC	258190	3756	610	1	0	2334	82	10028
BSA	116963	3072	509	11	1	2083	69	8209
DDUH	274621	6684	1058	11	1	3564	124	16836

GULABIBAGH	87858	1326	200	0	0	0	606	17	3196
SANJAY GANDHI	21610	3273	473	0	0	0	2053	38	8447
C.C.J.P.C Hospital Shastri Park	121946	2710	475	0	0	0	2506	30	7937
CH.DESRAJ	166483	2369	370	0	0	0	1443	42	6173
MALVIYA NAGAR	192237	3595	348	0	0	0	2347	220	9567
NITRD	288700	6270	823	0	0	0	2096	78	14604
SHAHDARA	134660	2903	419	75	3	0	1818	68	7638
BIJWASAN	94771	1465	189	0	0	0	1317	102	4255
PATPARGANJ (TU1)	214419	5053	1180	11	3	0	3400	192	13529
	3273717	79321	12455	115	9	0	47543	1838	206474

During the year, a total of 79,321 presumptive TB were examined for diagnosis in all 25 chest clinics of Delhi state out of which 12,455 were found positive. As per data received from TB laboratory abstract 2,06,474 slides were examined.

On-site Evaluation of Designated Microscopic Centres

Because of Covid-19 pandemic, visits for On-site evaluation (OSE) and Panel Testing could not be performed. To ensure the quality microscopic services, a questionnaire based assessment of the districts laboratories was done by virtual mode. An extensive performa to collect all the details of stocks, procedures and records was designed by our team and circulated to districts before evaluation on virtual mode.

On the date of virtual evaluation, parameters filled in the questionnaire were reviewed and discussed with the district staff and suggestions for improving performance were given by the IRL teams.

List of DTCs evaluated by IRL Team

Sr. No.	Chest Clinic	Review date
1.	R.K. Mission Chest Clinic	25/11/2020
2.	Patparganj Chest clinic	26/11/2020
3.	Bijwasan Chest Clinic	26/11/2020
4.	GTBH Chest Clinic	26/11/2020
5.	NDMC Chest Clinic	26/11/2020
6.	DDU Chest Clinic	26/11/2020
7.	BSA Chest Clinic	27/11/2020
8.	Ch. Deshraj Chest Clinic	27/11/2020
9.	Hedgewar Chest Clinic	27/11/2020
10.	Malviya Nagar Chest Clinic	27/11/2020
11.	RTRM Chest Clinic	28/11/2020
12.	Kingsway Camp Chest Clinic	01/12/2020
13.	LNH Chest Clinic	01/12/2020
14.	Shastri Park Chest Clinic	01/12/2020
15.	Shahdara Chest Clinic	02/12/2020
16.	Moti Nagar Chest Clinic	03/12/2020
17.	Nehru Nagar Chest Clinic	02/12/2020
18.	Karawal Nagar Chest Clinic	04/12/2020
19.	NITRD Chest Clinic	04/12/2020
20.	Gulabi Bagh Chest Clinic	04/12/2020
21.	SGMH Chest Clinic	04/12/2020
22.	BJRM Chest Clinic	11/12/2020
23.	Jhandewalan Chest Clinic	11/12/2020
24.	Narela Chest Clinic	11/12/2020
25.	Pilikothi Chest Clinic	11/12/2020

Programmatic Management of Drug Resistant Tuberculosis (PMDT) Activities

The laboratory got certification by Central TB Division for Line Probe Assay, solid and liquid culture and DST. Currently sputum samples received from 17 chest clinics for diagnosis and follow-up under PMDT activities in Delhi.

PMDT activities carried out during the year April 2020– March 2021

(Specimens processed on culture or DST)

Q.2 2019 to Q 1 2020	FL-LPA performed						SL-LPA performed				
	Specimen inoculated for culture	FL-LPA DST done	H+R resistance not detected	H+R Resistance detected	H only Resistance detected	R only Resistance detected	SL-LPA DST done	FLQ + SLI resistance not detected	FLQ+SLI resistance detected	FLQ only Res Detected	SLI only Resistance detected
Q 2	3,313	1308	1120	97	83	4	183	113	2	65	3
Q 3	4,824	2231	1870	177	154	7	385	248	11	102	1
Q 4	4,456	1975	1666	150	140	16	281	199	4	77	1
Q 1	5077	2259	1905	158	151	20	299	196	8	87	0
Total	17670	7773	6561	582	528	47	1148	756	25	331	5

The table provides details of laboratory tests done under PMDT activities during the year 2020-21. A total of 17670 sputum specimens were processed, out of which 582 cases turned out to be MDR-TB and 47 cases were Rifampicin mono resistant.

Microbiologists of NDTB Centre are members of State Core Committee for Truenat / CBNAAT and Abbott IDNOW testing for diagnosis of Covid-19. As a part of the activities, microbiologist from our Centre along with other members visit laboratories in public as well as private sector, who intend to start Covid-19 diagnosis using NAAT for initial assessment and subsequent approval. Following laboratory have been visited so far:-

COVID Lab Audit Inspection Visits (2020 – 2021)

S. No.	Name of the site	Inspection Date
1	Department Of Microbiology, Lady Hardinge Medical College, Connaught Place, New Delhi, Delhi 110001	26.05.2020
2	Department Of Microbiology, VMMC And Safdarjung Hospital, Ring Road, Safdarjung West, Safdarjung Campus, Ansari Nagar East, New Delhi, Delhi 110029	01.06.2020
3	Department Of Microbiology, Northern Railways Hospital, Sri Aurobindo Marg, Ansari Nagar, Ansari Nagar East, New Delhi, Delhi 110029	02.06.2020
4	Department Of Microbiology, UCMS Gate No:2, Tahirpur Rd, Gtb Enclave, Dilshad Garden, New Delhi, Delhi 110095	03.06.2020
5	New Delhi TB Training STDC, Jawaharlal Nehru Marg, LNJP Colony, Raj Ghat, New Delhi, Delhi 110002	17.06.2020
6	Department Of Microbiology, ABVIMS & Dr RMLH, Type III, President's Estate, New Delhi, Delhi 110001	22.06.2020
7	Department Of Microbiology, AIIMS, Sri Aurobindo Marg, Ansari Nagar, Ansari Nagar East, New Delhi, Delhi 110029	26.06.2020
8	GB Pant Hospital, 1, Jawaharlal Nehru Marg, 64 Khamba, Raj Ghat, New Delhi, Delhi 110002	29.06.2020
9	Ganesh Path Labs, A Block Rd, Pocket 1, Sector 8, Rohini, New Delhi, Delhi 110085	11.07.2020
10	City Xray And Scan Centre, 5a, 34, Najafgarh Rd, Block 5b, Tilak Nagar, New Delhi, Delhi 110018	15.07.2020
11	Aakash Healthcare: Super Speciality Hospital -Hospital Plot, Rd Number 201, Dwarka Sector-3, New Delhi, Delhi 110075	28.07.2020

12	Dr. P Bhasin Path Lab, S-13, Greater Kailash 1 Rd, Opp. M Block, Greater Kailash-1, Block S, Greater Kailash I, Market, New Delhi, Delhi 110048	04.08.2020
13	Mata Chanan Devi Hospital, C1, Lal Sai Mandir Marg, Block C1, Janakpuri, New Delhi, Delhi 110058	04.08.2020
14	Dharamshila Narayana Superspeciality Hospital, Delhi Metro Station, Dharamshila Marg, Vasundhara Enclave Near Ashok Nagar, Dallupura, New Delhi, Delhi 110096	18.08.2020
15	Indian Spinal Injuries Centre (Isic), Vasant Kunj Marg, Opp Vasant Valley School, Iaa Colony, Sector C, Vasant Kunj, New Delhi, Delhi 110070	27.08.2020
16	Dr. Lalchandani Lab, 19 C, Club Rd, West Punjabi Bagh, Punjabi Bagh, New Delhi, Delhi 110026	11.09.2020
17	Nir Amayan Address: B-4 Surya Enclave, New Multan Nagar Opposite Metro Pillar No 233 on New Rothak Road, Paschim Vihar, New Delhi, Delhi 110056	21.09.2020
18	Dr. Seth's Path Lab, At Divya Prastha Hospital, RZ- Raj Nagar-1, Palam colony, New Delhi -110045	06.10.2020
19	Saral Diagnostic , 2&3 Shakti Vihar Pitampura , New Delhi 110034	13.10.2020
20	Saini Diagnostics.460 B/IA street no 11.vishwas Nagar Delhi 110032	02.11.2020
21	Rajiv Gandhi Super Speciality Hospital(RGSSH) Taharpur Rd, Taharpur, Taharpur Village, Dilshad Garden, New Delhi, Delhi 110093	18.12.2020
22	Naval Medical Centre, INS , Teen Murti Marg, Thyagraj Marg Area, Teen Murti Marg Area, New Delhi	21.12.2020
23	Sir Ganga Ram Hospital, Sarhadi Gandhi Marg, Old Rajinder Nagar, New Delhi 110060	11-01-2021

24	Goyal MRI and Diagnostic centre, B-1/12 block, B 1, Safdarjung Enclave, New Delhi, Delhi 110029	13.01.2021
25	Army Hospital Research And Referral, Near, Military Hospital Road, Subroto Park, Dhaula Kuan, New Delhi, Delhi 110010	02-02-2021
26	Air Force Centre for Medical Establishment, Shiv Marg, Subroto Park, New Delhi, Delhi 110010	02.02.2021
27	Base Hospital , Mahatma Gandhi Marg, Kirby Place, Delhi Cantonment, New Delhi, Delhi 110010	05-02-2021
28	Noble Diagnosis, Wz-409c, Opposite D D U Hospital Main Gate, Shaheed Mangal Pandey Marg, Janak Park, Pocket 408, Hari Nagar , New Delhi 110064	10.02.2021
29	Batra Hospital, 1, Mehrauli - Badarpur Rd, Tughlakabad Institutional Area, Vayusenabad, New Delhi, Delhi 110062	17-02-2021
30	Lab Microcare Diagnostic India Private Limited , A1 Shiv Park School Road, Khanpur, New Delhi (P)	17.02.2021
31	Doctors Diagnosis, 1441-A, Ward No-5 Opp. Primary Health Centre, Najafgarh, New Delhi, Delhi 110043	19.02.2021
32	Department Of Microbiology, AIIMS, Sri Aurobindo Marg, Ansari Nagar, Ansari Nagar East, New Delhi, Delhi 110029	23-02-2021
33	Venkatshwar Hospital, Sector 18, Sector 18a Dwarka, New Delhi, Delhi 110075	01-03-2021

Virtual Meetings & sensitizations during pandemic period

You are viewing Dr Aman Gupta WHO NTEP's screen View Options

DR TB reporting

Case finding report
DRTB notification - Test result of CBNAAT, Truenat, LPA, DST, probable MDR (paediatric/H mono)

Case holding report
Treatment initiation - Type of regimen

Interim report
4th month smear - Shorter MDR TB & H mono/poly
6th month culture - all other regimen

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KKC

STDC DELHI

Dr. B. S. Sinha

Dr. V.A. Chaudhary

Dr. M. DAS CCSOMH

Dr. Deep Mani

Dr. Ajaywan Khanna

Dr. Rupak Singla,...

Dr. Ashok Kumar CTO DDU CC

Neeta Singla

Dr. Khalid NTEP

Kamk Choudhary

DTO Jhandewalan

DTO Chest Clinic Ejezlan

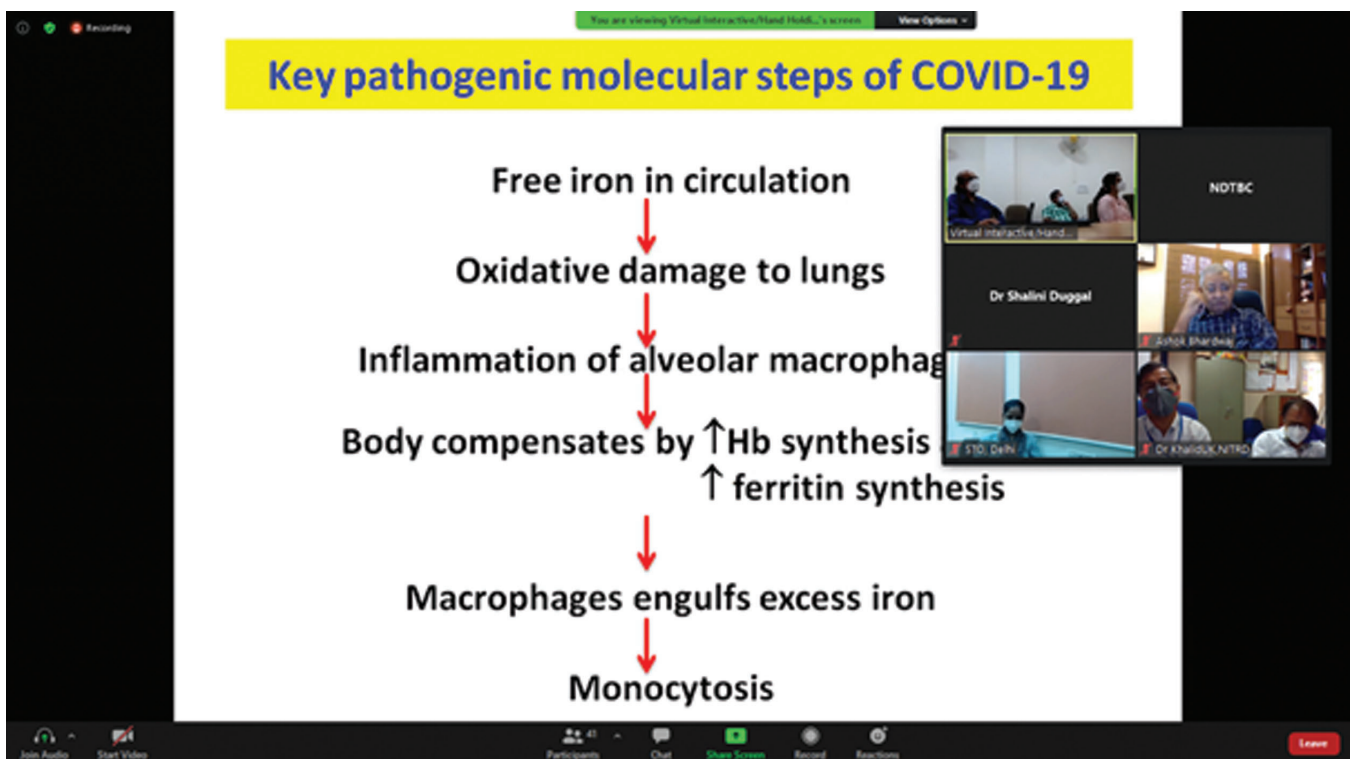
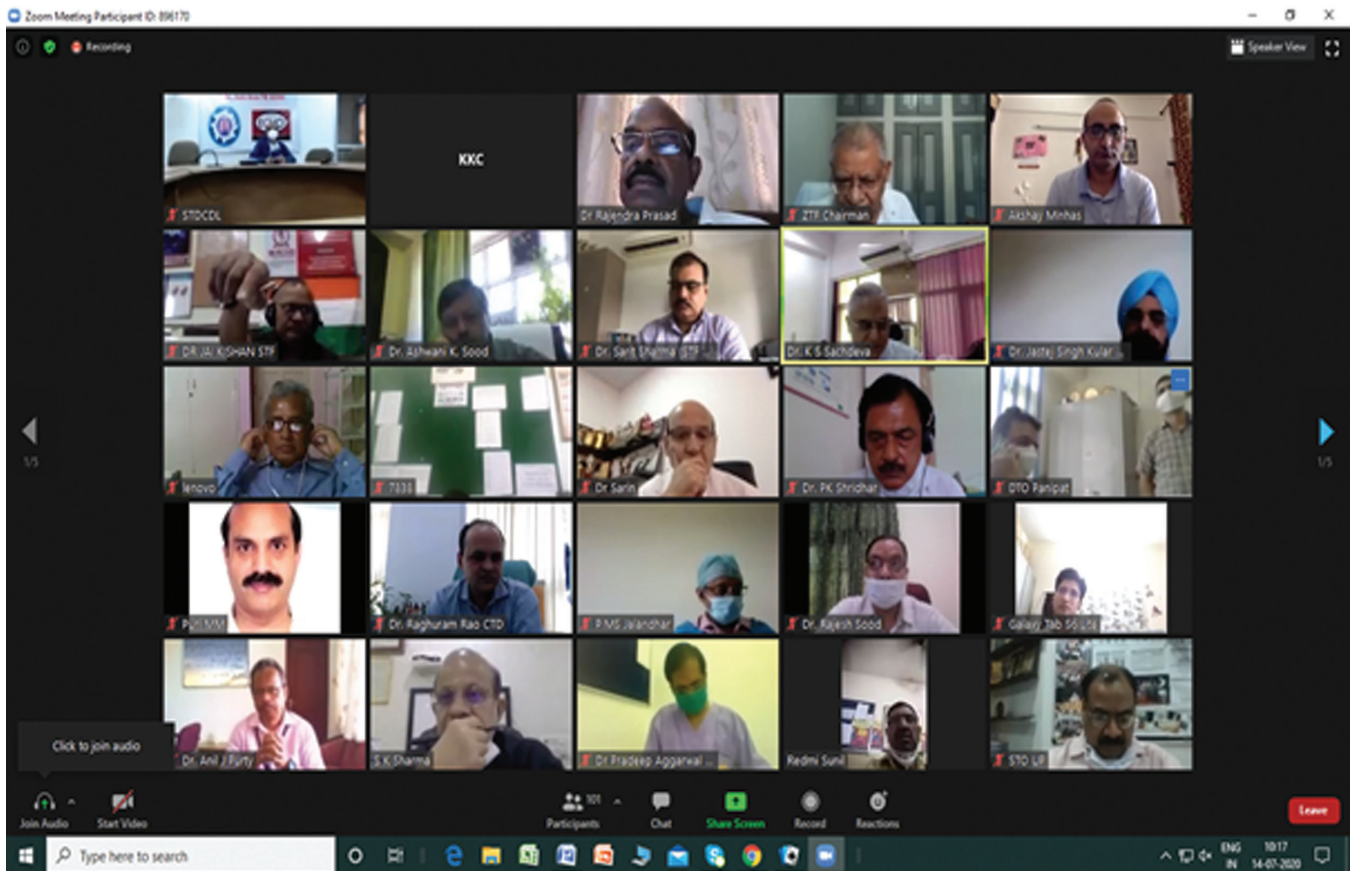
Dr. Mamta Patraik, DTO Nebh...

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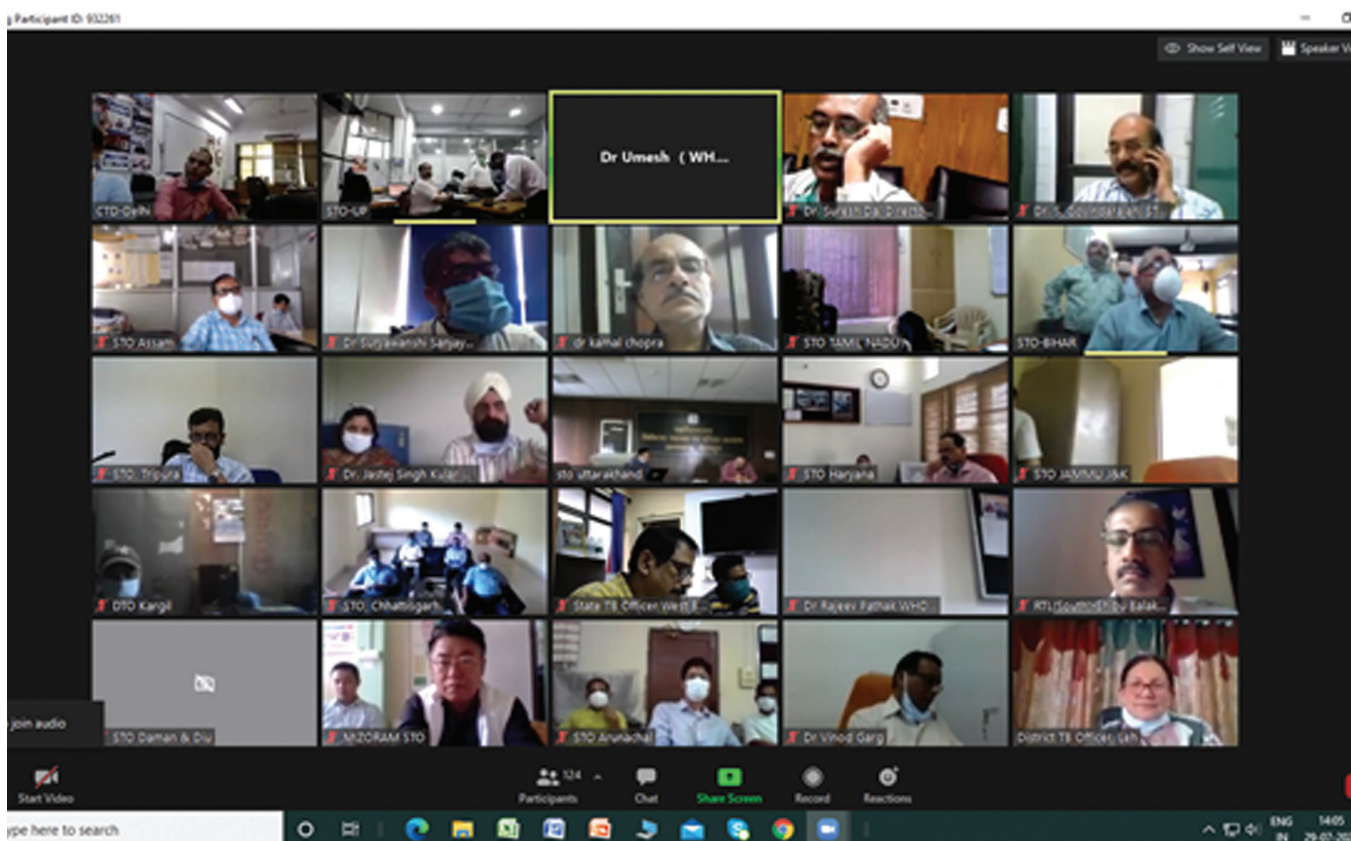
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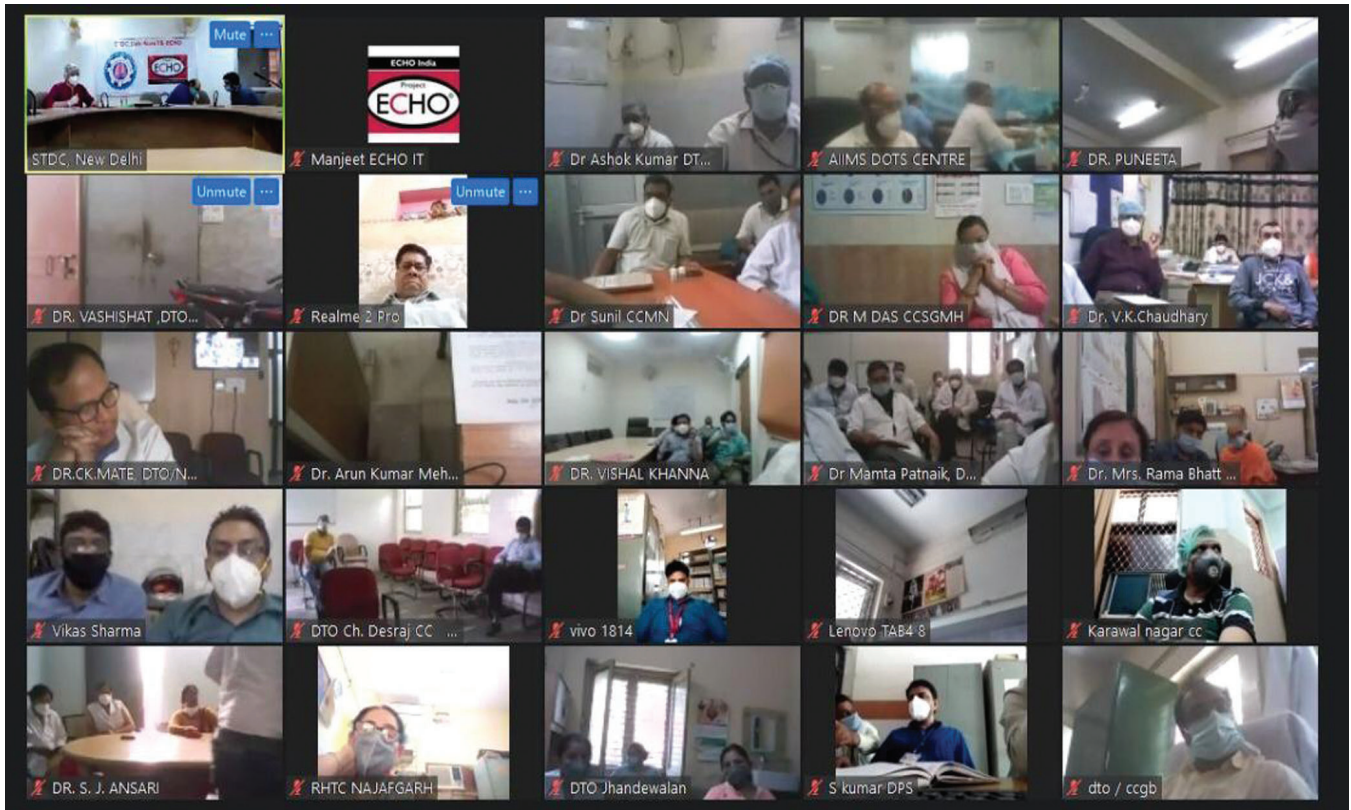
Virtual Meetings & sensitizations during pandemic period



Virtual Meetings & sensitizations during pandemic period



Virtual Meetings & sensitizations during pandemic period



SUPERVISORY ACTIVITIES

Monitoring and evaluation is an important tool for NTEP. As State TB Training & Demonstration Centre (STDC), the faculty of the Centre is actively involved in monitoring and supervision of the TB control programme at national and state level. This year due to Covid-19 all the supervisory visits were made virtually.

State Internal Evaluation

The internal evaluation of all the chest clinics is an important activity under the NTEP where in all aspects of the clinic records, staff, drug stores, microscopic activities, facilities and financial aspects are evaluated in detail. Internal evaluation is organized by State TB Control Department. Director of STDC or his nominee is the member of internal evaluation team for all the chest clinics of Delhi. This year due to Covid-19 pandemic the internal evaluation could not be conducted physically but with the ECHO platform in collaboration with State TB cell evaluations were conducted virtually.

Supervisory activities

During the year 2020-21, the following monitoring activities were made on the virtual platform with the help of State TB Cell who gave their inputs to the concerned districts to improve programme performance under NTEP:

Date of Monitoring activities	District Chest Clinics
17/8/2020	Gulabi Bagh Chest Clinic
24/8/2020	SPM Pili Kothi Chest Clinic
28/8/2020	NITRD Chest Clinic
31/8/2020	Shahdara Chest Clinic
4/9/2020	Lok Nayak Chest Clinic
7/9/2020	NDMC Chest Clinic
11/9/2020	RKM Chest Clini

14/9/2020	Malviya Nagar Chest Clinic
21/9/2020	SGM Chest Clinic
25/9/2020	Parparganj Chest Clinic
5/10/2020	RTRM Chest Clinic
9/10/2020	Ch. Desraj Chest Clinic
13/10/2020	Jhandewalan Chest Clinic
16/10/2020	BJRM Chest Clinic
19/10/2020	Bijwasan Chest Clinic
20/10/2020	SPM Hospital & Chest Clinic
21/10/2020	NITRD Chest Clinic
22/10/2020	DDU Hospital Chest Clinic
26/10/2020	Hedgewar Chest Clinic
27/10/2020	Kingsway Camp Chest Clinic
28/10/2020	Nehru Nagar Chest Clinic
29/10/2020	Malviya Nagar Chest Clinic
27/11/2020	JPC Hospital & Chest Clinic



PHI review of NTEP activities



Virtual IRL review of Chest Clinics

LIBRARY AND INFORMATION SERVICES

The website of New Delhi TB Centre (www.ndtbc.com) has information about various facilities and activities undertaken by the Centre along with list of publications from the institute. The Centre maintains a library which has 668 books on various aspects related to tuberculosis and chest diseases. In addition, it has various National and International journals. The library renders its services to the students of MAMC and V.P.Chest Institute as well as the faculty of the Centre.

ADMINISTRATION

The Administrative Section is backbone for all the working of NDTB Centre. The department has two major activities i.e. Establishment and Accounts. The section look after all the matters related to the staff and deals with the issues pertaining to staff of the Centre. The section caters to the administrative matters and look after service matters pertaining to the staff like framing of recruitment rules, promotions of staff, holding meetings etc. One of the major activities of the section is to maintain the building of NDTB Centre. For smooth running of the Centre, the Section deals with the Ministry of Health & Family Welfare for budget and annual grant.

That Ministry of Health & FW has formulated a panel of experts for peer review of New Delhi Tuberculosis (NDTBC), New Delhi, an autonomous Institute under Ministry of Health and Family Welfare (MOHFW). The committee visited the Centre from 21st to 24th December 2020 and reviewed in detail the activities and history of NDTB Centre since its inception in 1940.

(A) VISITORS TO NDTB CENTRE

1. Global Fund team visited IRL laboratory of NDTB Centre on 3rd September 2020 to inspect Truenat facility of NDTB Centre.
2. A team from NRL (NITRD) made a OSE visit to the laboratory of NDTB Centre on 28th December 2020 wherein they have inspected the site and discussed the operational and technical problems.



Peer Review of NDTB Centre by National Expert Team



International visitors team in discussion with Director

(B) GRANTS

- i. During the year 2020-21, the Government of India, Ministry of Health & Family Welfare released the annual recurring Grant-in-aid (Salaries) of Rs. 442 Lacs and grant-in-aid (General) of Rs. 70 Lacs.
- ii. Rs.10000/- was provided by Tuberculosis Association of India as annual grant.
- iii Interest on saving bank and FDR account Rs. 65477/-.

RIGHT TO INFORMATION ACT 2005

During 2020-21, 7 applications have been received under RTI Act, 2005. The table gives the details of applications received and disposed.

S. No.	Month & Year	RTI Applications			Appeal			Amount of Fee Paid
		No. of RTI applications received	No. of RTI applications disposal	In Process	No. of Appeals received	No. of Appeals disposal	In Process	
1	April-20	1	1	-	-	-	-	-
2	May-20	-	-	-	-	-	-	-
3	June-20	-	-	-	-	-	-	-
4	July-20	1	1	-	-	-	-	-
5	August-20	1	1	-	-	-	-	-
6	Sept-20	1	1	-	-	-	-	-
7	Oct-20	-	-	-	-	-	-	-
8	Nov-20	-	-	-	-	-	-	-
9	Dec-20	-	-	-	-	-	-	-
10.	Jan-21	1	1	-	-	-	-	-
11.	Feb-21	1	1	-	-	-	-	-
12.	March-21	1	1	-	-	-	-	-
Total	2020-2021	7	7	-	-	-	-	-

SUMMARY OF ACTIVITIES OF NEW DELHI TB CENTRE

An insight statistics of annual activities of the Centre during 2020-2021 are as follows:

Total patients attended New Delhi TB Centre	24100
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Outpatient attendance in Clinic :

New outpatients attendance	2432
Revisits	2204
COAD Clinic	543
DOTS Centre	356
Total outpatients attendance in Clinic	5535

Outpatient attendance in Laboratory :

New Cases for diagnosis	12683
Follow up cases	5882
Total attendance in Laboratory	18565

DOT Centre Attendance

New Patients put on DOTS at NDTB DOT Centre	19
Total Patients (2020-21) put on DOTS at NDTB DOT Centre	356

Tuberculin skin tests :

Total Tuberculin skin tests done	850
Tests read	753
Reactors (>10mm)	406
Non-reactors (<10mm)	347

Radiological Examinations :

Examinations	1216
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Laboratory Examinations done :

1	Total laboratory examinations	52,294
2	Smear examinations	18,773
3	Culture examinations	15,786
4	Drug susceptibility test	16,173
	a. By Line Probe Assay	14,400
	· First Line Drugs	12,463
	· Second Line Drugs	1,937
	b. By liquid culture (MGIT)	1773
	· First Line Drugs	49
	· Second Line Drugs	1724
5	CBNAAT Examination	783
6	TRUENAT for COVID-19	779

Trainings

Trainings held for Delhi state NTEP personnel	2295
Miscellaneous Trainings (other than Delhi state NTEP personnel)	1101
Trainings for private practitioners	124
Total Trainings held During 2020-21	3520

Supervision/IRL Visits/Publications

Supervision and Monitoring /Internal Evaluation of Chest Clinics	23
IRL Visits to chest clinics for EQA	25
Research and Publications	23

THAKUR, VAIDYANATH AIYAR & CO.
Chartered Accountants
New Delhi, Mumbai, Kolkata, Chennai
Patna and Chandigarh

221-223, Deen Dayal Marg, New Delhi-02
Phones : 91 - 11-23236958-60, 23237772
Fax : 91 - 11-23230831
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: tvande@rediffmail.com

Independent Auditor's Report

To the Members of

New Delhi Tuberculosis Center,

Report on the Financial Statements

Opinion

We have audited the accompanying financial statements of **New Delhi Tuberculosis Centre** which comprise the Balance Sheet as at March 31, 2021, the Statement of Income and Expenditure and Receipts & Payments for the year then ended, and a summary of Significant Accounting Policies and Other Explanatory Information.

In our opinion and to the best of our information and according to the explanations given to us, the accompanying financial statements of the Center, read together with Accounting Policies and other explanatory information (note no. 19) have been prepared in accordance with the applicable Laws, in the manner so required and give a true and fair view in conformity with the other accounting principles generally accepted in India, of the state of affairs of the Centre as at March 31st, 2021 and its deficit for the year ended on that date.

Basis for Opinion

We conducted our audit in accordance with the Standards on Auditing (SAs). Our responsibilities under those Standards are further described in the Auditor's Responsibilities for the Audit of the Financial Statements section of our report. We are independent of the organization in accordance with the Code of Ethics issued by the Institute of Chartered Accountants of India together with the ethical requirements that are relevant to our audit of the financial statements under the provisions of the Act, and we have fulfilled our other ethical responsibilities in accordance with these requirements and the Code of Ethics. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation of these financial statements that give a true and fair view of the financial position and financial performance of the Centre in accordance with the Accounting Standards, to the extent applicable, issued by the Institute of Chartered Accountants of India. This

responsibility includes the design, implementation and maintenance of internal control relevant to the preparation and presentations of the financial statements that gives a true and fair view and are free from material misstatement, whether due to fraud or error.

Auditor's Responsibilities for the Audit of the Financial Statements

Our responsibility is to express an opinion on these financial statements based on our audit. We conducted our audit in accordance with the Standards on Auditing issued by the Institute of Chartered Accountants of India. Those Standards require that we comply with ethical requirements and plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the Centre in preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate, but not for the purpose of expressing an opinion on the effectiveness of the Entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of the accounting estimates made by management, as well as evaluating the overall presentation of the financial statements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Report on Other Legal and Regulatory Requirements

- a) We have obtained all the information and explanations which to the best of our knowledge and belief were necessary for the purpose of our audit;
- b) In our opinion, proper books of account as required by law have been kept by the Centre so far as appears from our examination of those books;
- c) The Balance Sheet , Statement of Income and Expenditure and Receipts and Payments dealt with by this Report are in agreement with the books of account;
- d) In our opinion, the Balance Sheet, Statement of Income and Expenditure and Receipts & Payments comply with the Accounting Standards, to the extant applicable, issued by the Institute of Chartered Accountants of India.

For Thakur,Vaidyanath Aiyar & Co.
Chartered Accountants
FRN: 000038N

(Anil K. Thakur)
Partner
M. No. : 088722

Place: New Delhi
Date : 11.10.2021

**NEW DELHI TUBERCULOSIS CENTRE
BALANCE SHEET AS AT 31ST MARCH, 2021**

	Schedule	As at 31.03.2021	As at 31.03.2020
		(Rs.)	(Rs.)
<u>SOURCES OF FUNDS:</u>			
Assets Fund	1	25,96,097	28,44,285
Earmarked Funds	2	12,22,961	11,61,224
Unspend Project Fund	3	8,81,832	12,69,663
Current Liabilities and Provisions	4	1,14,95,198	1,05,49,700
Accumulated Deficit / Surplus		5,35,637	12,79,882
Total		1,67,31,725	1,71,04,754
<u>APPLICATION OF FUNDS:</u>			
Fixed Assets	5	25,96,097	28,44,285
Investment	6	59,65,000	42,50,000
Current Assets, Loans & Advances:	7		
- Stock and Stores and receivables		5,73,449	2,70,377
- Cash and Bank balances		72,98,809	94,94,348
TDS recoverable		2,98,370	2,45,744
Total		1,67,31,725	1,71,04,754
Accounting Policies and Notes to the accounts	19		

Schedule Nos.1 to 18 form an integral part of the Accounts

As per our report of even date attached
For Thakur Vaidyanath Aiyar & Co.
Chartered Accountants
FRN: 000038N

Admn. Officer
(S.K. Saini)

Director
(Dr. K.K.Chopra)

(Anil K. Thakur)
Partner
M. No. 088722

Financial Adviser
(Dr. V.K. Arora)

Place : New Delhi
Date : 11.10.2021

NEW DELHI TUBERCULOSIS CENTRE
STATEMENT OF INCOME AND EXPENDITURE FOR THE YEAR ENDED 31ST MARCH 2021

	Schedule	For the year 2020-21	For the year 2019-20
		(Rs.)	(Rs.)
<u>INCOME</u>			
Recurring Grant from Govt.of India :			
Grant-in-aid Salaries		4,42,00,000	4,75,00,000
Grant-in-aid General		70,00,000	70,00,000
Maintenance Grants from TAI		10,000	10,000
Fees from Patients	8	42,740	1,56,860
Misc. Receipts:			
- Other receipts		4,023	4,32,676
Total		<u>5,12,56,763</u>	<u>5,50,99,536</u>
<u>EXPENDITURE</u>			
Salary & Other Staff expenditure	9	4,36,17,987	4,71,55,910
Administrative Expenses	10	77,58,127	59,21,970
Expenses on X-Ray Films, Drugs & Medicines and Lab. Consumable	11	6,24,894	4,87,639
Total		<u>5,20,01,008</u>	<u>5,35,65,519</u>
(Deficit)/Surplus for the year		(7,44,245)	15,34,017
Less / (Add) : Balance as per last account		12,79,882	(2,54,135)
		<u>5,35,637</u>	<u>12,79,882</u>

Accounting Policies and Notes to the Accounts 19

Schedule Nos.1 to 18 form an integral part of the Accounts

As per our report of even date attached

For Thakur Vaidyanath Aiyar & Co.
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(Anil K. Thakur)
Partner
M. No. 088722

Financial Adviser
(Dr. V.K. Arora)

Place : New Delhi

Date : 11.10.2021

NEW DELHI TUBERCULOSIS CENTRE
RECEIPTS & PAYMENTS ACCOUNT FOR THE YEAR ENDED MARCH 31, 2021

	Schedule	For the year 2020-21	For the year 2019-20
		(Rs.)	(Rs.)
<u>RECEIPTS</u>			
Opening Cash & Bank Balances	7	94,94,348	1,12,00,500
Opening Investment (FDR)	6	42,50,000	
Grants :			
Recurring Grant-in Aid from Govt. of India			
- Grant-in-aid Salaries		4,42,00,000	4,75,00,000
- Grant-in-aid General		70,00,000	70,00,000
Maintenance Grants from TAI		10,000	-
Fee from Patients	8	42,740	1,53,700
Receipts from TAI	12	1,31,35,886	43,41,500
Other Receipts	13	6,65,604	20,04,364
Total		<u>7,87,98,578</u>	<u>7,22,00,064</u>
<u>PAYMENTS</u>			
Staff Expenditure	14	4,27,85,754	4,53,11,088
Administrative expenses	15	81,65,470	55,13,955
X-Ray films, Drugs and Med. & Lab. Consumables	16	6,70,891	5,13,076
Payments from TAI Fund	17	1,31,35,886	43,41,500
Other Payments	18	7,76,768	27,76,097
Investment purchased	6	59,65,000	42,50,000
Closing Cash & Bank Balances	7	72,98,809	94,94,348
Total		<u>7,87,98,578</u>	<u>7,22,00,064</u>

Policies and Notes to the Accounts **19**
Schedule Nos.1 to 18 form an integral part of the Accounts

As per our report of even date attached

For Thakur Vaidyanath Aiyar & Co.
Chartered Accountants
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(Anil K. Thakur)
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(Dr. V.K. Arora)

Director
(Dr. K.K.Chopra)

Place : New Delhi
Date : 11.10.2021

NEW DELHI TUBERCULOSIS CENTRE

Schedule- 1

ASSETS FUND

	As at 31.03.21	As at 31.03.20
	(Rs.)	(Rs.)
Balance as Per last A/c	28,44,285	29,77,034
Add : Additions during the year for Cost of Assets Acquired (refer Schedule - 5)	1,01,760	2,19,772
	<u>29,46,045</u>	<u>31,96,806</u>
Less:		
Disposals during the year	-	-
Depreciation for the year (refer Schedule - 5)	3,49,948	3,52,521
Total	<u>25,96,097</u>	<u>28,44,285</u>

	Unutilised Balance as on 01.04.20	Received / Transferred during the year	Interest	Total	Utilised during the year	Unutilised Balance as on 31.03.21
	(Rs.)	(Rs.)	(Rs.)	(Rs.)	(Rs.)	(Rs.)

Schedule - 2

EARMARKED FUND

General Donations	3,97,005	-	65,477	4,62,482	-	4,62,482
Auditorium fund	1,008	-	-	1,008	-	1,008
For Medicines	1,91,622	12,240	-	2,03,862	17,560	1,86,302
Staff Welfare Fund	83,899	-	2,580	86,479	1,000	85,479
Research Fund	4,87,690	-	-	4,87,690	-	4,87,690
Total	<u>11,61,224</u>	<u>12,240</u>	<u>68,057</u>	<u>12,41,521</u>	<u>18,560</u>	<u>12,22,961</u>

NEW DELHI TUBERCULOSIS CENTRE

	As at 31.03.21	As at 31.03.20
	<u>(Rs.)</u>	<u>(Rs.)</u>
<u>Schedule- 3</u>		
Unspent Project Fund:		
Project Fund -Framework of TB care in prison	-	1,19,064
Project Fund-Active Case Finding Campaign	-	94416
Project Fund-Mapping of anti Mycobacterial drugs	145000	225000
Project Fund- Effect of Counselling	-	69383
Project NTM Diseases	736832	761800
	<u>8,81,832</u>	<u>12,69,663</u>

Schedule- 4

Current Liabilities & Provisions

Salary & Allowances	36,90,854	35,83,449
Other Payable	31,913	38,638
Sundry Creditors	5,288	4,67,619
Provision for Contribution to Gratuity Fund	7,76,000	18,31,000
Security Deposit/ Earnest Money	2,49,444	1,57,693
Training under RNTCP	58,109	98574
Gratuity fund	63,45,762	4349127
NABL surveillance fees	-	23600
Interest on Recurring Grant -in-aid	3,37,828	0
Total	<u>1,14,95,198</u>	<u>1,05,49,700</u>

NEW DELHI TUBERCULOSIS CENTRE

Schedule - 5

Fixed Assets

	WDV as on 01.04.20	Additions during the year	Disposals	Balance as on 31.03.21	Depreciation for the year	Net balance on 31.03.21
	(Rs.)	(Rs.)	(Rs.)	(Rs.)	(Rs.)	(Rs.)
Building	1,61,378			1,61,378	16,138	1,45,240
Electrical Installations	5,22,296			5,22,296	52,230	4,70,066
Furniture & Fittings	13,05,415	1,01,760		14,07,175	1,35,630	12,71,545
Lab. Equipments	1,47,621			1,47,621	22,143	1,25,478
X-ray Equipments	1,33,265			1,33,265	19,990	1,13,275
Other Equipments	10,362			10,362	1,554	8,808
Computer	3,536			3,536	1,414	2,122
Books	8,735	-		8,735	3,494	5,241
Vehicle	5,51,677			5,51,677	97,355	4,54,322
Total	28,44,285	1,01,760	-	29,46,045	3,49,948	25,96,097

<u>INVESTMENT</u>	As at 31.03.21	As at 31.03.20
	(Rs.)	(Rs.)

Schedule- 6

Fixed Deposit (Gratuity)	59,65,000	42,50,000
Total	59,65,000	42,50,000

NEW DELHI TUBERCULOSIS CENTRE

<u>CURRENT ASSETS</u>	As at 31.03.21	As at 31.03.20
	(Rs.)	(Rs.)
<u>Schedule- 7</u>		
<u>(A) Current Assets & Loans and Advances</u>		
Grant Receivable from TAI.	10,000	10,000
Interest accrued on FDR(gratuity fund)	3,36,840	69,224
Stocks and Stores at cost :		
(as valued and certified by the Management)		
-X-Ray films and chemicals	51,552	31,257
-Laboratory stains, chemicals glassware	1,75,057	1,59,896
Sub Total - A	5,73,449	2,70,377
<u>(B) Cash and Bank Balances:</u>		
Cash in hand	-	-
(as certified by the Management)		
In Current A/c with BOI	53,51,650	75,71,011
Bank of India (Gratuity Fund A/C)	13,883	22,212
In Saving Bank		-
- with BOI (Earmarked donation fund)	18,47,797	18,17,226
- with BOI (Staff Welfare Fund)	85,479	83,899
Sub Total - B	72,98,809	94,94,348
Gross Total - A+B	78,72,258	97,64,725

<u>Schedule-8</u>	Fee for the year 2020-21	Fee for the year 2019-20
	(Rs.)	(Rs.)
<u>Advance Fees for patients</u>		
Laboratory charges	39,800	1,56,860
X-ray charges	2,940	-
Total	42,740	1,56,860

NEW DELHI TUBERCULOSIS CENTRE

	For the year 2020-21	For the year 2019-20
	(Rs.)	(Rs.)
<u>Schedule- 9</u>		
<u>Salary & Other Staff Expenditure :</u>		
Salaries	2,56,38,396	2,84,30,830
Dearness Allowance	42,79,737	39,55,703
House Rent Allowance	57,93,130	57,79,640
Transport Allowance	19,73,241	19,20,598
Other Allowances	16,23,259	12,98,958
Children's Education Allowances	4,16,786	4,18,206
Contribution to Provident Fund	29,45,481	29,05,537
Contribution to Gratuity Fund	7,76,000	18,31,000
Bonus	1,70,107	1,59,734
Travel Concession	1,850	4,55,704
Total	4,36,17,987	4,71,55,910

Schedule- 10

Administrative Expenses :

Housekeeping Charges/ Wages to Contractual Staff	14,31,245	13,72,772
Salary to Contractual Staff	7,83,149	-
Security Charges	11,80,883	11,28,523
Medical Aid to staff	2,80,436	2,81,880
Travelling Expenses & Conveyance	7,010	1,95,361
Repairs to Furniture and equipment	1,50,095	2,47,283
Repairs to X-ray equipments	-	1,400
Repairs to Laboratory equipment	1,59,214	1,11,480
Telephone Expenses	1,20,719	1,28,221
Printing & Stationery	1,36,090	1,42,655
Postage	9,572	7,089
Laundry Charges	3,238	7,975
Maintenance of car	35,046	49,576
Audit Fee	24,780	24,780
Miscellaneous expenses	1,87,691	1,72,357
Building maintenance expenses -civil	21,70,612	14,86,781
Building maintenance expenses -electrical	3,16,527	2,14,180
Annual day expenses	10,000	80,806
Furniture - Major repairs	1,01,760	2,08,862
Advertisement	25,709	47,964
Interest to Govt. of India	6,24,351	-
Linen and bedding	-	12,025
Total	77,58,127	59,21,970

NEW DELHI TUBERCULOSIS CENTRE

		For the year 2020-21	For the year 2019-20
		<u>(Rs.)</u>	<u>(Rs.)</u>
<u>Schedule- 11</u>			
<u>X-Ray Films ,Drugs and Medicines & Lab. Consumable</u>			
Drugs and Medicines			
Balance as on 1.4.2020	-		
Add : Purchased during the year	<u>31,154</u>		
Less : Closing Stock	<u>-</u>		
		31,154	80,580
X-Ray Films and Chemicals			
Balance as on 1.4.2020	31,257		
Add : Purchased during the year	<u>61,981</u>		
	93,238		
Less : Closing Stock	<u>51,552</u>		
		41,686	85,751
Lab. Stains, Chemicals & Glassware			
Balance as on 1.4.2020	1,59,896		
Add : Purchased during the year	<u>5,67,215</u>		
	7,27,111		
Less : Closing Stock	<u>1,75,057</u>	5,52,054	3,21,308
Materials Consumed	Total	<u>6,24,894</u>	<u>4,87,639</u>

NEW DELHI TUBERCULOSIS CENTRE

	For the year 2020-21	For the year 2019-20
	(Rs.)	(Rs.)
Schedule- 12		
<u>Receipts from TAI</u>		
For PF Advances	11,15,000	23,41,500
For Gratuity Payments	7,72,540	20,00,000
For Provident Fund Payments	1,12,48,346	-
Total	<u>1,31,35,886</u>	<u>43,41,500</u>

Schedule - 13

Other Receipts

Donations for Medicines	12,240	-
Staff Welfare Fund	2,580	2,706
Interest on FFD A/c	3,11,484	3,82,367
Interest on Saving A/c (Earmarked Fund)	60,894	38,585
Miscellaneous Receipts	4,020	4,390
Earnest money	75,100	-
Security deposit	56,706	1,57,693
Traininig under RNTCP	3,600	4,88,323
Project-Active case finding	-	-
Project-Mapping of antimycobacterial drugs	-	-
Project- Effect of counselling	1,26,000	
Project-Framework of TB care in prison	-	1,44,900
Project-NTM Diseases	-	7,61,800
NABL Servillance Fees	12,980	23,600
Total	<u>6,65,604</u>	<u>20,04,364</u>

NEW DELHI TUBERCULOSIS CENTRE

	For the year 2020-21	For the year 2019-20
	(Rs.)	(Rs.)
<u>Schedule- 14</u>		
<u>Staff Expenditure</u>		
Salaries	2,56,31,928	2,84,14,396
Dearness Allowance	42,69,937	39,79,530
House Rent Allowance	57,78,682	57,84,392
Transport Allowance	19,69,029	19,18,816
Other Allowances	16,19,075	12,55,586
Children's Education allowance	4,16,786	4,18,206
Contribution to Provident Fund	29,38,733	29,09,713
Contribution to Gratuity Fund	-	-
Bonus	1,59,734	1,74,745
Travel Concession	1,850	4,55,704
Total	<u>4,27,85,754</u>	<u>4,53,11,088</u>

Schedule- 15

Administrative Expenses

Wages to Contractual staff	15,47,095	12,56,922
Salary to Contractual Staff	7,83,149	-
Security Expenses	12,77,656	10,31,750
Medical Aid to staff	2,80,436	2,81,880
Travelling Expenses & Conveyance	7,010	1,95,361
Repairs to Furniture and equipment	1,50,095	2,47,283
Repairs to X- Ray equipment	-	1,400
Repairs to Laboratory equipment	1,59,214	1,11,480
Telephone Expenses	1,22,169	1,28,887
Printing & Stationery	1,36,090	1,42,655
Postage	9,572	7,089
Laundry Charges	3,238	7,975
Maintenance of car	32,258	49,576
Audit Fee	24,780	24,780
Miscellaneous expenses	1,87,691	1,72,357
Building maintenance -civil	21,70,612	14,86,781
Building maintenance -Electrical	3,16,527	2,14,180
Annual day expenses	10,000	80,806
Advertisement	25,709	47,964
Furniture	2,97,818	12,804
Interest to Govt. of India	6,24,351	-
Linen and bedding	-	12,025
Total	<u>81,65,470</u>	<u>55,13,955</u>

NEW DELHI TUBERCULOSIS CENTRE

	For the year 2020-21	For the year 2019-20
	<u>(Rs.)</u>	<u>(Rs.)</u>
<u>Schedule- 16</u>		
<u>X-Ray Films ,Drugs and Medicines & Lab. Consumable</u>		
X-Ray Films and Chemicals	61,981	96,145
Drugs and Medicines	31,154	83,940
Laboratory Stains and Chemicals	5,77,756	3,32,991
Total	<u>6,70,891</u>	<u>5,13,076</u>
<u>Schedule- 17</u>		
<u>Payments from TAI Fund</u>		
PF Advances	11,15,000	23,41,500
Gratuity Payments	7,72,540	20,00,000
Provident Fund Payments	1,12,48,346	-
Total	<u>1,31,35,886</u>	<u>43,41,500</u>
<u>Schedule- 18</u>		
<u>Other Payments</u>		
settlement of gratuity a/c	1,23,680	17,18,789
Earnest money	8,962	-
Staff Welfare Fund	1,000	2,000
Donation fo medicines	17,560	44,789
General Donations	-	-
Research Fund	-	10,910
Security deposit	31,093	72,110
Project-Framework of TB care in prison	1,19,064	1,33,584
Training under RNTCP	44,065	4,98,234
Project Active Case Finding Campaign	94,413	1,55,064
Project Mapping of Anti Bacterial Drugs	80,000	-
Project- Effect of counselling	1,95,383	1,40,617
Project- NTM Diseases	24,968	-
NABL Servillance Fees	36,580	-
Total	<u>7,76,768</u>	<u>27,76,097</u>

NEW DELHI TUBERCULOSIS CENTRE

Annexure 1 (for the year ended 31st March 2021)

	Grant-in-aid Salaries	Grant-in-aid General
	(Rs.)	(Rs.)
INCOME		
Opening surplus/(Deficit) (01.04.20)	1,67,126	11,12,756
Grant-in-aid from Govt. of India	4,42,00,000	70,00,000
Maintenance Grants from TAI	-	10,000
Fees from Patients	-	42,740
Other receipts	-	4,023
Total	<u>4,43,67,126</u>	<u>81,69,519</u>
EXPENDITURE		
Salary & Other Staff expenditure	4,36,17,987	-
Administrative Expenses	-	77,58,127
Expenses on X-Ray Films, Drugs & Medicines and Lab. Consumable	-	6,24,894
Total	<u>4,36,17,987</u>	<u>83,83,021</u>
Surplus/(Deficit)	7,49,139	(2,13,502)
Total Surplus(Deficit) as on 31.03.2021		<u>5,35,637</u>

NEW DELHI TUBERCULOSIS CENTRE

Schedule – 19

Significant Accounting Policies and Notes to Accounts

A. Significant Accounting Policies:

1. Accounting Convention :

The Financial Statements have been prepared on accrual basis (except as specifically stated) and under the historical cost convention, and in accordance with the generally accepted accounting principles in India.

2. Use of Estimates:

The preparation of the Financial Statements in conformity with GAAP in India requires management to make estimates and assumptions, wherever necessary, that affect the reported amount of assets and liabilities and contingent liabilities as at the date of financial statements and the amount of revenue and expenses during the year. Actual results could differ from those estimates. Any revision to such estimates is recognized in the year in which the results are known / materialized.

3. Revenue Recognition:

Income & Expenditures have been accounted for on accrual basis except for leave encasement.

4. Fixed Assets & Depreciation:

- a) Fixed Assets are stated at cost, Assets received as donation are stated at estimated market value on the date of donation.
- b) Centre has started charging Depreciation from the Financial Year 2011-12 on its Fixed Assets as per rate prescribed under Income Tax Act, 1961.
- c) Further, Depreciation has been debited to the Assets Fund by Crediting Cost of respective Fixed Assets.
- d) Capital items having cost / value less than Rupees Five Thousand are not capitalized.
- e) Assets Fund has been credited with the cost/value of Fixed Assets acquired during the year by debiting Income & Expenditure account and / or Project Fund.

5. Inventories:

Laboratory stains, chemicals and glassware and x-ray films & chemicals are valued at purchase price following FIFO method (Refer Note No. 4).

6. Gratuity :

Provision towards gratuity liability is being made on adhoc basis (as per the rules of Tuberculosis Association of India) and the said fund is maintained by Tuberculosis Association of India. However from Financial Year 2019-20 onwards the said fund is maintained by the

Centre. The accumulated balance as on 1st April, 2019 of the said fund lying with Tuberculosis Association of India is yet to be received by the centre.

7. Provident Fund :

As per rules of Tuberculosis Association of India (TAI), accounts relating to Provident Fund of the staff of the Centre have been maintained by the (TAI).

8. Interest Incomes :

Interests earned on the Investments of Earmarked Funds have been credited directly to such Fund instead of Income & expenditure Account.

B. Notes to Accounts

1. In absence of any demands by the Lok Nayak Hospital for water expenses and for electricity charges from May 2018 onwards no liabilities have been provided for.
2. TDS recoverable as on 31st March, 2021 amounting to Rs. 2,98,370/- for which management is making effort to recover the same from the Tax Department.
3. Title deed of the land on which Buildings are situated is not available.
4. Cost / Value of stock are as valued and verified by the Management.
5. As per Letter from Ministry of Health & Family welfare, Government of India bearing file no. W.11034/02/2020-CCD dated 28th January 2021 and according to GFR, Interest received on the Grants from Government should be refunded and any un-spent balances of Grants should not be adjusted with future Grants. Centre has received above mentioned letter for the refund of old interest on Grants. Centre has refunded old interest during the year by debiting income & Expenditure Account and accordingly interest for the year has been credited to current liabilities instead of crediting the same to Income & Expenditure accounts.
6. Previous year's figures have been regrouped / rearranged wherever considered necessary.

**Admn. Officer
(S.K. Saini)**

**Director
(Dr. K.K. Chopra)**

**Financial Adviser
(Dr. V.K. Arora)**

**Place: New Delhi
Date: 11.10.2021**