

Chapter – 1

INTRODUCTION

பிணியின்மை செல்வம் விளைவின்பம் ஏமம்

அணியென்ப நாட்டிவ் வைந்து (குறள்-738)

Freedom from epidemics, wealth, produce, happiness and protection (to subject); these five the learned, say, are the ornaments of a kingdom.

1.1 Good Health of the people plays a pivotal role in all round development of the society. Only a healthy population can contribute proactively to the overall economic growth of the Country. The fundamental determinants of an efficient and effective health care delivery system are access, equity, efficiency, quality and patient satisfaction. Government of Tamil Nadu is providing comprehensive health services to the people of Tamil Nadu with greater focus on the above fundamental determinants.

1.2 Tamil Nadu's achievements in Health Sector is not only one among the best in India but is

also comparable to the developed nations of the World. The increase in attendance of inpatients and outpatients certifies that the people have tremendous faith on the treatment given by the Government Medical Institutions. Tamil Nadu is one of the best performing States and has consistently strived for ensuring that the citizens are provided with the best possible medical care.

1.3 Tamil Nadu has emerged as a model State in India in providing health care services. It has already achieved the health related Millennium Development Goals (MDG) set by the United Nations and it is poised to achieve the Sustainable Development Goals (SDG) in health sector ahead of 2030. The Vision 2023 of our late Hon'ble Chief Minister of Tamil Nadu aims to surpass the health care standards, attained by the developed Nations. The State is also at the fore front in prevention, control and treatment of communicable and non-communicable diseases.

1.4 The survival and healthy development of every child is the key for the development of any Nation. Infant Mortality Rate (IMR) is the key sensitive indicator of the child health in a

Country. Likewise the Maternal Mortality Ratio (MMR) represents the most sensitive and key indicator of women's health and status in a Society. Tamil Nadu ranks second in MMR and IMR among the major Indian States as per the recent SRS figures of the Government of India.

1.5 Health Services are an important indicator to understand the health care delivery provisions and mechanisms in the State and are sub-divided into three categories viz. primary, secondary and tertiary health care systems. In addition to Government efforts, private sector is also contributing to provide health care services.

1.6 That is precisely the reason why, achieving the health indicators attained by the Developed Nations by 2023 has been adopted in the Vision 2023 documents.

1.7 Government of Tamil Nadu has conceptualised health and well being as a developmental imperative by shifting its focus from mere disease treatment to social well being.

State Profile

1.8 Tamil Nadu has secured second place in SDG India Index Report 2019 of NITI Aayog owing to its robust policy framework and sincere efforts of Government in achieving SDG goals. The State has achieved significant progress in maternal and child health in last few decades. Tamil Nadu has 99.99 percent institutional deliveries (State HMIS, Nov 2019-20) and MMR of 57 deaths per one lakh population (November 2019 State HMIS), clearly surpassing the SDG 2030 goal. Further, the Under-5 MR has declined from 20 per 1,000 live births in 2015 to 19 in 2017, which is also much lower than the national Under-5 MR of 37 in 2017. Tamil Nadu has registered reduction in Infant-Mortality Rate (IMR) from 19 per 1,000 live births in 2015 to 16 per live births in 2017 which is lower than the national IMR of 37 per 1,000 live births in 2015 and 33 in 2017. Also, the immunization coverage is about 95 percent (State HMIS, 2018-19) nearing to the target of reaching full immunization. The fertility rate of women in Tamil Nadu (1.6) is lower than the national average (2.3).

1.9 Tamil Nadu is the seventh most populous State in the country with a population of 7.21 crore as per 2011 census with Decadal Growth Rate of 15.6%. The State has 37 Revenue Districts. For the management of public health services, there are 42 Health Unit Districts in addition to Chennai Corporation. Now Salem Health Unit District has been divided and a new Health Unit District has been formed with headquarters at Attur. With this, there will be 43 Health Unit Districts in the State. Tamil Nadu is one of the best performing States in terms of implementing Reproductive and Child Health schemes and has already achieved the National Health Mission / Reproductive Child Health goals. The department has staff strength of over one lakh persons serving for an average of 6.5 lakh out-patients and 70,000 in-patients per day.

1.10 The State is also appreciated for establishing a robust and secure public health system. The presence of separate cadre for public health i.e., Directorate of Public Health and Preventive Medicine was model for other States to emulate on similar lines in accordance with National Health Policy 2017. Unlike other

States, where the priority for public health interventions gets subsumed under medical care, having a separate public health cadre in the State has resulted in significant achievements in community level health care. Again, the establishment of Tamil Nadu Medical Services Corporation is lauded pan-India due to its significant contributions in ensuring timely procurement, logistics and availability of drugs and diagnostics in the State.

1.11 The State is also committed to ensure certain level of standard to every health facility in the State, be it Public Sector or Private Sector. Tamil Nadu Private Clinical Establishment (Regulations) Amendment Act, 2018 and the Tamil Nadu Private Clinical Establishment (Regulation) Rules, 2018 to implement the Tamil Nadu Clinical Establishment (Regulation) Act, 1997 mandates registration and regulation of all clinical establishments in the State and prescribes the minimum standards of facilities and services to be provided by them.

1.12 Tamil Nadu has been adjudged as the best State in the Country in the implementation of

Deceased Organ Transplantation Programme and also has the distinction of bagging consecutive awards for the last 5 years from 2015 to 2019. The policy of the Government is to establish atleast one Government Medical College in each district in a phased manner. **During the last eight years, six new Medical Colleges have been established.** During the last year 2019, Government has obtained approval of the Government of India for establishment of 11 new Government Medical Colleges in 11 districts under the Centrally Sponsored Scheme with a cost sharing pattern of 60:40 for 100 MBBS seats. However, Government of Tamil Nadu has decided to establish these 11 Medical Colleges with 150 MBBS seats bearing the additional expenditure due to the additional seats from the State funds.

1.13 The State has also been a forerunner in bringing many international stakeholders through strategic purchasing in addressing certain key areas in health care delivery. Tamil Nadu Urban Health Care Project funded by the Japan International Cooperation Agency (JICA), is an example in this regard. The World Bank

has also come forward for the second time to provide funding support of Rs.2,897 crore for the next five years for implementing Tamil Nadu Health Systems Reforms Program (TNHSRP).

1.14 During the visit of Hon'ble Chief Minister to London in August 2019, three historical agreements have been signed. They are

- i) Memorandum of Understanding (MoU) signed with Kings College Hospital, London for establishing a Flagship Unit of Kings College Hospital in Tamil Nadu; to develop and implement health system strengthening projects in the areas of Maternal and Child Health, Emergency Care Service for Stroke, Specialised Nursing Care, Health Care Delivery System etc.;
- ii) MoU signed with International Skills Development Corporation (ISDC) for upskilling for Nurses and Health Care Professionals, Capacity Building of Nurses by deputing them to UK and,
- iii) MoU signed with London School of Hygiene and Tropical Medicine (LSHTM) for Vector Borne Disease Control, Sharing of

Community Best Practices and to collaborate and co-operate in strengthening Infections Disease Surveillance diagnosis control activities and treatment protocols, collaborative Research Projects etc.

1.15 The State has effectively responded to the challenge of Vector Born Diseases such as Dengue, Swine Flu, Corona etc which showed an increase Worldwide.

Current Scenario

1.16 The details of Government medical health facilities in Tamil Nadu is given below:

| Sl. No | Description | Units |
|---------------|--|--------------|
| 1 | Government Medical Colleges | 24 |
| 2 | Hospitals attached with the Medical Colleges | 50 |
| 3 | Tamil Nadu Government Multi Super Specialty Hospital | 1 |
| 4 | Tamil Nadu Government Dental College and Hospital | 1 |

| | | |
|----|--|-------|
| 5 | District Headquarters Hospitals | 29 |
| 6 | Taluk and Non-Taluk Hospitals | 273 |
| 7 | Primary Health Centres (PHCs) | 1,806 |
| 8 | Health Sub Centres (HSCs) | 8,713 |
| 9 | Urban Primary Health Centres (UPHCs) including Chennai Corporation | 460 |
| 10 | New Community Health Centres (CHCs) being established under NHM in Chennai Corporation | 15 |
| 11 | Employees' State Insurance (ESI) Hospitals | 10 |
| 12 | ESI Dispensaries | 216 |
| 13 | Indian System of Medicine Hospitals and Dispensaries | 1,534 |

Achievements in Health Sector

1.17 The schemes of the Government are described in detail in the rest of the Chapters of the Policy Note, while a summary of few significant achievements are narrated below:

Significant Achievements in the Health Sector during the last Nine Years

Health Indicators

- **Infant Mortality Rate (IMR)** was 24 in 2010 and this has been reduced to 16 per 1,000 live births in 2017 as per SRS data 2017 against the National IMR of 33. This Government has received a sum of Rs.489.40 crore during the period from 2012-2013 to 2014-2015 as incentive from the Government of India for reduction of IMR.
- As per the latest SRS data 2015-2017, **Maternal Mortality Ratio (MMR)** which was 90 in 2010-2012 has been reduced to 63 per one lakh live births. Now, it is further reduced to 57 as per 2019 State Health Management Information System Data. The current MMR of India is 130.
- **Total Fertility Rate (TFR)** is 1.6. This is the lowest in the country against the India's status of 2.3.

State Schemes

- **Chief Minister's Comprehensive Health Insurance Scheme**, a flagship program of the Government, was introduced in 2012 for providing state of art treatment to the public in both Government and private hospitals. This initiative has enabled the State to achieve the goal of Universal Health Care. Treatment is provided for 1,027 medical and surgical procedures, 154 specialized procedures, 154 follow up procedures, 38 standalone diagnostic procedures and 8 High end procedures. Since its inception, 41.42 lakh persons have availed medical treatment at the cost of Rs.6,601 crore. Government Hospitals received an insurance amount of Rs.2,453.22 crore which has been utilized for upgradation of infrastructure facilities in the Hospitals. Now, with the integration of the Chief Minister's Comprehensive Health Insurance Scheme with the Pradhan Mantri Jan Arogya Yojana, the insurance coverage has been enhanced to Rs.5 lakh per annum.

- A Corpus Fund has been created with the Government contribution of Rs.35 crore to meet the expenditure towards eight specialized high end surgeries from which 8,847 patients have benefitted at a cost of Rs.672.89 crore.
- **Dr. Muthulakshmi Reddy Maternity Benefit Scheme (MRMBS) and Amma Maternity Nutrition Kit:** Dr. Muthulakshmi Reddy Maternity Benefit Scheme is providing financial assistance of Rs.18,000 from 1st April, 2018. Under this scheme, two Amma Maternity Nutrition Kits are also being given. So far, 60.64 lakh poor pregnant mothers received the financial assistance of Rs.6,033.81 crore. Government of India's Pradhan Mantri Matru Vandana Yojana has been dovetailed with the above State scheme.
- **Menstrual Hygiene Programme** is under implementation to promote hygiene among the adolescent girls. Free Sanitary Napkins are distributed annually to 32.79 lakh rural

adolescent girls at an annual cost of Rs.61 crores.

- 416 Mobile Medical Units in rural areas, 10 Mobile Medical Units in urban area and 50 Mobile Medical Units for construction workers are being covered under the **Hospital on Wheels Programme**. Every month 40 camps are conducted in each block. Over 11.71 crore persons have been benefited from the 16.48 lakh camps conducted so far.
- **Amma Baby Care Kit** is being provided to the mothers of about 6.7 lakh children annually for improving the hygiene of the post-natal mothers and newborn babies. Under this scheme, 21.94 lakh delivered mothers have been given these kits upto February 2020.
- **Amma Arokiya Thittam**, is implemented to all people in the age of above 30 years living in rural areas to have access to basic health checkup on annual basis in a nearby health facility. 25 parameters are screened under this program in 501 PHCs including

urban areas. 55.58 lakh people were screened so far.

- **Amma Whole Body Health Check-up and Amma Women Special Check-up** is under implementation in Government General Hospital, Chennai from 1.3.2016 and in Tamil Nadu Government Multi Super Speciality Hospital, Omandurar Estate, Chennai from 08.06.2018. So far, 70,798 persons undergone the medical check-up in these two hospitals.
- **“104” Health Helpline cum Telemedicine Service** was launched on 30.12.2013 for providing free access to health information, health guidance and grievance redressal. 43.39 lakh calls were received from the public till February 2020 and health information provided.
- **Breast Milk Banks** have been started in 25 Government Medical College Hospitals and District Headquarters Hospitals.
- The Indian Systems of Medicine has been well recognised in the State and the existing

infrastructure of Government Institutions for Indian Systems of Medicine were strengthened. A World class Yoga centre in 50 acres of land in the premises of Chengalpattu Government Medical College at a cost of Rs.96.30 crore is being established and the construction of building is under progress. This project will be the first of its kind in the Country.

- To recognise, motivate and encourage the meritorious services of Doctors and Staff Nurses, an Award Scheme has been introduced. Awards and prizes for the best maintenance are given to the Government Hospitals and Primary Health Centres.

Schemes under National Health Mission

- **Rashtriya Bal Swasthya Karyakram (RBSK)** aims at early detection and management of a set of 30 health conditions prevalent in children less than 18 years of age. 770 teams in rural areas and 35 teams in urban areas are screening the children in Anganwadi Centres, Government and Government aided schools. Children

who require surgical intervention are referred to District Tertiary Care Hospitals.

- **108 Ambulance Services** is being operated on 24x7 basis free of cost to the public through a single Toll Free Number. 938 ambulances are in operation under the 108 emergency ambulance service. Since 2011-2012, 90.60 lakh people have availed the services including 18.69 lakh pregnant mothers. 65 Neonatal Emergency Ambulances and 76 Four Wheel Drive Ambulances are also in operation. First Responder Bike Ambulance Service has been introduced with 41 two wheelers
- **102 – Drop Back Service Janani Sishu Suraksha Karyakram (JSSK):** To provide 100% free drop back service to delivered mothers and sick inpatients, a pilot project for Women and Children, Chennai was introduced through Indian Red Cross Society at the Institute of Obstetrics and Gynaecology and Hospital. The scheme has now been extended to all the districts. This

service can be utilized by dialling the Toll Free Number '102'.

- **Emergency Care and Recovery Centres:** with 50 beds have been established in 10 districts catering to the needs of wandering mentally-ill, rescued through retrieval vehicles. Tamil Nadu is the 1st State to have a dedicated retrieval vehicles to the mentally ill and take them to the nearest hospital
- **Early detection of Haemoglobinopathies:** Tamil Nadu is the first among the South Indian States to implement program for like Sickle Cell Anaemia, Thalassemia among the tribal population. The timely identification and genetic counselling will prevent the transmissiion of the carrier from the parent to children which breaks the propogation of the disease.
- **Non-Communicable Diseases:** Our State has been implementing a large scale Non-Communicable Diseases Intervention Programme since 2013-2014 in all the districts involving 2,602 Government health facilities across Primary / Secondary /

Tertiary and municipal levels of health care. Under the programme, screening, treatment and follow-up services are provided for Hypertension, Diabetes Mellitus, Cervical and Breast cancer to all individuals aged 30 years and above who are attending any Government Health facility in the State.

- **Medical Services Recruitment Board**, a first of its kind in India has been established exclusively to recruit medical and para-medical staff for the Health Department. As on 24.3.2020, 33,124 personnel in the category of Assistant Surgeon, Nurse, Physiotherapist, Radiographer, Pharmacist, Village Health Nurses were recruited through this Recruitment Board.
- In the past nine years, 254 new PHCs have been established at a total cost of Rs.221.30 crore and 166 PHCs have been upgraded with 30 beds, Ultra Sonogram, Operation Theatre facility, etc., at a cost of Rs.198.66 crore. Maternity and Child Health centres were established in 42 PHCs at a cost of Rs.19.45 crore. Under National Urban Health

Mission (NUHM) 40 new urban PHCs in Chennai Corporation and 37 new urban PHCs in the other Corporations and Municipalities were established. Besides this, 52 Taluk Hospitals were opened by upgrading the existing Non Taluk Hospitals and Upgraded Primary Health Centres at a cost of Rs.93.96 crore.

Medical Education

- **Establishment of New Government Medical Colleges:** During the last eight years, six new Medical Colleges were established in Sivagangai, Thiruvannamalai, Omandurar Government Estate Chennai, Pudukkottai, ESIC Hospital, Coimbatore and Karur. In the year 2019, this department has strived hard and got Government of India's approval for the establishment of 11 new Government Medical Colleges in 11 districts of Ramanathapuram, Virudhunagar, Krishnagiri, Namakkal, Nagappattinam, Dingidul, The Nilgiris, Thiruvallur, Tiruppur, Ariyalur and Kallakurichi under centrally

sponsored scheme with an annual intake of 150 MBBS seats in each college.

- **Increase of 3,000 additional M.B.B.S. Seats:** 1,350 MBBS seats were increased during the last eight years by opening six new Government Medical Colleges (700 seats) and increasing MBBS seats in the existing 12 Government Medical Colleges (650 seats). Besides this, 11 Government Medical Colleges are being established in 11 districts under Centrally Sponsored Scheme with an intake of 150 MBBS seats each. As a result there will be an increase of 1,650 MBBS sets totalling to 3,000 MBBS seats.
- **Increase of Post Graduate Seats:** During the last nine years, 1,369 Post Graduate medical seats were increased in the Government Medical Colleges, besides 20 DNB seats approved by the National Board of Examination.
- Super Speciality facility with Trauma Care Centre in the Government Medical Colleges at Madurai, Thanjavur and Tirunelveli at a cost of Rs.150 crore each under '**Pradhan**

Mantri Swasthya Suraksha Yojana' (PMSSY) were inaugurated by Hon'ble Prime Minister of India on 27th January, 2019. They were strengthened with additional posts sanctioned by State Government.

Best Practices

1.18 Some of the best practices recognised by the Government of India are as follows:

- **Cadaveric Organ Transplantation:** Our State has always been cited as a model for other States in the implementation of this programme. Tamil Nadu has bagged the 'Best State Award' nationally under this category during the last 5 years from 2015 to 2019.
- **Public Health Cadre:** Only in Tamil Nadu, there is a separate Public Health Cadre with a separate directorate. This has helped to improve preventive and promotive health care in the State in addition to the management of primary care services.
- **Tamil Nadu Medical Services**

Corporation (TNMSC) is the 'State of Art' nodal agency in the State, started in 1995, for the procurement of drugs, equipment and supplies to all Government Medical Institutions. This has ensured availability of essential drugs. During the visit, Common Review Mission (CRM) team observed that there is no out of pocket expenditure on drugs and diagnostics. Similar to the TNMSC, **Tamil Nadu Medicinal Plants and Herbal Medicine Corporation Limited (TAMPCOL)** acts as agency for drug manufacturing, procurement and supply for AYUSH medicines.

- **Birth Companion Programme:** The State has introduced this new novel Programme since 2004. During delivery, one family member of the pregnant women is allowed as birth companion in the labour room. This had a positive impact and resulted in increasing the institutional deliveries in public health facilities.
- **Maternity Picnic and Bangle Ceremony:** This helps to build more trust and

confidence in availing services from public institutions. It is organised by the Village Health Nurses and Auxiliary Nurse Midwives under the guidance of Medical Officer.

- **Well Functional and Co-located AYUSH services** are provided across most facilities in the State.
- **Award for District Collectors:** Every year, three District Collectors are given awards encouraging their involvement in the implementation of various programmes under the National Health Mission.

1.19 Awards Won / Secured at all India Level in 2019-20

- National Award for best performance in the country in terms of **Cadaveric Organ Transplantation** for the fifth year 2019 consecutively.
- State Food Safety Department has received the Best State Award for Swasth Bharath Yatra activities and also the State Food Safety Index Award during the year 2019.

Budget

1.20 The Government of Tamil Nadu is increasing the budget to the Health Department every year substantially. In the budget for 2020-21 Rs.15,863.37 crore have been provided to this Department. The directorate wise allocation for 2020-21 under Demand No.19, Health and Family Welfare is as follows:

| Sl. No. | Name of the Office | Amount (Rs. in crore) |
|----------------|--|------------------------------|
| 1. | Health and Family Welfare Department, Secretariat | 14.46 |
| 2. | Directorate of Medical and Rural Health Services | 1,664.67 |
| 3. | Directorate of Medical Education | 5,623.07 |
| 4. | Directorate of Public Health and Preventive Medicine | 3,612.75 |
| 5. | Directorate of Family Welfare | 201.18 |
| 6. | Tamil Nadu Food Safety and Drugs Administration | 101.57 |
| 7. | Directorate of Indian Medicine and Homoeopathy | 406.08 |

| | | |
|-----|--|-----------|
| 8. | Tamil Nadu State Health Transport Department | 33.03 |
| 9. | Reproductive and Child Health Project | 2,043.91 |
| 10. | Tamil Nadu Health Systems Project | 2,162.65 |
| | Total | 15,863.37 |

NOTE:

- i. Apart from the above provision, Rs.413.59 crore has been allocated towards civil works being undertaken by Public Works Department under Demand No.39.
- ii. Provision towards ESI scheme hospitals for Rs.601.08 crore has been made in the Labour and Employment department Demand No.32.

1.21 The thrust areas and schemes listed above are only a tip of an indicative samples of various activities, programmes and schemes undertaken by the Health and Family Welfare department. The elaborate details are listed out in the forthcoming chapters.

Chapter - 2

HISTORY

2.1 Siddha Medicine, traditional system of healing that originated in South India and is considered to be one of India's oldest systems of medicine. Tamil Nadu has a rich history in health sector like other sectors. Our ancient Indian System of Medicine 'Siddha' and 'Ayurveda' are in practice for over thousands of years. Siddha System of Medicine was practised by the Eighteen Siddhars and that is why, it is called Siddhar Maruthuvam. Sashrutha and Charaka were the pioneers of Ayurveda. Roots of modern medicine are linked to the advent of Britishers.

Origins:

- 1639 - The first British hospital is believed to have been established to treat the sick soldiers of the East India Company.
- 1644 - The origin of the modern hospital (the present Government General Hospital attached to the Madras Medical College)

- 1835 - The first Medical College in the State viz., The Madras Medical College was inaugurated
- 1883 - Dental Department was started in the Government Hospital
- 1885 - The Kasturba Gandhi Hospital (KGH-Gosha Hospital) was started at Triplicane
- 1923 - Directorate of Public Health and Preventive Medicine was formed
- 1966 - Department of Medical Education was formed
- 1970 - Department of Indian Medicine was formed
- 1981 - Department of Drugs Control was formed
- 1981 - The State Health Transport Department was formed
- 1983 - Department of Family Welfare was formed
- 1986 - State and District Blindness Control Societies was formed

- 1994 - Tamil Nadu Medical Services Corporation was formed
- 1994 - Tamil Nadu State AIDS Control Society was formed
- 1999 - Directorate of Medical and Rural Health Services (ESI) was formed.
- 2002 - The Revised National Tuberculosis Control Programme was launched
- 2005 - State Health Society was formed
- 2008 - Cadaver Organ Transplant Programme was launched
- 2011 - Food Safety Department was formed
- 2013 - Government of India launched Urban Health Mission
- 2016 - Transplant Authority of Tamil Nadu (TRANSTAN) was formed.

Distinctions:

- Tamil Nadu has not only the largest number of Government Medical colleges but also was one of the pioneers in starting them
- Madras Medical College has the distinction of being the second oldest Medical College in India
- The Eye Hospital, Egmore, attached to the Madras Medical College is the second oldest eye hospital in the world
- At present, The Institute of Mental Health is the second largest Institute in India, offering mental health services to the population of Tamil Nadu
- Madras Medical College was also the first Medical College in the world to admit a lady student, Mary Ann Dacomb Scharlieb in 1878
- Charles Donovan in the year 1903 had the distinction of independently discovering the parasite Leishmania Donovanii in

Madras Medical College (which causes Kala-azar disease) along with William Boog Leishman from Netley, England

- Dr.Muthulakshmi Reddy was the first Indian woman to graduate in 1912 from this college

The department thus has a rich history of traditional directorates which continue to expand and function with vibrance, effective societies for focussed activities, apart from effective and experienced human resources to carry forward the rich tradition of the department.

Chapter - 3

HEALTH ADMINISTRATION

3.1 The following Directorates and Boards are functioning under the administrative control of the Health and Family Welfare department:

- Directorate of Medical Education - responsible for providing medical education and tertiary care.
- Directorate of Medical and Rural Health Services - responsible for providing secondary care and implementing various Regulations as appropriate authority.
- Directorate of Public Health and Preventive Medicine - responsible for providing preventive and public health.
- Directorate of Indian Medicine and Homoeopathy - responsible for providing AYUSH (Ayurveda, Yoga and Naturopathy, Unani, Siddha and Homoeopathy) services.
- Directorate of Family Welfare - focusing on family planning related initiatives.

- Directorate of Food Safety and Drugs Control - focusing on food safety and standards and also on drug regulation and licensing as per the respective Central Acts and Administration through two different wings respectively.
- Directorate of State Health Transport - responsible for maintenance and upkeep of the vehicles of the various Directorates under Health and Family Welfare Department.
- Medical Services Recruitment Board - focusing on the recruitment of personnel for various cadres in Health and Family Welfare department in a speedy and transparent manner.

Apart from these Directorates, the Health Department also provides staff to the Directorate of Medical and Rural Health Services (ESI) under the Labour and Employment Department.

Other Programmes and Initiatives

3.2 To ensure focused, speedy and decentralized implementation a number of initiatives across the Directorates such as National Health Mission - State Health Society, Tamil Nadu State AIDS Control Society, Tamil Nadu Blindness Control Society, Revised National Tuberculosis Control Programme, National Mental Health Programme, National Vector Borne Diseases Control Programme, Universal Immunization Programme and School Health Programme among others are implemented.

3.3 The State is implementing a new project called Tamil Nadu Urban Health Care Project for strengthening the Urban Health Care with the assistance of Japan International Co-operation Agency (JICA) at a cost of Rs.1,634 crore. Tamil Nadu has also conveyed its approval for the Tamil Nadu Health Systems Reforms Program at a total project cost of Rs.2,857 crore supported by the World Bank. These missions, programmes and projects have been explained in detail in subsequent chapters.

Councils

3.4 The following councils are established through various Acts to register the qualified medical, nursing and paramedical professionals to regulate their practice in Tamil Nadu:

- i. Tamil Nadu Medical Council
- ii. Tamil Nadu Dental Council
- iii. Tamil Nadu Nurses and Midwives Council
- iv. Tamil Nadu Pharmacy Council
- v. Tamil Nadu Siddha Medical Council (Siddha and Traditional Practitioners)
- vi. Board of Indian Medicine (Ayurveda, Unani and Yoga and Naturopathy)
- vii. Tamil Nadu Homoeopathy Council
- viii. Tamil Nadu Physiotherapists Council

Classification of Hospitals and Dispensaries

3.5 A broad classification of hospitals and dispensaries in the State is as follows:

- i. **State–Public Medical Institutions:** All Medical institutions – Allopathy and Indian System of Medicine maintained through State funds are directly managed by the Government. These form the backbone of the health care. While 8,713 Health Sub Centres are catering to an average population of 5,000, 1,806 PHCs are catering to an average population of 30,000 at the next level. Above the primary health care institutions, there are secondary and tertiary care hospitals in the State. In addition, 460 Urban Primary Health Centres across the Urban areas in the State including Chennai Corporation and 15 Community Health Centres in Chennai Corporation are also functional.
- ii. **State–Special Medical Institutions:** Institutions intended to serve Police, State owned Corporations / Undertakings, Employees State Insurance Medical

Institutions, etc. which include 10 ESI Hospitals and 216 ESI dispensaries.

- iii. **Medical Institutions under the Local Bodies:** Medical Institutions which are under the management of Corporations, Municipalities and Panchayat Unions are covered under this classification. Urban Primary Health Care Centres have now been established to cater to the primary health care of the urban population.
- iv. **Private Aided Medical Institutions:** Institutions supported / guaranteed by private contribution and receiving Government aid.
- v. **Private Non-Aided Medical Institutions:** All hospitals, dispensaries and clinics solely managed by private persons / establishments.

Chapter - 4

MEDICAL EDUCATION

4.1 The State of Tamil Nadu is a pioneer state in promoting quality health care on par with international standards to the poor people with an aim to improve social and economic development. Directorate of Medical Education is one of the Directorates functioning since 1966 focusing mainly on tertiary care health facilities through the Government Medical College Hospitals / Institutions. This Directorate is committed to deliver innovative teaching, training and research activities in the field of modern medicine. The admissions of MBBS, Nursing and Para Medical courses are processed through the Selection Committee which is functioning under the control of this directorate.

ADMINISTRATIVE STRUCTURE:

4.2 Number of Government Medical Colleges, Para Medical Colleges, hospitals and dispensaries under the control of the directorate of medical education are

| | |
|--|------------|
| Government Medical Colleges | 24 |
| Government Dental College and hospital | 1 |
| Government Pharmacy College B-Pharm | 2 |
| Government Physiotherapy College | 2 |
| Government College of Nursing | 5 |
| Government School of Nursing | 24 |
| Hospitals and allied institutions | 36 |
| Multi Super Speciality Hospital | 1 |
| Women and Children (OG) hospital | 4 |
| Children hospital | 1 |
| Ophthalmic hospital | 1 |
| Tuberculosis hospital | 5 |
| Mental hospital | 1 |
| Rehabilitation Medicine | 1 |
| King Institute | 1 |
| Dispensaries | 13 |
| TOTAL | 122 |

The Director of Medical Education is responsible for the administration of the above

Government Medical Institutions and tertiary care hospitals and Super Speciality Hospitals headed by the Deans and Directors.

PERFORMANCE OF THE MEDICAL COLLEGE HOSPITALS FOR THE PERIOD 2019-2020

| | |
|--------------------|-------------|
| Bed strength | 38,709 |
| Out patients | 3,20,43,225 |
| In patients census | 1,20,24,088 |
| Deliveries | 1,98,872 |
| Major surgeries | 3,51,729 |
| Minor surgeries | 7,79,787 |
| Dialysis done | 2,01,695 |
| CT scan | 7,86,755 |
| USG | 11,24,213 |
| MRI | 1,13,264 |

4.3 SELECTION COMMITTEE:

- i. Selection and admission of candidates to the MBBS / MD /Super Speciality / Post Graduate Degree Courses in Medicine / Para Medical courses / Nursing courses /

Certificate courses in the Government Medical Colleges and Self Financing Medical Colleges and Para Medical Colleges are processed by Selection Committee functioning under the control of the Directorate of Medical Education.

- ii. Number of Seats sanctioned for various Under Graduate and Diploma courses are:

| Sl. No | Name of the Course | Number of Seats * |
|---------------|---|--------------------------|
| 1. | M.B.B.S | 3,400 |
| 2. | B.D.S | 100 |
| 3. | B.Sc Nursing | 250 |
| 4. | Post Basic (B.Sc. Nursing) | 90 |
| 5. | B.Sc Radiology and Imaging Technology | 170 |
| 6. | B.Sc Radio Therapy Technology | 30 |
| 7. | Bachelor of Physiotherapy Technology (B.P.T) | 50 |
| 8. | Bachelor of Cardio Pulmonary perfusion Technology | 15 |
| 9. | B.Pharm and B.Pharm (Lateral Entry) (120+12) | 132 |
| 10. | Bachelor of Audio and Speech | 25 |

| | | |
|-----|---|-------|
| | Language Pathology | |
| 11. | Bachelor of Optometry | 60 |
| 12. | Para Medical courses (25 Courses) | 8,031 |
| 13. | B.Sc Cardiac Technology | 49 |
| 14. | B.Sc Critical Care Technology | 80 |
| 15. | B.Sc Dialysis Technology | 110 |
| 16. | B.Sc Operation Theatre and Anaesthesia Technology | 173 |
| 17. | B.Sc Physician Assistant | 120 |
| 18. | B.Sc Respiratory Therapy | 40 |
| 19. | Diploma in Nursing | 2,060 |
| 20. | Diploma in Pharmacy | 240 |
| 21. | B.Sc Accident and Emergency Care Technology | 138 |
| 22. | B.Sc Medical Laboratory Technology | 140 |
| 23. | Bachelor of Occupational Therapy (B.O.T) | 10 |

(* These are subject to respective Council approval for annual admission and vary from year to year).

iii. The details of Post Graduate and Speciality Courses available in the Government Medical Institutions together with their intake capacity are as follows:

| Sl. No | Courses | Number of Specialities | Total intake capacity |
|---------------|---|-------------------------------|------------------------------|
| 1 | P.G. Degree (Medical Super Specialities) DM / MCH | 19 | 334 |
| 2 | P.G. Diploma (Medical) | 1 | 3 |
| 3 | M.D.S (Dental) | 8 | 42 |
| 4 | P.G. Degree (Medical Broad Specialities) MD / MS * | 24 | 1,758 |
| 5 | P.G. Diplomate of National Board (DNB) | 1 | 4 |
| 6 | M.Pharmacy | 4 | 62 |
| 7 | M.Sc (Nursing) | 5 | 65 |
| 8 | M.Phil (Clinical Social Work) | 1 | 15 |
| 9 | M.Sc (Molecular Virology) | 1 | 21 |

* Further, the Medical Council of India, New Delhi has granted sanction for additional 161 PG degree (MD/MS) seats from the academic year 2020-2021 onwards by starting of New PG courses / Increase of seats in existing PG courses. This number may increase if Medical Council of India accords sanction in respect of two pending reports.

- iv. Besides the Government Medical Institutions, the private medical / paramedical self-financing institutions affiliated to Tamil Nadu Dr.M.G.R Medical University have surrendered the seats as indicated below for allotment by the Government:

| Sl. No | College | No. of Colleges | Number of Seats * |
|---------------|----------------------------|------------------------|--------------------------|
| 1 | Medical College | 14 | 1,052 |
| 2 | Dental College | 19 | 1,174 |
| 3 | B.Sc Nursing | 173 | 6,732 |
| 4 | B-Pharm | 64 | 3,292 |
| 5 | B-Pharm (Lateral Entry) | 51 | 360 |
| 6 | B.P.T | 31 | 1,176 |

| | | | |
|---|----------------------------|----|-------|
| 7 | B.O.T | 4 | 141 |
| 8 | Post Basic B.Sc Nursing | 49 | 1,023 |

(* The number of seats will vary annually subject to the approval of the respective Council)

4.4 Admission policy in Medicine and opposition to National Eligibility cum Entrance Test (NEET)

The Government of Tamil Nadu has been consistently opposing NEET for admission to Medical and Post Graduate Medical Courses.

Earlier, the Medical Council of India issued Notification in the Central Government Gazette for the introduction of Common Entrance Test both for Under Graduate and Post Graduate medical courses. The State Government filed Writ Petition Nos.341 and 342 of 2011 in the High Court of Madras against the Medical Council of India Notifications which was published in the Central Government Gazette dated 27.12.2010 and the Hon'ble High Court of Madras granted interim stay for its implementation in Tamil Nadu.

Then, based on the directions of the Hon'ble Supreme Court of India all the cases were transferred to Supreme Court of India including the State of Tamil Nadu Cases (T.C.(C) Nos.110 and 111 of 2012). In its order dated 18.07.2013 in T.C.(C) Nos.98, 110 and 111 of 2012 and others, the Hon'ble Supreme Court of India ordered that the Medical Council of India is not empowered under the MCI Act, 1956 to actually conduct the NEET. The Government of India was requested by this Government not to review the order of the Hon'ble Supreme Court of India dated 18.07.2013 in T.C. (C) No.98, 110 and 111 of 2012 and others. However, the Medical Council of India filed Review Petitions (Civil) No.2159 - 2268 of 2013 before the Supreme Court of India against the above judgement. In its order dated 11.04.2016, the Hon'ble Supreme Court recalled the earlier judgement of the Supreme Court delivered on 18.07.2013 and allowed the Review Petitions and paved the way for conducting NEET for medical admissions and also directed that the case be heard afresh.

In order to protect the rights of the State in Medical admission and to sustain the existing

admission policy in the State of Tamil Nadu, two Bills viz., L.A. Bill No.7 of 2017 – Tamil Nadu Admission to MBBS and BDS courses Act, 2017 and L.A. Bill No.8 of 2017 – Tamil Nadu Admission to Post Graduate Courses in Medicine and Dentistry Act, 2017 were unanimously passed in the floor of Tamil Nadu Legislative Assembly. With the approval of the Hon'ble Governor, the Government of Tamil Nadu forwarded the said two Bills to Government of India for obtaining assent of the Hon'ble President of India under Articles 254 (2) of the Constitution of India.

As the assent of the Hon'ble President of India was not forthcoming, the Government took a policy decision to allocate 85% of State quota MBBS / BDS seats to students who have studied in Tamil Nadu State Board and to allocate the remaining 15% of seats to the students who studied in other boards and the same was incorporated in the prospectus for admission to MBBS/ BDS course 2017-2018 session through an executive order. However, the above executive order was stuck down by the High Court of Madras and the Supreme Court of India.

During the hearing of the T.C.(C) Nos. 98, 110 and 111 of 2012 and other cases on 12.12.2019 the Hon'ble Supreme Court of India permitted the petitioner to withdraw the case with liberty to question the vires of the provision of section 10D of the Indian Medical Council Act in appropriate proceedings in accordance with law. The T.C.(C).Nos. 110 and 111/2012 filed by the State Government is still remaining to list.

As the teaching method, medium of instructions and curriculum prescribed by CBSE / NTA and State Board are totally different, a common entrance test cannot be conducted by the CBSE / NTA mainly on the basis of its own curriculum / syllabus and that syllabus is not commonly followed in a State.

Moreover, most of the students from rural background have studied in the pattern of the State Board Syllabus in the local vernacular language i.e., Tamil. Whereas, the NEET examination is based on the pattern of the CBSE, ICSE or other syllabus prescribed by the NTA which varies to the substantial degree as compared to the State Board pattern. This results in an unfair and unforeseen disadvantage

to the students from rural background in the State of Tamil Nadu.

Hence, the Government of Tamil Nadu has filed a Writ Petition (Civil) before the Hon'ble Supreme Court of India on 04.01.2020 against introduction of NEET with added details. The Government of Tamil Nadu will continue to oppose NEET as a matter of policy and also through all legal means.

4.5 ESTABLISHMENT OF NEW GOVERNMENT MEDICAL COLLEGE AND HOSPITALS

Under the Centrally sponsored scheme - Establishment of new Medical Colleges/ attached with existing district / referral hospitals : Phase-III, for Rs.325 crore with 60:40 ratio, the Government of India have given permission for establishing of new Government Medical College and Hospitals in the 11 districts mentioned below. Though the Central Government scheme is only for 100 MBBS students intake the State Government has made provision for additional 50 MBBS students and additional expenditure will be borne by the Tamil Nadu Government. Moreover as per the scheme the MBBS admission starts in the year 2022-23, but the

State Government is working towards admitting students from the academic year 2021-22 itself.

District Name:

| | |
|-------------------|------------------|
| 1) Ramanathapuram | 7) Thiruvallur |
| 2) Virudhunagar | 8) Krishnagiri |
| 3) The Nilgiris | 9) Nagapattinam |
| 4) Dindigul | 10) Ariyalur |
| 5) Namakkal | 11) Kallakurichi |
| 6) Tiruppur | |

As a result of the new Medical Colleges, there would be an increase of additional 1,650 MBBS seats ($150 \times 11 = 1,650$) in addition to already existing 3,400 MBBS seats, in the Government Medical College Hospital in the State of Tamil Nadu.

4.6 Amma Master Health Checkup and Amma Women Special Master Health Checkup

In Rajiv Gandhi Government General Hospital, Chennai-3, Amma Master Health Checkup and Amma Women Special Master

Health Checkup programmes have been introduced from 1.03.2016 with the different packages at an economical cost mainly for the benefit of the poor people. Under this scheme, the number of beneficiaries are increasing considerably every year and so far 43,065 persons have benefitted. Scheme packages with cost details and nature of tests done are

| Package -1 (Rs.1,000) | Package-II (Rs. 2,000) | Package-III (Rs.3,000) |
|--|---|---|
| Complete hemogram, ESR, Urine analyser Blood sugar Fand PP urea, Creatinine, Uric Acid Lipid profiles Total Cholesterol, HDL, LDL, Triglycerides Total Cholesterol / HDL ratio Liver Function Test Serum billirubin (total and | Package 1 + Echo- cardiogram, PSA, thyroid Profile and HbA1C | Package II + Digital Mammogram, Dexa Scan, Bone profile (Vitamin D, Calcium, Phosphorous and PTH) |

| | | |
|---|--|--|
| direct) AST, ALT, SAP Total protein and albumin. HbsAg Blood grouping and typing ECG / X – ray Chest USG abdomen Pap smear | | |
|---|--|--|

Amma Master Health Checkup Programme was introduced in Tamil Nadu Government Multi Super speciality Hospital, Omandurar Estate, Chennai, with packages (1) Gold Rs.1,000/- (2) Diamond Rs.2,000/- and (3) Platinum Rs.3,000/- and it was inaugurated by the Hon'ble Chief Minister on 08.06.2018. In addition to the above packages, the additional package of Amma Platinum plus Package –IV was introduced with effect from 07.06.2019 at a cost of Rs.4,000/- as detailed below:-

| | |
|--|---|
| Amma Platinum plus Package – IV- Rs.4,000/- | Package –III as mentioned above Plus Vision testing, Glaucoma Testing, Refractory errors testing, Retinal Testing Colour vision testing, Treadmill Lung Functioning test |
|--|---|

18,257 persons have availed the Amma Master Health Checkup in the Omandurar Hospital

4.7 LINEAR ACCELERATOR and PET CT-SCAN

A New Radiation Oncology Block with one Linear Accelerator (LINAC) machine has began functioning in Tamil Nadu Government Multi Super speciality Hospital, Omandurar Estate, Chennai at a cost of Rs.29.50 crore and in Royapettah Government Hospital at a cost of Rs.26.21 Crore for the treatment of cancer patients. Similarly one PET- CT Scan, has been installed at Government Rajaji Hospital Madurai, at a cost of Rs.10.00 crore.

Chapter -5

MEDICAL AND RURAL HEALTH SERVICES

5.1 The Director of Medical and Rural Health Services is in-charge of secondary care services in Tamil Nadu. The Directorate renders its services through the grid of 29 District Headquarters Hospitals, 206 Taluk Hospitals, 67 Non-Taluk Hospitals, 7 Women and Children Hospitals, 11 Dispensaries, 2 Tuberculosis Hospitals, 7 Leprosy Hospitals and 1 Rehabilitation Institution cum Hospital.

In the chain of medical services, the Taluk and Non-Taluk Hospitals are the First Referral Units, and the District Headquarters Hospitals serves as a secondary care referral units. 104 Comprehensive Emergency Obstetrics and Newborn Care (CEmONC) units, 110 Newborn Stabilization Units (NBSUs) and 49 Sick New Born Care Units (SNCUs) are providing Maternal and Child Health Services. Further through 55 Tamil Nadu Accident and Emergency Care Initiative centres emergency services are provided.

5.2 The Directorate of Medical and Rural Health Services acts as the critical link between the primary and tertiary care facilities. The following medical services are rendered by the District Headquarters Hospitals / Taluk/ Non-Taluk Hospitals:-

- Out - Patient and In-Patient Services
- Antenatal and Postnatal care
- Comprehensive Emergency Obstetrics and Newborn Care (CEmONC) with 24 hours delivery care
- Newborn Stabilization Units (NBSUs)
- Sick New Born Care Units (SNCUs)
- New Born Intensive Care Unit
- Medicine, Surgery, Obstetrics and Gynaecology, Ophthalmology, E.N.T, Venerology, Orthopaedics, Anaesthesiology, Child Health, Dental, Psychiatry, Ambulance Services, Laboratory Services, Leprosy, Tuberculosis, Diabetology and Cardiology
- Non-Communicable Disease(NCD)

- Accident and Emergency Services
- Family Welfare
- National TB Elimination Programme (NTEP)
- Blindness Control Programme
- Deafness control Programme
- District Mental Health Programme.
- Tamil Nadu Accident and Emergency Care Initiative (TAEI)
- Poison Treatment Centre
- De-Addiction Centre
- Day Care Chemotherapy
- Pain and Palliative Care

5.3 Hospital Management Information System (HMIS) is being adopted by the Directorate for assement and monitoring of quality services.

5.4 ADMINISTRATIVE STRUCTURE

| | |
|--|---|
| DIRECTOR OF MEDICAL AND RURAL HEALTH SERVICES | |
| <p>ADDITIONAL DIRECTOR OF MEDICAL AND RURAL HEALTH SERVICES (MEDICAL)- (PLANNING AND DEVELOPMENT)-(INSPECTION)- (TB)-(LEPROSY)-(ADMINISTRATION) JOINT DIRECTOR OF MEDICAL AND RURAL HEALTH SERVICES – (MEDICAL) (CEmONC) (ACT) (NCD)(TB)</p> | |
| FINANCIAL CONTROLLER | |
| Joint Director of Health Services | <ul style="list-style-type: none"> • District Headquarters Hospitals • Taluk Hospitals • Non-Taluk Hospitals • Dispensaries • Women and Children Hospital • TB Hospitals / Clinics • Leprosy Hospitals |

| | | |
|---|--|---|
| Deputy Director of Medical and Rural Health Services and Family Welfare | | Family Welfare Programme in the District |
| | | |
| Deputy Director of Medical Services (TB) | | TB Control Programme in the District |
| Deputy Director of Medical Services (Leprosy) | | Leprosy Control Programme |
| | | |

Chapter-6

PUBLIC HEALTH AND PREVENTIVE MEDICINE

'Public Health is the science and art of preventing disease, prolonging life, and promoting health through the organized efforts of society'

6.1 The Directorate of Public Health and Preventive Medicine of Tamil Nadu, formed during 1923, first in the country, is engaged in the above said context in protecting and promoting the health of the people. Prevention and control of communicable and non-communicable diseases like diabetes, hypertension and cancer, organizing and provision of community based maternity and child health services including immunization and family welfare are the three primary activities of the directorate. The Department of Public Health and Preventive Medicine in Tamil Nadu providing the Primary health care services in the State through 1,806 PHCs including 423 Upgraded Primary health centres in rural areas and 460 Urban Primary Health centres in urban

area including 140 Urban PHCs in Greater Chennai corporation to achieve quality services and **Health for All**. There are 8,713 Health Sub centres functioning in the State as first level of service delivery units for the public in primary health care.

6.2 The institutions which function under this Directorate include:

| | |
|--------------------------------|-------|
| Health Sub Centres | 8,713 |
| Primary Health Centres (Rural) | 1,806 |
| Primary Health Centres (Urban) | 460 |
| Block PHCs | 385 |
| Upgraded PHCs | 423 |

| Other Supporting Units | |
|-------------------------------------|----|
| Zonal Entomological Teams | 9 |
| District Public Health Labs | 31 |
| Filaria Control Units | 6 |
| Filaria and Malaria Clinics | 42 |
| Japanese Encephalitis Control Units | 3 |
| Water Analysis Labs | 4 |
| Regional Vaccine Stores | 4 |
| Regional Training Institutes | 7 |
| ANM Training Schools | 11 |

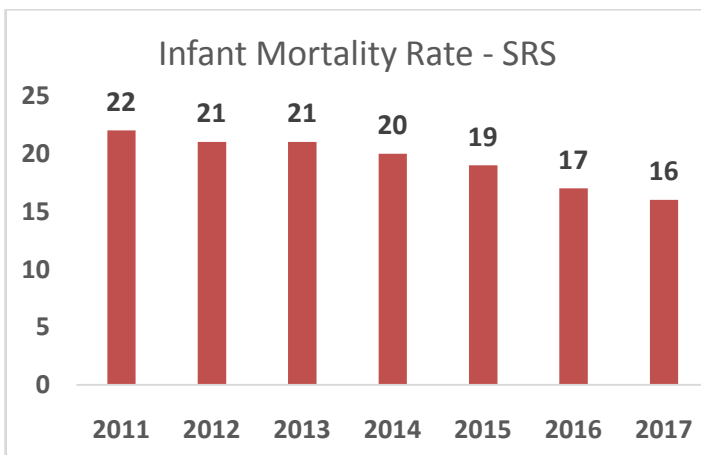
6.3 Administrative Structure

| |
|---|
| DIRECTOR |
| Additional Directors |
| Joint Directors (Programmes) |
| <ul style="list-style-type: none">• Financial Advisor and Chief Accounts Officer• Personnel Officer and Joint Director (Financial and Human Resource Management and Administration) |
| <ul style="list-style-type: none">• Deputy Directors of Health Services• Regional Entomologists• Principals of Regional Training Centres and ANM Schools• Health Officers |
| <ul style="list-style-type: none">• Block Medical Officers,• Medical Officers• Institutional and Field Health Functionaries• Village Health Nurses• Health Inspectors |

6.4 Improvements in Demographic and Health Indicators

Estimated mid-year population of the State in 2019 is 8.15 crores. The State has 43 Health Unit Districts (HUD) in addition to Chennai Corporation. The State has the lowest Total Fertility Rate (TFR) of 1.6 and an Infant Mortality Rate (IMR) of 16 per 1,000 live births as per Sample Registration System (SRS) 2017.

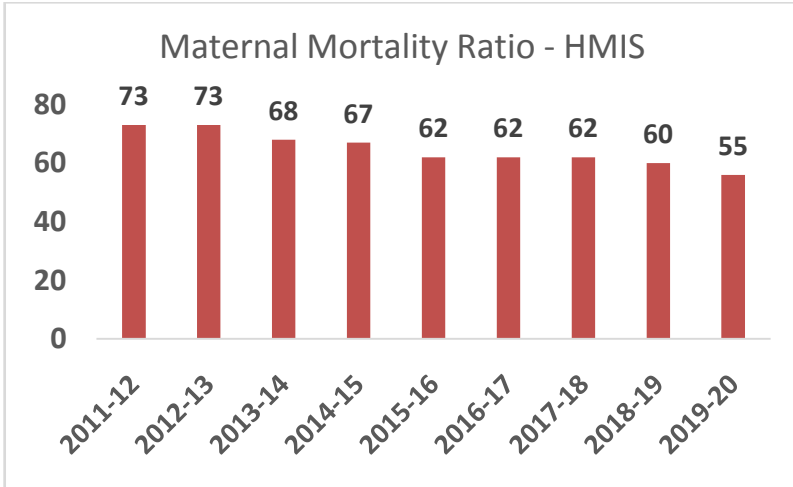
6.5 Infant Mortality Rate (IMR): The current level of IMR in Tamil Nadu for the year 2017 is 16 per 1,000 live births as per the sample registration system (2017) survey. The state ranks as the second lowest among the major states in the country. The state is taking multipronged efforts to bring down the infant Mortality Rate by focusing on the components such as the neo-natal mortality rate etc., the goal is to ensure that all preventable causes of infant deaths are eliminated by appropriate interventions. Government of Tamil Nadu aims to bring down Infant Mortality Rate(IMR) to less than 10 by the year 2023.



Source : Sample Registration System (SRS)

Maternal Morality Ratio :

The State has achieved the Maternal Mortality Ratio (MMR) of 63 as per the SRS 2015-17 and as per the State records has attained a figure of 55 per lakh live births in 2019-20. The State has achieved nearly 100% institutional delivery and 94.4% of Antenatal mothers register within the first trimester of pregnancy.



Due to the efficient drug distribution mechanism practiced the Out of Pocket Expenditure is the lowest in Tamil Nadu when compared to other States. This is possible due to the efficient drug distribution through the equitable distribution of Primary Health Centres, Hospital on Wheels, School Health Teams, Camps and campaigns across the State which focuses on rural areas.

6.6 Along with schemes under the National Health Mission,

State specific and land mark initiatives are given below.

- Dr.Muthulakshmi Reddy Maternity Benefit Scheme
- Strengthening of Basic Emergency Obstetric and Newborn Care (BEmONC) Services
- Birth Companion Programme
- 24 x7 delivery care services in all Primary Health Centres
- Birth Waiting Rooms
- Accessible Blood Storage Centres
- Menstrual Hygiene Programme
- Amma Baby Care Kits
- Amma Mahapperu Sanjeevini
- Two nutrition kits for the pregnant women

6.7 Primary Health Care:

Rural

In Tamil Nadu 1,806 Primary Health Centres are functioning in 385 Blocks for curative and preventive health care services to the rural

people. 24x7 delivery care service has been implemented in 1,715 Primary Health Centres. This service will be extended to the remaining 91 PHC's very soon.

Urban

In urban areas, 460 Urban PHCs are providing 24x7 Health Care Services.

6.8 Health Sub Centre(HSC)

The Health Sub Centre is the peripheral and first contact point between the public healthcare system and the community. One HSC is established for a population of 5,000 in plain areas and 3,000 in hilly areas. Each HSC is manned by one Auxiliary Nurse Midwife (ANM) known as Village Health Nurse (VHN) in Tamil Nadu and one Male Health Worker for every three HSCs. The average geographical area covered by a HSC is about 13.49 sq.kms. 8,713 HSCs are functioning in Tamil Nadu. HSCs are the hub for delivering Maternal and Child Health (MCH) and Family Welfare (FW) services to the people in the rural areas. HSCs are supported by Primary Health Centres (PHC), Community Health Centres (CHC),

Hospital on Wheels (HoW) and School Health Teams.

6.9 Primary Health Centres Buildings:

Rural

At present 1,715 Primary Health Centres are functioning in Government Buildings. 91 Primary Health Centres are functioning in rent / rent free building.

Urban

At present 317 Urban Primary Health Centres are functioning in Government Buildings. 3 Urban Primary Health Centres are functioning in rent free buildings.

6.10 Upgradation of Primary Health Centres (UGPHC) :

The Government as a policy have decided to provide atleast one 30 bedded health institution in each block in a phased manner where there is no Upgraded Primary Health Centre. The Upgraded Primary Health Centre is equipped with modern equipments like Ultra Sonogram, Portable ECG, Semi Auto Analyzer and improved laboratory facilities. Five Doctors

are posted to have UGPHC for providing 24X7 medical services.

At present 423 Primary Health Centres have been upgraded.

6.11 The Services provided by a Primary Health Centre:

1. Outpatient, inpatient services, antenatal care, delivery care and postnatal care, and family welfare services
2. Treatment of infectious diseases like diarrhea, fever and other infectious diseases
3. Community Based Maternal and Child Health Services
4. Prevention and Control of Communicable Diseases
5. Screening of Non-Communicable Diseases namely diabetes, hypertension and cancer and follow up
6. School Health Services - early identification and early treatment of 4Ds - Birth Defects, Delay in Development, Deficiency and

Diseases. This early intervention helps to improve the quality of life and longevity of the life of the child.

Implementation of various National Health Programmes like

- Reproductive and Child Health Programme
- Universal Immunization Programme
- National Family Welfare Programme
- National Anaemia Control Programme
- National Iodine Deficiency Disorder Control Programme
- National Water and Sanitation programme
- National Vector Borne Diseases Control Programme.
- National Diarrhoeal Diseases Control Programme
- National Tuberculosis Control Programme
- National Leprosy Eradication Programme
- National AIDS Control Programme
- Integrated Disease Surveillance Programme
- National Blindness Control Programme
- National Programme for Prevention and Control of Fluorosis
- National Programme for Prevention and Control of Deafness

- National Vitamin A Deficiency Disorder Control Programme
- National Tobacco Control Programme
- National Rural Health Mission Programmes

Camps and Campaigns

- i. Intensified Pulse Polio Immunisation camp
- ii. Mission Indradanush Campaign for improving immunization coverage
- iii. Intensified Diarrhoea Control
- iv. National Deworming Program
- v. Vitamin 'A' campaign
- vi. Speciality Medical Camps in rural areas
- vii. Fever treatment camps
- viii. School Health Camps Health education and awareness campaigns.

6.12 Comprehensive Primary healthcare Services Health and Wellness Centres

Comprehensive Primary healthcare Services; Universal Health Coverage (UHC) project has been piloted successfully in 3 pilot blocks of Veppur, Shoolagiri and Viralimalai in 3 Health Unit Districts (HUDs) of Perambalur, Krishnagiri and Pudukottai respectively covering 67 HSCs and 17 PHCs (including block PHCs) since 2016. In 2017-18, the program was up-

scaled to additional 39 blocks @ 1 block per HUD at a total cost of Rs. 2,474.07 lakhs. UHC aims to bring comprehensive set of services to the doorsteps of the people thereby reducing out-of-pocket expenditure. UHC also aims to address the healthcare needs of the people in the long-term. The full spectrum of essential, quality health services should be covered including health promotion, prevention and treatment, rehabilitation and palliative care. The Sub-Centre strengthening is the pillar for the UHC program. In the year 2018-19, Government made an announcement to transform 985 Health Sub-Centres, 716 Additional PHCs and 214 Urban PHCs to Health and Wellness Centres (HWCs) with Government of India support of Rs.9,357.47 lakhs (rural and urban). In 2019-20, the State will transform 796 Health Sub-Centres,668 Additional PHCs and 246 Urban PHCs to Health and Wellness Centres (HWCs) with Government of India support of Rs. 13,573.64 lakhs (rural and urban).

The roll out plan for HWC in Tamil Nadu is given below:

| Year | HSCs | Addl. PHCs | Urban PHCs | Total |
|--|--------------|-------------------|-------------------|--------------|
| 2017-18 | 67 | 14 | - | 81 |
| 2018-19 | 918 | 702 | 214 | 1,834 |
| 2019-20 | 796 | 668 | 246 | 1,710 |
| 2020-21 (proposed in PIP 2020-21) | 667 | - | - | 667 |
| Total | 2,448 | 1,384 | 460 | 4,292 |

6.13 Health and Wellness services under UHC

The HWCs provide a set of 12 comprehensive services including preventive, promotive, curative, rehabilitative and palliative care for a package of services related to

RMNCH+A, communicable diseases, non-communicable diseases, Ophthalmology, ENT, Dental, Mental, Geriatric care, treatment for acute simple medical conditions and emergency and trauma services. The HWCs would be the window of opportunity for strengthening the primary health care system in our State.

6.14 Hospital on Wheels Programme

The Hospital on Wheels Programme was launched in the year 2011-12 to provide health care services in remote villages and far flung areas. At present, 416 Hospital on Wheels team are functioning in the State. Each team consists of One Doctor, One Staff Nurse, One Lab Technician, One Driver and One Attender cum cleaner and a well equipped laboratory facilities for performing laboratory test like Blood, Urine and Sugar test etc., The ultimate aim of Hospital on Wheels Programme is to provide high quality medical care with focus on mother and child health services and non communicable diseases covering all the remote villages and hamlets as per the Fixed Tour Programme(FTP) specifically for each block. Information boards about the day and time of visit are permanently

displayed at the camp site. 40 camps are being conducted per month per block as per FTP. High risk areas like temporary settlements are given high priority. People with diabetes and hypertension are given medicines for one month period.

Further, 10 Mobile Medical units were created in Corporations (5 for Chennai Corporation and 1 each for Tiruppur, Coimbatore, Salem, Madurai and Tiruchirapalli Corporations) at a cost of Rs. 268.82 Lakhs. Moreover 50 Mobile Medical Clinics were sanctioned to provide medical facilities to the construction workers at a cost of Rs.16.398 crores.

During the year from 2011-2012 to 2018-2019, 15.00 Lakh camps were conducted and 10.53 crore persons were benefitted. During the financial year 2019-2020 (April to January 2020), 1.72 Lakhs camps have been conducted and 1.47 crore persons have been benefitted.

6.15 Dr. Muthulakshmi Reddy Maternity Benefit Scheme

Dr. Muthulakshmi Reddy Maternity Benefit Scheme (MRMBS) is being implemented with a

noble objective of providing assistance to poor pregnant women/mothers to meet expenses on nutritious diet, to compensate the loss of income during motherhood and to avoid low birth weight of newborn babies and aimed at reducing IMR and MMR. Government has enhanced the assistance from Rs.12,000/- to Rs.18,000/- per beneficiary. Under this scheme, Rs.14,000/- cash benefit is disbursed in the bank account of the beneficiaries and two "Amma Maternal Nutrition Kits" each worth of Rs.2,000/- comprising of iron tonic and nutrition supplements to reduce anaemia amongst the pregnant women and to improve the birth weight of infants are distributed to the beneficiaries. In the Budget Estimates of 2019-2020, Rs.957.87 crore has been allocated for this flagship scheme.

Performance under the scheme

| Year | Amount allotted (Rs.in Crores) | Amount Disbursed to Beneficiaries (Rs. in crores) | No. of Beneficiaries |
|--|--------------------------------|---|----------------------|
| 2011-2012 | 660.00 | 515.11 | 6,73,093 |
| 2012-2013 | 716.77 | 639.54 | 6,70,313 |
| 2013-2014 | 716.77 | 652.16 | 6,63,623 |
| 2014-2015 | 667.00 | 658.75 | 6,65,240 |
| 2015-2016 | 667.00 | 621.77 | 6,35,225 |
| 2016-2017 | 667.00 | 609.37 | 6,49,904 |
| 2017-2018 | 675.00 | 640.68 | 7,14,718 |
| 2018-2019 | 957.87 | 895.79 | 7,06,792 |
| 2019-2020 (as on 10.03.2020) | 957.87 | 842.25 | 7,38,519 |
| Total | 6,685.28 | 6,075.42 | 61,17,427 |

6.16 Deworming

The Government of Tamil Nadu is implementing the National Deworming Day (NDD) programme in coordination with Government of India, covering all children in the age group of 1-19 years by providing Albendazole Tablet through schools and anganwadi centres. Children between the age group of 1 to 19 years are at risk of infection with Soil Transmitted Helminths (STH) – Hook worm, Round worm, and Pin worm etc., due to poor sanitation and hygiene conditions. STH are easily transmitted to children through contact with infected soil. Periodic deworming of children together with improvement of water and sanitation, health education and life style changes can reduce the transmission of Soil Transmitted Helminths.

First National Deworming Day (NDD) was conducted on 10th February 2015 with the objective to control infection and to improve the

overall health and nutritional status, access to education and quality of life of children. National Deworming Day (NDD) is conducted as on 10th of February and August every year and 2.01 crore children are benefited every year through this programme.

National Deworming Day for the year 2019 was conducted on 8th February, 2019 followed by mop up on 14th of February, 2019. 2.20 crore children were benefited through this programme. In second round on 8th August, 2019 followed by Mop up on 16th of August, 2019 a total no of 2.19 Crores (96.77 %) out of 2.26 crores targeted children have been benefited.

Three stakeholders have played an important role under the NDD programme. They are:

- Health and Family Welfare Department
- Education Department
- Integrated Child Development Services (ICDS)

The successful conduct of deworming programme will help in reduction of Soil transmitted Helminthis infection thereby reducing anaemia and malnutrition to a great extent.

6.17 Amma Baby Care Kit

Amma Baby Care Kit scheme is being implemented in all the Government Health facilities from 8th September 2015. Amma Baby Care Kit bag containing 15 healthcare items are provided to the new born babies, born in Government health facilities with the objective to improve the hygiene of the postnatal mothers for self and baby care. Under this scheme Rs.50 crores is allotted every year which is deposited into Tamil Nadu Medical Service Corporation Limited, for the supply of Amma Baby Care Kits. Number of mothers who had been given kit are as follows:

| Sl. No. | Period (April to March) | No. of Beneficiaries |
|----------------|--------------------------------|-----------------------------|
| 1 | 2015-16* | 3,43,143 |
| 2 | 2016-17 | 5,40,125 |
| 3 | 2017-18 | 4,48,297 |
| 4 | 2018-19 | 4,38,828 |
| 5 | 2019-20** | 4,23,974 |

*- Sep 2015 to March 2016

** - April 2019 to February 2020

6.18 Amma Arokiya Scheme

The Honourable Chief Minister has announced Amma Arokiya Scheme under Rule 110 in Legislative Assembly on 25.08.2015. It is an innovative programme to provide health promotion, prevention, early detection and treatment of diseases by providing free access to basic health check up to all the people in the age group of 30 years and above on annual basis in 400 Upgraded PHCs / Block PHCs. The programme was launched on 01.03.2016. From 03.03.2016 onwards, the programme is extended to all 400 Upgraded / Block PHCs. Under this programme, the public can utilize the investigation services free of cost in all

Upgraded PHCs / Block PHCs on weekly 2 days i.e. Thursdays and Fridays. The following 25 investigations are being done in these camps:-

- 1) Height
- 2) Weight
- 3) BMI
- 4) Blood Pressure
- 5) Haemoglobin
- 6) Blood Grouping and Typing
- 7) Random Blood Sugar
- 8) Blood Cholesterol
- 9) Blood-Creatinine
- 10) Urine–Albumin
- 11) Urine-Sugar
- 12) Urine–Deposits
- 13) Screening for Ca cervix
- 14) Screening for Ca Breast
- 15) Screening for Oral Cancer
- 16) Ophthalmic Screening for visual acuity and cataract,
- 17) Screening for Dermatological condition
- 18) General examination by the Medical Officers
- 19) Total Blood Count
- 20) Blood-Differential Count
- 21) Peripheral Smear
- 22) Ultra Sound abdomen (if needed),
- 23) ECG based on symptoms
- 24) X-Ray (If needed)
- 25) Sputum Microscopy (AFB).

If any person affected by disease is identified in the above said investigations, they are treated in the referral hospitals through CMCHIS. Adequate medicine will be given every month for the patients who are affected by Diabetic/Hyper tension. Further, the patients who require higher level treatment such as major surgeries are referred to the District Government Hospitals and Government Medical

College Hospital. The scheme is extended to 31 Urban Primary Health Care Centre.

6.19 Menstrual Hygiene Programme

The Menstrual Hygiene Programme was launched by Hon'ble Chief Minister of Tamil Nadu on 27.03.2012. The objective of the scheme is to increase awareness among adolescent girls on menstrual hygiene, build self-esteem and empower girls for greater socialization to increase access and use of high quality sanitary napkins and to ensure safe disposal of sanitary napkin. Priceless belt type sanitary napkins are produced by Self Help Groups of Tamil Nadu Corporation for Development of Women(TNCDW). These sanitary napkins are procured through the Tamil Nadu Medical Services Corporation Ltd., after quality check and supplied to the districts concerned. Under this scheme 3 packs of priceless beltless sanitary napkins containing 6 pads per pack are distributed once in every 2 months to the adolescent girls in the age group of 10-19 years. Totally 18 packs are given for a year. Both school and non school going girls in rural areas are covered. From April 2019 to

February 2020, 31,83,023 adolescent girls have benefitted every month. Post natal mothers who delivered in Government health institutions and prisons are provided with 7 packs each (6 pads per pack). From April 2019 to January 2020, 4,23,544 post natal mothers have been benefitted. Also priceless belt type sanitary napkins of 7 packs each (6 pads per packs) is provided to women prison inmates. From April 2019 to January 2020, 1,337 women prison inmates have benefitted. Priceless belt type sanitary napkins of 18 packs (6 pads per pack) per year are given to 1,417 female in-patients at Institute of Mental Health, Chennai during 2019-2020.

6.20 National Iodine Deficiency Disorders Control Programme(NIDDCP)

Iodine is an essential micro nutrient required daily at 100-150 microgram for normal growth and development. Deficiency of iodine may cause Goitre, low I.Q., Neuromuscular weakness, Endemic cretinism, still birth, Hypothyroidism, defect in vision, hearing and

speech, Spasticity, Intrauterine death and Mental retardation.

6.21 The State is focusing on the supply of iodized salt in place of common salt and assessing the extent of Iodine deficiency disorders and the impact of iodized salt, laboratory monitoring of iodized salt and urinary iodine excretion and Health education and publicity. The programme also focuses on monitoring of Iodine Deficiency Disorders(IDD) and Estimation of Iodine in the Salt and Urine samples in the 21 endemic districts in the State, identified through a survey which will be periodically repeated once in every 5 years to assess the IDD and the impact of Iodized salt. The provisions of the Food Safety and Standards Act, 2006 and Rules, 2011 are being effectively utilized to ensure compliance.

6.22 Grievance Redressal:

2,580 Closed User Group (CUG) mobile connections have been distributed to all the nodal officers and district level officers in the Health Department for the real time grievance redressal related to health care service.

6.23 Facilities for Lactating Mothers:

Babies who are breastfed are generally healthier and achieve optimal growth and development compared to those who are fed formula milk. Infants who are not breastfed are at an increased risk of illness that can compromise their growth and raise the risk of death or disability. Breastfed babies receive protection from illness through the mother's milk. With the objective of providing privacy for travelling mothers, breastfeeding rooms are provided in 352 bus stands / terminus, since 03.08.2015.

Chapter – 7

FAMILY WELFARE PROGRAMME

7.1 The National Family Welfare Programme is being implemented in Tamil Nadu State since 1956 as 100% centrally sponsored programme. Tamil Nadu is a pioneer in the implementation of the Family Welfare programmes in the country. In view of commendable progress in reducing the birth rate, the focus has shifted from a "Target based approach" to "Community Needs Assessment Approach" wherein focus is given to meet out the needs for family planning services and thus improving maternal and child health.

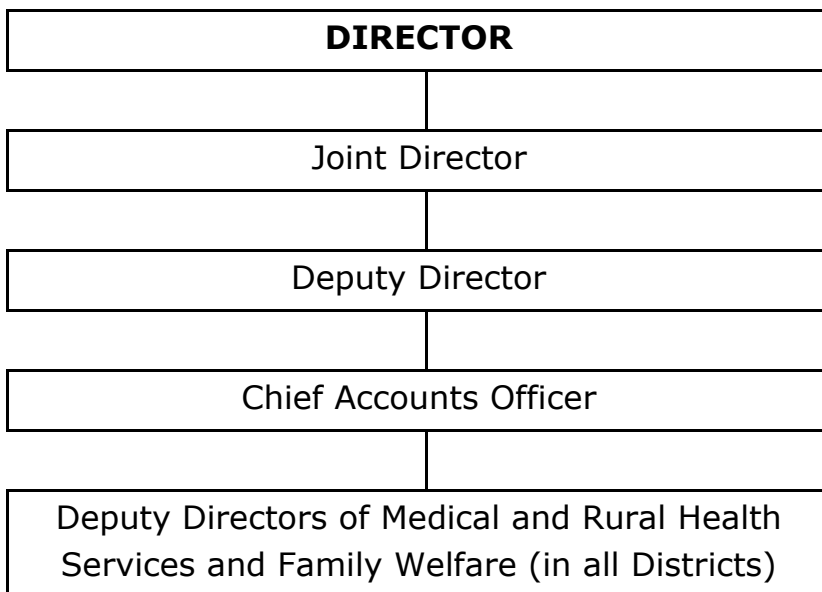
7.2 Demographic Indicators:

As per 2011 census, the population of Tamil Nadu was 7.21 crore with decadal growth rate of 15.6%. It accounts for 6% of the country's total population. The demographic scenario of the State (SRS) is furnished below:

| Sl. No | Indicators | Current level |
|---------------|------------------------------------|--------------------------|
| 1 | Crude Birth Rate (2017) | 14.9 /1,000 population |
| 2 | Crude Death Rate (2017) | 6.7 / 1,000 population |
| 3 | Total Fertility Rate (2017) | 1.6 |
| 4 | Infant Mortality Rate (2017) | 16.0 /1,000 live births |
| 5 | Maternal Mortality Ratio (2015-17) | 63 /1,00,000 live births |
| 6 | Natural Growth Rate (2017) | 0.83 % |

(Source: SRS – 2017)

7.3 Administrative Structure



7.4 Family welfare services available in the State :

The following permanent and temporary family welfare services are provided free of cost to the eligible couples in all the Government health facilities.

- Permanent family welfare methods like No Scalpel Vasectomy, Conventional Vasectomy for male and Mini-lap

sterilization, Puerperal sterilization and Laparoscopic Sterilization for female.

- Temporary family welfare methods like Copper-T, Oral Contraceptive Pills, Mala N, Centchroman Pills (Chhaya), Injectable Contraceptive (Antara), Condoms and Emergency contraceptive pills are used for birth spacing.
- Medical Termination of Pregnancy includes Manual Vacuum Aspiration (MVA) method and Medical Method of Abortion (MMA).

7.5 Facilities providing family welfare services in the State :

The facilities providing family welfare services in our State are listed in the table below:

| | | |
|---|--|-------|
| 1 | Primary Health Centres | 1,422 |
| 2 | Community Health Centres (Block) | 385 |
| 3 | Urban Primary Health Centres | 460 |
| 4 | Health Sub-Centres | 8,713 |
| 5 | Rural Family Welfare Centres attached with PHC/CHC | 382 |
| 6 | Post Partum Centres | 110 |
| 7 | Urban Family Welfare Centres | 108 |
| 8 | Voluntary Organisations | 27 |
| 9 | Approved Private Nursing Homes | 2,462 |

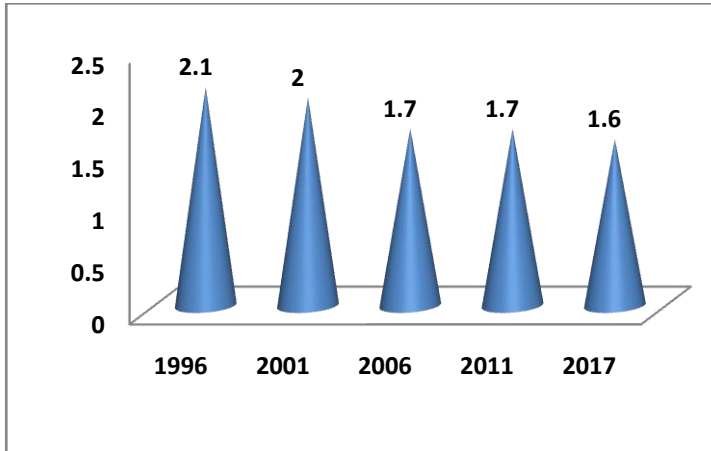
7.6 Family Welfare Outcomes

7.6.1 Total Fertility Rate (TFR):

Total Fertility Rate indicates the average number of children expected to be born to a woman during her reproductive span of 15-49 years of age. Tamil Nadu is one of the States in the country with low TFR of 1.6, which is well below national level of 2.2. Tamil Nadu is

consistently maintaining the TFR at 1.6 for the past three years.

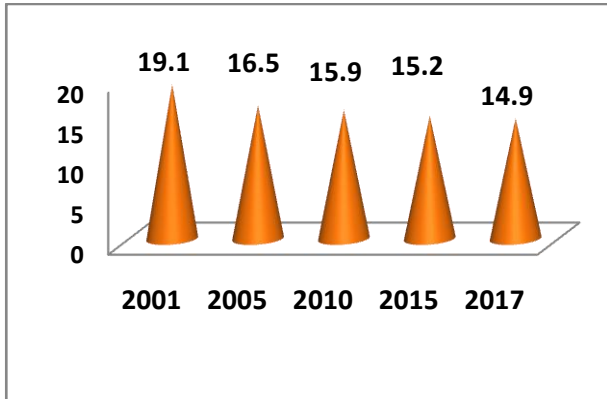
Trends in Total Fertility Rate (TFR)



7.6.2 Crude Birth Rate (CBR):

Crude Birth Rate is number of live births per 1,000 population in a year. The crude birth rate in Tamil Nadu is 14.9 as per the Sample Registration System (SRS) - 2017.

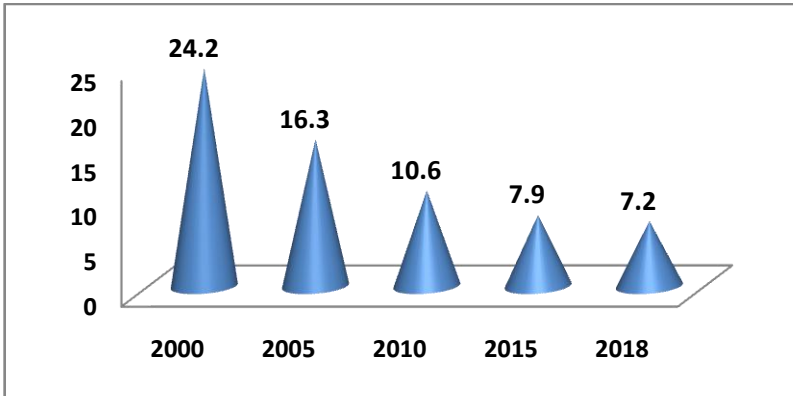
Trends in Crude Birth Rate:



7.6.3 Higher Order Birth:

Higher Order Birth (HOB) means mothers with three and above live children. It is 7.2% in Tamil Nadu as against national HOB value of 21.7%. These mothers are given counselling to accept sterilization by organising special sterilization camps in health facilities of the blocks in the State to reduce the Higher Order Birth.

Trends in Higher Order Birth:



7.7 Schemes implemented under the Family Welfare Programme

7.7.1 Male sterilization:

No Scalpel Vasectomy (NSV) is a simple procedure of family planning sterilization technique for male. Special awareness campaigns are being conducted to motivate males to accept No Scalpel Vasectomy. NSV camps are conducted in all the 385 blocks in the State during the year 2019-2020 at a cost of Rs.38.5 Lakhs. Special NSV fortnight campaign was conducted during November and December months in 2019. 827 cases of NSV were performed in the year 2019-20(Up to January).

7.7.2 Female Sterilization:

Sterilization services for female are provided in 23 Medical College Hospital, 31 Government Head Quarters Hospitals, 226 Government hospitals, 400 Primary Health Centres, 26 Health Posts in Municipal Corporations and 2,462 approved private nursing homes in the State. Postnatal mothers having two living children are provided sterilization services before discharge from the hospitals. Apart from providing sterilization to postnatal mothers, the interval sterilization Mini-Lap / TAT and Laparoscopic surgery is provided to eligible mothers.

7.7.3 Post Partum Intrauterine Contraceptive Device (PPIUCD):

Primi mothers are counselled to accept the PPIUCD insertion immediately after delivery. The doctors and staff nurses are trained in the technique of IUCD insertion. During the year 2019-20, a total of Rs.1.95 lakhs. PPIUCD insertions were done. A sum of Rs.150/- is paid to the service providers per case as incentive and Rs.300/- is paid to the acceptor for accepting PPIUCD.

7.7.4 Injectable contraceptives: Depot Medroxy Progesterone Acetate (DMPA) – Antara :

The Injectable contraceptive, Depot Medroxy Progesterone Acetate (DMPA) is a new contraceptive launched in 2017. It is available in all Government health facilities. It is given by a trained Doctor/Staff Nurse/ANM. In the year 2019-2020 (Up to January) 38,449 mothers are covered by Antara.

7.7.5 Centchroman pills (Chhaya):

Centchroman pill is a new non hormonal contraceptive pill introduced in all public health facilities in the name of Chhaya. In the year 2019-2020 (up to January) total number of mothers covered by Chhaya is 97,587.

7.7.6 Medical Termination of Pregnancy (MTP) Programme :

The Government and private institutions have performed 77,540 MTPs in 2019. In order to provide safe abortion services to the needy mothers, the doctors of PHCs and Government hospitals are imparted training on MTP technique.

7.8 Strengthening of temporary family welfare methods in Tribal Areas:

The practice of adopting temporary family planning methods is being popularized among the tribal people by home delivery of contraceptives like CC, oral pills, E-pills by VHN and ASHA.

7.9 Family Planning Logistic Management Information System (FP-LMIS) Training:

Government of India have developed a web portal - Family Planning Logistic Management Information System (FP-LMIS) to upload and monitor the supply chain of family welfare contraceptives from national level to ASHA level through web based, mobile app based and SMS based system. The FP-LMIS training is completed in all the following three levels 1.State level training, 2.District level training 3. Block level training (Medical Officers, Pharmacists, VHN, UHN). Now indent for contraceptives are placed online through FP-LMIS at the districts and State level.

7.10 Information, Education and Communication Activities:

To sensitize the eligible couples to accept permanent and temporary family planning methods, the following IEC activities are conducted in rural / urban areas is all over the State.

- i. Every year on 11th July in the State, District and Block levels the World Population Day is celebrated to sensitize about population crisis, to emphasize small family, to promote gender equality, spacing methods and to educate about age of marriage.
- ii. For male sterilization, new method of No Scalpeal Vasectomy (NSV) fortnight is being celebrated throughout the State once in a year.
- iii. Family Welfare dramas are conducted at block level emphasizing small family, gender equality, spacing and increasing the age of marriage and reduction of Higher Order Birth.
- iv. Advertisements through FM rainbow radio stations is broadcasted.

- v. Family planning methods are also exhibited in the trade fair exhibitions at State and district level to create awareness.
- vi. LED Boards depicting the FW method are also displayed in hospitals.

7.11 Family Planning Indemnity Scheme (FPIS):

The Government of India introduced the family planning indemnity scheme with effect from 1st April 2013 with the following insurance benefits for the family welfare sterilization acceptors and service providers:

| | |
|---|-------------|
| Death following sterilization in hospital or within 7 days from the date of discharge from the hospital | Rs.2,00,000 |
| Death following sterilization within 8 to 30 days from the date of discharge from the hospital | Rs.50,000 |

| | |
|--|---|
| Failure of sterilization leading/not-leading to child birth | Rs.30,000 |
| Cost of treatment upto 60 days arising out of complication from the date of discharge | Actual cost not exceeding Rs.25,000 |
| Indemnity insurance per doctor per facility but not more than 4 cases per doctor in a year | Up to Rs.2.00 lakh per case of litigation |

7.12 State and District Quality Assurance Committees:

State level and District level Quality Assurance Committees are constituted to ensure the quality of family welfare services provided in the State. These committees will review the deaths, failures and complications arising out of sterilization and recommend for the payment of insurance claims and improvement of the quality of the services.

7.13 Compensation to Sterilization Acceptors:

Compensation for loss of wages to the sterilization acceptors are paid in the State as detailed below:

| | |
|---|----------|
| Acceptors of male sterilization in public health facilities | Rs.1,100 |
| Acceptors of female sterilization belonging to below poverty line and SC / ST in public health facilities | Rs.600 |
| Acceptors of female sterilization belonging to above poverty line in public health facilities | Rs.250 |

Chapter - 8

MEDICAL AND RURAL HEALTH SERVICES

(Employees' State Insurance Scheme)

8.1 The Employees' State Insurance Scheme of Tamil Nadu is a statutory body functioning under ESI Corporation, New Delhi. It has 10 ESI Hospitals and 220 ESI Dispensaries functioning under it. The doctors and para-medical staff are placed from the Health and Family Welfare department.

8.2 ESI Medical College at Coimbatore has been added to the Government Medical Colleges functioning under Government of Tamil Nadu. The Hon'ble Prime Minister of India had handed over this college in the year 2016 to the Government of Tamil Nadu.

8.3 The administration of ESI dispensaries in this State is done by 4 Regional Administrative Medical Officers (ESIS) functioning from Chennai, Coimbatore, Madurai and Salem.

8.4 Out of the 10 ESI Hospitals in Tamil Nadu, 2 at Chennai viz,, K.K. Nagar and Tirunelveli are under the direct control of the ESI

Corporation, New Delhi. The remaining 7 ESI hospitals are under the control of the Director of Medical and Rural Health Services (ESIS), Tamil Nadu and 1 ESI Hospital, Coimbatore is under the control of Director of Medical Education, Tamil Nadu.

8.5 All the 4 regions have Central Medical Stores (ESIS) to supply drugs and dressings to various ESI Dispensaries. The administrative control of all the personnel comes under the Director (ESIS), Joint Director (ESIS) and Deputy Director (ESIS) functioning from Chennai. In addition to the 4 Regional Administrative Medical Officers (ESIS), there are 7 Medical Superintendents for 7 State run ESI Hospitals viz. Chennai Ayanavaram, Madurai, Sivakasi, Trichy, Salem, Vellore and Hosur.

8.6 The ESI dispensaries provide primary care to the insured population and ESI hospitals provide secondary and tertiary care. The details of the activities of this department have been brought out in the Labour and Employment department Policy Note.

Chapter - 9

INDIAN MEDICINE AND HOMOEOPATHY

9.1 In Tamil Nadu, the Directorate of Indian Medicine and Homoeopathy governs the functioning of AYUSH (Ayurveda, Yoga and Naturopathy, Unani, Siddha and Homoeopathy) System. AYUSH is a heterogeneous group of indigenous medical system of India. AYUSH operates on the principle

“Predictive Preventive and Personalized health care”

AYUSH system’s unique and holistic approach considers body, mind and spirit with its relationship to the nature.

- Siddha system of medicine is considered to be the ancient indigenous medical system of India, having its origin in Tamil Nadu, dated around 3000 BC. Siddha Medical codified literatures are documented in Tamil Language and hence it is called TAMIL MARUTHUVAM. Large volume of Siddha Medicinal Preparations is documented orally and in Palm

manuscripts and is passed on *from generation to generation*. These Siddha literatures in palm manuscripts *have been digitized* and preserved in hard disk at the Directorate of Indian Medicine and Homoeopathy.

- Siddha and Ayurveda system of Indian Medicine are like identical twins with many similarities and certain differences. The Literatures of the Ayurveda are documented in Sanskrit Language. Siddha and Ayurveda are person centric medicine which deals with healthy life style, health promotion, sustenance, disease prevention and treatment. The line of treatment in Siddha and Ayurveda is based on bio regulating forces called three humors (*Vadham, Pitham, Kapam*).
- Unani Medicine, an Arabic origin, has all its literary documentation in Urdu. It has great reputation in Indian Health care system for several centuries and has become a part of Indigenous Medicine.
- Homoeopathy medicine is of German origin and is one of the recognized

indigenous medicine of India *having a global recognition.*

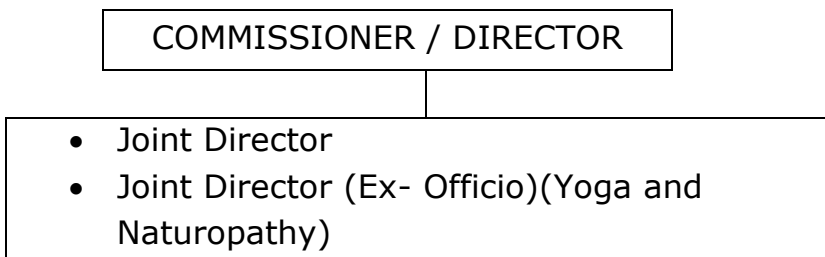
- Yoga and Naturopathy is an art and science of natural healing and healthy living. This system of medicine treats the patients with yoga therapy, diet therapy, Hydro therapy, herbal food supplements, acupuncture, acupressure etc., This system not only eradicates the illness but also changes the person's perspectives of health and diseases. Yoga and Naturopathy system is based on the premise that good health is the harmony between body, mind and soul.

Every Medical system has its own merits and limitations. The present health scenario needs an integrated health care approach for the benefit of the patients. In this aspect Tamil Nadu stands as a role model in integrating all the AYUSH system. We feel proud that Tamil Nadu is the first State in India to have all the five systems of AYUSH under one roof at the

Aringnar Anna Government Hospital. As per WHO 70 percent of the world population depends on Indigenous Medicine for their Healthcare. In India, Tamil Nadu is a pioneer in promoting AYUSH as an integrated system to fulfill the global Health Care requirement.

Administrative Structure

9.2 The department of Indian Medicine and Homoeopathy was established by the Government of TamilNadu in the year 1970. The main objective of this department is to impart quality education for the UG and PG degree courses of Indian Medicine which includes all the five systems (Siddha, Ayurveda, Unani, Homoeopathy, Yoga and Naturopathy). The major role is to provide healthcare for various ailments in all the five systems through 1,539 clinics functioning under this department.



| |
|--|
| <ul style="list-style-type: none"> • Chief Scientific Officer / Director, Research and Development Wing |
| <ul style="list-style-type: none"> • Principals of Government Siddha, Ayurveda, Unani and Yoga and Naturopathy, and Homoeopathy Medical Colleges |
| <ul style="list-style-type: none"> • State Licensing Authority (Indian Medicine) |
| <ul style="list-style-type: none"> • Government Analyst, Drugs Testing Laboratory (Indian Medicine) |
| <ul style="list-style-type: none"> • Superintendent, Arignar Anna Government Hospital of Indian Medicine, Chennai |
| <ul style="list-style-type: none"> • District Siddha Medical Officers |
| <p>Government Siddha, Ayurveda, Unani, Yoga and Naturopathy, and Homoeopathy Dispensaries attached to Government Hospitals/ PHCs and ISM wards in Government Hospitals</p> |

9.3 The salient features of Indian Medicine and Homoeopathy department are:

- Offering holistic healthcare to public by opening Indian System of Medicine and Homeopathy (ISM & H) wings at various locations in all the districts.

- Providing quality education in Siddha, Ayurveda, Unani, Yoga and Naturopathy and Homoeopathy for UG and PG students with all the necessary infrastructure for gaining systematic knowledge in the respective system.
- Promoting research and development activity in ISM & H for encouraging the manufacture of high quality standard ISM&H drugs and therapies.
- Upgrading the existing Government Indian Systems of Medicine and Homoeopathy Medical Colleges and to improve the standard of Medical Education in these systems
- Establishing *International Centres of Excellence* in the systems of Siddha, Ayurveda, Unani, Yoga and Naturopathy and Homoeopathy.
- Ensuring availability of quality drugs to public by monitoring quality drug manufacturing practices.

ISM & H Health Services

9.4 The availability of ISM & H Government centres are as follows:

| System | No. of Medical Centres |
|----------------------|-------------------------------|
| Siddha | 1,080 |
| Ayurvedha | 104 |
| Unani | 67 |
| Yoga and Naturopathy | 178 |
| Homoeopathy | 110 |
| Total | 1,539 |

ISM & H Medical Education

9.5 Under Graduate degree courses, (BSMS/BAMS/BNYS/BUMS/BHMS) in Siddha, Ayurveda, Yoga and Naturopathy, Unani, Homoeopathy and Post Graduate degree courses [M.D (S), M.D (H) and M.D (Yand N)] in the systems of Siddha, Homoeopathy, Yoga and

Naturopathy under the administrative control of Indian Medicine and Homoeopathy department, imparted in the respective 6 Government Colleges and 30 Self Financing Colleges as follows:

| S. No | Medical System | No. of Government. Colleges | No. of Self-financing Colleges |
|--------------|-----------------------|------------------------------------|---------------------------------------|
| 1 | Siddha | 2 | 8 |
| 2 | Ayurvedha | 1 | 5 |
| 3 | Unani | 1 | 0 |
| 4 | Yoga and Naturopathy | 1 | 9 |
| 5 | Homoeopathy | 1 | 8 |
| Total | | 6 | 30 |

The details of Government Medical Colleges functioning under Indian Medicine and Homoeopathy department are as follows:

- Government Siddha Medical College and Hospital, Palayamkottai, Tirunelveli District

- Government Siddha Medical College, Arignar Anna Government Hospital of Indian Medicine (AAGHIM) campus, Arumbakkam, Chennai
- Government Yoga and Naturopathy Medical College and Hospital, AAGHIM campus, Arumbakkam, Chennai
- Government Homoeopathy Medical College and Hospital, Tirumangalam, Madurai District
- Government Unani Medical College, AAGHIM Campus, Arumbakkam, Chennai
- Government Ayurveda Medical College and Hospital, Kottar, Nagercoil, Kanyakumari District

9.6 Tamil Nadu has the unique credit of being the only State in the country where Government Medical Colleges have been established in all the Indian Systems of Medicine and Homoeopathy. Number of seats available in the Government Colleges and the Private Colleges for admission to the Under Graduate

(UG) and Post Graduate (PG) Courses of ISM&H are given as follows:

| Sl. No | Discipline | Details of seats available for admission | | | | Grand Total | |
|--------------|--------------------|--|------------|--------------|-----------|--------------|------------|
| | | Government | | Private | | UG | PG |
| | | UG | PG | UG | PG | | |
| 1. | Siddha | 160 | 94 | 460 | -- | 620 | 94 |
| 2. | Ayurveda | 60 | -- | 250 | -- | 310 | -- |
| 3. | Unani | 60 | -- | 0 | -- | 60 | -- |
| 4. | Yoga & Naturopathy | 60 | 15 | 750 | -- | 810 | 15 |
| 5. | Homoeopathy | 50 | -- | 620 | 55 | 670 | 55 |
| Total | | 390 | 109 | 2,080 | 55 | 2,470 | 164 |

9.7 Co-location of Indian System of Medicine and Homoeopathy Centres to provide public Health Care: At present Indian System of Medicine and Homoeopathy treatment facilities are made available in Allopathy Medical College Hospital, Medical College at ESI, Multi Super Speciality Hospital, District Headquarters Hospitals, Taluk and Non-Taluk Hospitals and Primary Health Centres (including 475 wings

funded under National Rural Health Mission) and 72 AYUSH Wellness Clinics as shown below:-

| ISM&H centres run under State Budget | | | | | | |
|---|---------------|-----------------|--------------|-------------------|-------------------------------|--------------|
| Colleges | Siddha | Ayurveda | Unani | Homeopathy | Yoga & Naturopathy | Total |
| | 2 | 1 | 1 | 1 | 1 | 6 |
| Major Hospital | 3 | 2 | 1 | 1 | 1 | 8 |
| Medical College Hospital | 15 | 3 | 2 | 9 | 25 | 54 |
| Medical College@ESI | 1 | 1 | 1 | 1 | 1 | 5 |
| Multi Super Speciality Hospital. (Omandurar) | - | - | - | - | 1 | 1 |

| | | | | | | |
|---------------------------------------|------------|-----------|-----------|-----------|-----------|------------|
| District Head Quarters Hospital | 31 | 4 | 3 | 20 | 30 | 88 |
| Taluk Hospital | 191 | 2 | - | 8 | 31 | 232 |
| Non Taluk Hospital | 58 | 2 | 4 | - | - | 64 |
| PHC | 406 | 25 | 14 | 6 | 2 | 453 |
| Regular Dispensary | 13 | 6 | - | 5 | 1 | 25 |
| Tribal Dispensary | 7 | - | - | - | - | 7 |
| Mobile Dispensary | 1 | - | - | - | - | 1 |
| Rural Dispensary | 45 | 3 | - | - | - | 48 |
| Total | 773 | 49 | 26 | 51 | 93 | 992 |

| NRHM Schemes | | | | | | |
|--|------------|-----------|-----------|-----------|-----------|------------|
| NRHM at Taluk Hospital | 4 | - | 1 | - | - | 5 |
| PHC | 271 | 52 | 39 | 57 | 20 | 439 |
| Y & N Maternity Clinic (GPHC) | - | - | - | - | 29 | 29 |
| Y & N Maternity Clinic (Taluk Hospital) | - | - | - | - | 2 | 2 |
| Total | 275 | 52 | 40 | 57 | 51 | 475 |

| AYUSH Schemes | | | | | | |
|----------------------|--------------|------------|-----------|------------|------------|--------------|
| Hospitals under DME | - | - | - | - | 2 | 2 |
| Taluk Hospital | 4 | - | - | 1 | 30 | 35 |
| Non Taluk Hospital | 2 | - | 1 | - | - | 3 |
| PHC | 26 | 3 | - | 1 | - | 30 |
| Regular Dispensary | - | - | - | - | 2 | 2 |
| Total | 32 | 3 | 1 | 2 | 34 | 72 |
| GRAND TOTAL | 1,080 | 104 | 67 | 110 | 178 | 1,539 |

* A total number of 3,92,08,684 patients have been treated as Out-Patients and 3,50,914 patients have been treated as In-Patients in the above ISM&H centers, in the year 2019.

AYUSH Paramedical Courses

9.8 The following Diploma Courses are being conducted under self supporting scheme at Government. School of AYUSH Paramedical Courses at Arignar Anna Government. Hospital of Indian Medicine campus, Chennai and Government Siddha Medical College campus, Palayamkottai, Tirunelveli

(1) Diploma in Integrated Pharmacy

(2) Diploma in Nursing Therapy.

The courses are of two and half years duration and main objective is to make available institutionally qualified Pharmacists and Nursing Therapists in AYUSH system of medicine. The numbers of seats sanctioned for Diploma Course in Integrated Pharmacy and for Nursing Therapy are as follows:

| Sl. No. | Name of the Institution | Number of seats | | | Total |
|--------------|---|--------------------------------|--------------------|---------|------------|
| | | Diploma in Integrated Pharmacy | Diploma in Nursing | Therapy | |
| 1. | Government Siddha Medical College, Chennai | 50 | 50 | | 100 |
| 2. | Government Siddha Medical College, Palayamkottai, Tirunelveli | 50 | 50 | | 100 |
| Total | | 100 | 100 | | 200 |

9.9 State Drug Licensing Authority for Indian Medicine

- ❖ The grant or renewal of a license to manufacture for sale of Ayurveda, Siddha and Unani drugs is being done by the State Licensing Authority (IM) as per Drugs and Cosmetics Act, 1940 and Rules, 1945 with effect from 29.11.2007.
- ❖ The State Licensing Authority is also approving authority for approval of institutions for carrying out tests on Ayurveda, Siddha and Unani drugs and raw materials used in their manufacture on behalf of licensees for manufacture for sale of Ayurveda, Siddha and Unani drugs.
- ❖ As per Drugs and Cosmetics Act, 1940 the Government of Tamil Nadu has appointed and notified the Director of Indian Medicine as Controlling Authority for Ayurveda, Siddha, Unani drugs for the purpose of taking approval / direction /

permission to execute regulatory enforcement.

- ❖ As per Rule 170 of the Drugs and Cosmetics Act, 1940 and Rules, 1945, the State Licensing Authority (IM) have been empowered to scrutinize the advertisement applications of Ayurveda, Siddha, Unani drugs and allotting the unique identification number (UIN).
- ❖ The Drugs Inspectors (IM) are authorized to monitor advertisement of Ayurveda, Siddha, Unani drugs for the areas within their respective jurisdiction under Subsection (1) of Section 8 of Drugs and Magic Remedies (Objectionable Advertisements) Act, 1954 and Rules, 1955

State Drug Testing Laboratory

9.10 The State Drug Testing Laboratory ensures quality of Ayurveda, Siddha, Unani Drugs which are prepared from different raw drugs in Indian Systems of Medicine. The primary function of Drug Testing laboratory (I.M) is to test the quality of statutory samples lifted and sent by

the Drug Inspector (I.M) in discharging of their statutory function under section 33G of Drugs and Cosmetics Act, 1940. The Laboratory has been conferred with the statutory status. Advanced and modern equipment have been installed in the laboratory for the purpose of Standardization and quality control of Ayurveda, Siddha and Unani Medicine. Government Analyst, Drug Testing laboratory (I.M), Tamil Nadu has been notified as Government Analyst for Andaman Nicobar (Union Territory) to discharge the statutory duties as per Section 33F(2) of Drugs and Cosmetics Act, 1940. The State Drug Testing Laboratory has the capacity to test about 3,000 samples per year.

The Arignar Anna Government Hospital of Indian Medicine in Chennai

9.11 The Government of Tamil Nadu started the Arignar Anna Government Hospital of Indian Medicine in Chennai, in the year 1970, in order to cater to the health needs of Chennai City. The hospital has bed strength of 310 with all necessary facilities. The hospital offers

treatment under all the systems of Indian Medicine and Homoeopathy (i.e; Siddha, Ayurveda, Unani, Homoeopathy and Yoga and Naturopathy). In the year 2019 this hospital has treated 4,56,445 out-patients and 61,213 in-patients. This hospital has latest fully automated analyser used in the Bio-Chemistry laboratory for testing Patient samples. A sum of Rs.56.25 Lakh has been allotted under the State Annual Action Plan (SAAP) for the renovation of out-patient buildings of this hospital. Renovation of the hospital building completed and put to use of the patients. Further, equipment and furniture items purchased for a sum of Rs.18.75 Lakh allotted under the NAM Scheme. This Hospital has exclusive pharmacy for preparation of fresh medicine required for the treatment of patients under Siddha, Ayurveda, Unani. An approximate quantity of 5,256.2 kg of Nilavembu Kudineer powder has been produced for the period from 01.01.2019 to 31.12.2019 and distributed to the dispensaries in and around Chennai. Moreover, Dengue awareness camps have been conducted in and around Chennai to prevent the spread of Dengue and Viral Fevers. During these camps over 2,500 litres of Nilavembu kudineer has

been distributed to the public for the period 08.10.2019 to 15.10.2019. A sum of Rs.18,37,000/- sanctioned to procure the equipments and glassware to the Quality Control laboratory established in the Pharmacy. Installation work related to the boiler plant completed and is now used to prepare the medicines.

**Tamil Nadu Medicinal Plant Farms and
Herbal Medicine Corporation Limited
(TAMPCOL)**

9.12 Tamil Nadu Medicinal Plant Farms and Herbal Medicine Corporation Limited (TAMPCOL) was established on 27th September 1983 with the main objective to manufacture quality medicines of Siddha, Ayurveda and Unani system.

TAMPCOL manufacturing unit is located at SIDCO Pharmaceutical Campus, Alathur near Thiruporur, Kancheepuram District. TAMPCOL has expertise in manufacturing of 144 medicines such as 88 Siddha medicines [65 Shastric and 23 Proprietary], 39 Ayurveda medicines [36 Shastric and 3 Proprietary] and 17 Unani

medicines [14 Shastric and 3 Proprietary]. These medicines are supplied to all centres functioning under the Directorate of Indian Medicine and Homoeopathy and also other Government Institutions viz., ESI, NIS, CGHS, etc. Tampcol's has three own sales outlets. Tampcol as a Nodal Agency, procures and supplies medicines, machinery and equipments, etc to all AYUSH centres.

The Authorized and Paid up Share Capital of the Corporation is Rs.3.00 crore. During 2019-2020, the Corporation has extended a rate rebate of 25% with effect from 01.11.2019 for all Government supplies, which is effecting a savings of State Budget to the tune of Rs.1.25 crore. During the year 2019-2020, the Corporation achieved sales to the tune of Rs.44.17 crore with a net profit of Rs.3.26 crore (unaudited).

During the year 2019-2020, the Corporation supplied 11 medicines to Amma Magapperu Sanjeevi Kit scheme for pregnant women through the Siddha centres in the State at a total cost of Rs.2.00 crore consisting 23,626 kits. It also supplied Sowbhagya Sunti Lehiyam

to Amma Baby care kit scheme to the tune of Rs.3.46 crore for the year 2019-2020.

TAMPCOL also manufactures veterinary medicines and has supplied medicines to the tune of Rs.1.66 crores in the year 2019-2020 to the Animal Husbandary Department.

TAMPCOL has capacity to produce 1,500 kgs of Nilavembu Kudineer per day which is highly needed for prevention and control of Dengue and other Viral fever.

The Corporation has three sales counters at Chennai, Palayamkottai and Nagercoil. In order to commercialise the Corporation's products, franchise right has been granted to a company based in Madurai. A Free Medical Consultancy Clinic is being operated at the Corporate Office Building of the Corporation with doctors from all streams of Indian System of Medicines namely Siddha, Ayurveda, Unani and Yoga and Naturopathy on rotation basis.

In order to make availability of quality medicines to Public, the Corporation have popularised its renowned commercial product viz., Herbal Hair Tonic, Tripala chooranam, Nilavembu Kudineer, Aswagantha Lehiyam,

Chyvanprash Lehiyam, Live 2000 capsule, Madhumega Chooranam Tablet, etc., through e-commerce site and all other communication media.

9.13. Highlights:

- The Hon'ble Chief Minister of Tamil Nadu has laid foundation stone for the International Institute of Yoga and Naturopathy Medical Sciences in Chengalpet, Kancheepuram District and the construction work is in progress.
- Siddha, Yoga and Naturopathy integrated AYUSH Hospital with 50 beds will start functioning at Theni and Thiruvannamalai for the use of general Public.
- Siddha, Yoga and Naturopathy integrated AYUSH Hospital with 50 beds is being established at Pudukottai.
- Thousand eighty two palm manuscripts of Siddha and Ayurveda were digitized at the Directorate of Indian Medicine.
- Rare Siddha books of the Dr. Ambedkar Central Library of Directorate of Indian

Medicine is being digitized in collaboration with Anna Centenary Library

State AYUSH Society

9.14 "State AYUSH Society – Tamil Nadu" is formed to implement the schemes sanctioned to the State under the National AYUSH Mission. The schemes are implemented by the Society, out of the funds received from the Government of India based on the sharing pattern in the ratio of 60:40. For the year 2019-20 schemes were approved for an amount of Rs.32.60 crore in the State Annual Action Plan (SAAP).

Tamil Nadu State Medicinal Plants Board

9.15 Tamil Nadu State Medicinal Plants Board was formed (TNSMPB) 06.06.2002 and TNSMPB was further registered under Tamil Nadu Societies Registration Act, 1975, Tamil Nadu Act, 27 of 1975 vide Registration.No.286/2009 Dated 26.10.2009. The board is governed by the General body with 11 Members, and an Executive Committee of 7 members both under the Chairmanship of Principal Secretary to

Government, Health and Family welfare Department, Government. of Tamil Nadu.

As per the Bye-law the main aims and objectives is to avail the financial benefits by the stakeholders of Tamil Nadu in the Medicinal Plants Sector like Farmers, Growers, Collectors, Traders, Exporters, Industrialist, from the National Medicinal Plants Board, Government of India through the State Medicinal Plants Board by submitting suitable project proposals. Rs.27.80 lakh received as Nucleus Centre grant from the National Medicinal Plants Board, GoI, New Delhi.

Chapter - 10

FOOD SAFETY AND DRUG ADMINISTRATION

FOOD SAFETY

10.1 The Food Safety and Standards Act, 2006 is being implemented in the entire country with effect from 05.08.2011 by repealing the Prevention of Food Adulteration Act, 1954 and other seven related food laws. Tamil Nadu Food Safety and Drug Administration department was formed with effect from 22.12.2011.

10.2 Commissioner of Food Safety – the Head of the department, is assisted by the Director and Additional Commissioner of Food Safety, other supportive Staff at State Level and 32 Designated Officers at the District level and 394 Food Safety Officers to implement the new Act.

10.3 Tamil Nadu Food Safety Appellate Tribunal was formed and started functioning from February, 2019. Presiding Officer, Registrar and Assistant Public Prosecutor are posted in this tribunal. 113 appeal cases have been filed in this tribunal so far.

10.4 Licensing and Registration Certificate

Issuing the License / Registration Certificate (RC) to the Food Business Operators as per the Food Safety and Standard Act, 2006, is the basic responsibility of this department. As on 31st January 2020, 87,402 Licenses and 3,81,290 Registration Certificate have been issued online by e-payment of fee, to the food business operators whose annual income is more than Rs.12 lakh and to the food business operators with annual income less than Rs.12 lakh respectively.

10.5 Enforcement activities

Periodical inspections are being made in all the manufacturing, storage and selling places by Designated Officers / Food Safety Officers. During 2019-20 upto January 2020, 7,842 Act samples have been analysed and taken legal actions as follows:

- 1,517 Civil cases filed with Adjudication Officers (District Revenue Officers) against the food business operators and judgment given for 996 cases. Penalty amount imposed is Rs.1,29,39,500.
- 723 criminal cases files against the food business operators in Judicial Magistrate Court and judgment given for 275 cases. Penalty amount imposed is Rs.56,30,500.

10.6 Prohibition of food products with tobacco and nicotine

To prevent various types of cancer caused by consumption of smokeless tobacco, the manufacture, transport, storage, distribution and sale of gutkha, pan masala and any other food product containing tobacco or nicotine as ingredient has been prohibited in Tamil Nadu and necessary Gazette Notification has been issued with effect from 23.05.2013. The ban order is extended every year and the latest notification extending the ban for a period of one year was issued on 23.05.2019. From June 2013 to January 2020, 760.8 tonnes (7,60,755 Kg) of Gutkha and Pan masala valued at Rs.26.12 crore were seized and destroyed. From April 2019 to

January 2020, 38,040.9 kg with a value of 2.84 crore banned food products containing tobacco and nicotine were seized.

10.7 Complaint Redressal

The department created a consumer complaint redressal system to make complaints on unsafe, substandard and mislabeled food products using a separate e-mail address unnavupukar@gmail.com and a whatsapp mobile number 94440 42322 is in force from May 2017. From May 2017 to January 2020, 12,212 complaints have been received from public and action taken through the food safety officials within 24 to 48 hours.

10.8 Compounding Offences

In exercise of the powers conferred U/s 30(3) of Food Safety and Standards Act, Designated Officers have been empowered from 1st December 2019 to impose penalty not more than Rs.25,000 to compound offence committed by the Food Business Operators whose turnover is less than Rs.12 lakh per annum and eligible for Registration Certificate (RC) under the Act with effect from 01.12.2019. From 1st December

2019 to 31st January 2020, Rs.9.61 lakh have been imposed as penalty for 229 defaulters.

10.9 New Food Laboratories

Six Food Laboratories are functioning at Chennai, Thanjavur, Madurai, Salem, Coimbatore and Palayamkottai for testing of food samples. Three more new Food Analysis Laboratories are to be opened at Villupuram, Thiruvannamalai and Pudukkottai.

10.10 Blissful Hygienic Offering to God (BHOG)

Blissful Hygienic Offering to God is an initiative of Food Safety and Standards Authority of India to encourage Places of Worship (PoW) to adopt and maintain food safety and hygiene while preparing Prasad to ensure that safe and wholesome Prasad is received by devotees. Food Safety department is proceeding the project – BHOG to reach the objective of safe food for all in Tamil Nadu and roll out BHOG project to all places of worship across Tamil Nadu. As on 31st January 2020, two temples (Sankaran Kovil and Nellaiappar Kovil-Tirunelveli) have been issued BHOG certification after the pre-audit, training and final audit process.

10.11 Eat Right Campus

To make all the educational institutes as "Eat Right Campus", as a first step, 500 professional colleges, 1,350 colleges/schools, 54,439 Anganwadi Centers, Awareness Campaigns/Trainings have been selected under Eat Right Scheme, with a cost of 90 Lakhs and till 31st January 2020 and 5,425 institutions have been preaudited and trainings have been started and Eat Right Campus will be completed by the end of June 2020.

10.12 FoSTaC

54,439 Anganwadi Centers have been selected for training under Food Safety Training and Certification (FoSTaC) and provision of certificates under FoSTaC, at a cost of Rs.32 lakhs and along with the training sessions of above mentioned Eat Right Campus for Anganwadi Centers , the FoSTaC programme will be completed.

10.13 Detection of Adulteration with Rapid Tests (DART)

To find out adulteration, at all Primary Health Centers (PHC) and Health Sub-Centers

(HSC), Rapid tests will be carried out under Detection of Adulteration with Rapid Tests (DART) at a cost of 10 lakhs and till 31st January 2020, 18,589 staff of PHC/HSC have been trained. The entire DART programme will be completed before March 2020.

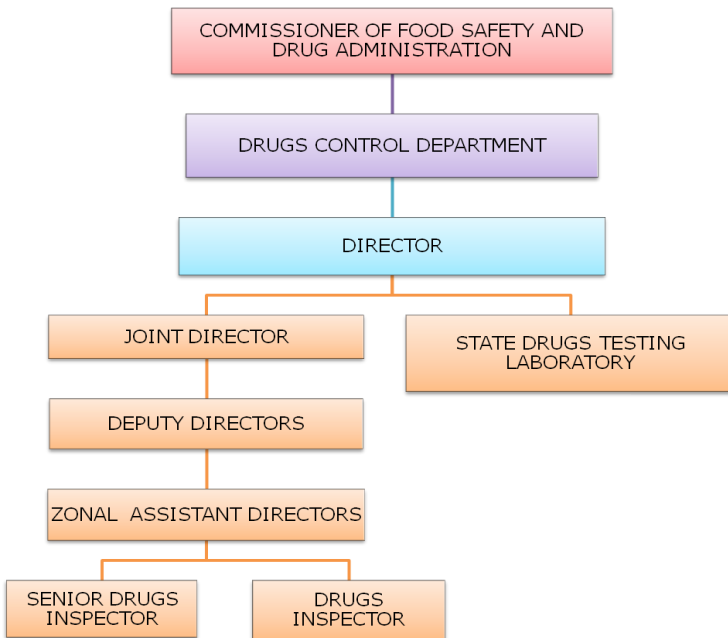
10.14 Hygiene Rating

As per FSSAI guidelines, the hotels and restaurants are certified under "Hygiene Rating" Scheme by conducting preauditing, training and post auditing process, till 31st January 2020, 62 FBOs obtained "Very Good- Hygiene Rating" certifications and others are under process. The programme will be a regular ongoing programme.

DRUGS CONTROL ADMINISTRATION

10.15 The Director is the head of the Drugs Control Administration and the department is functioning under the administrative control of “Commissioner of Food Safety and Drugs Administration”.

Organization Structure



10.16 The Drugs Control Administration has the prime mandate of enforcement of the following enactments, all being Central Acts for regulating the manufacture, distribution and sale of Drugs and Cosmetics:

- i. Drugs and Cosmetics Act, 1940 and Drugs and Cosmetic Rules, 1945, Medical Devices Rules, 2017 and New Drugs and Clinical Trial Rules, 2019
- ii. Drugs and Magic Remedies (Objectionable Advertisements) Act, 1954 and Rules 1955
- iii. Drugs Price Control Order, 2013

The officers of this department are also empowered to act under Narcotic Drugs and Psychotropic Substances Act, 1985.

10.17 The Director of Drugs Control is the controlling authority and licensing authority for grant of licenses for manufacture of allopathic, homeopathic medicines and cosmetics and the approvals are issued after the joint inspection of the inspectors of the state and central Governments. He is the licensing authority for blood banks in Tamil Nadu along with the central license approving authority of the Government of India.

10.18 The Drugs Control Administration monitors

- The quality, safety, efficacy and availability of drugs at right prices.
- The quality and safety of cosmetics.
- The misleading advertisements with respect to drugs and magic remedies.
- Collection and supply of safe blood and blood components.

10.19 The sanctioned staff strength of the department in the enforcement and Drugs testing laboratory is given below:-

ENFORCEMENT

| Sl.No | Name of the Post | No. of Posts |
|-------|----------------------------------|--------------|
| 1 | Director of Drugs Control | 01 |
| 2 | Joint Director of Drugs Control | 01 |
| 3 | Deputy Director of Drugs Control | 03 |

| | | |
|----|--|------------|
| 4 | Assistant Director of Drugs Control | 15 |
| 5 | Assistant Director of Drugs Control (Administration) | 01 |
| 6 | Senior Drugs Inspector | 15 |
| 7 | Drugs Inspector | 146 |
| 8 | Legal Adviser | 01 |
| 9 | Assistant Accounts Officer | 01 |
| 10 | Ministerial Staff | 117 |
| 11 | Office Assistant | 79 |
| 12 | Driver | 04 |
| 13 | Telephone Operator | 01 |
| | TOTAL | 385 |

DRUGS TESTING LABORATORY

| Sl. No | Name of the Post | No. of Posts |
|--------|---------------------------|--------------|
| 1 | Government Analyst | 01 |
| 2 | Deputy Government Analyst | 02 |
| 3 | Senior Analyst | 14 |
| 4 | Junior Analyst | 38 |

| | | |
|----|-------------------------------|-----------|
| 5 | Junior Administrative Officer | 01 |
| 6 | Technician Grade – I | 06 |
| 7 | Technician Grade – II | 04 |
| 8 | Electrician Grade – I | 01 |
| 9 | Plumber | 01 |
| 10 | Laboratory Attendant | 07 |
| 11 | Animal Attendant | 01 |
| 12 | Ministerial Staff | 10 |
| 13 | Office Assistant | 05 |
| 14 | Sweeper | 01 |
| 15 | Sweeper-cum-Watchman | 01 |
| | TOTAL | 93 |

10.20 A legally robust intelligence wing and a mobile squad is functioning in the directorate to attend to the complaints relating to drugs and cosmetics. It processes legal matters and undertakes special investigations including interstate investigations in association with the drugs control department of other State and Central Government.

10.21 The Drugs Inspectors of this department draw samples of drugs and cosmetics from various retail, wholesale outlets, manufactories

and hospitals of private and Government Sector, for the purpose of test or analysis to ascertain its quality, purity and safety for which well-equipped statutory laboratory attached to this department is existing. The analysis of parenteral drugs are undertaken by the lab situated at King's Institute of Preventive Medicine, Guindy, Chennai.

A Scheme for strengthening of state drugs regulatory system had been approved by the Government of India and State Government of Tamil Nadu under Centrally Sponsored Scheme with the ratio of 60:40 Central and State Share, at the cost of Rs.43.60 crores. Further the Government of India has released Rs.12 crores during the financial year 2018-19 and Rs.14.16 crores for financial year 2019-20.

The Government of Tamil Nadu has issued administrative sanction of Rs.43.60 crores and financial sanction for Rs.20 crores including State and Central Share for year 2018-19 for the establishment of a new world class drugs testing laboratory at Madurai and construction work is under progress.

10.22 Number of licenced premises as on 31.01.2020.

| Sales licenses | | Manufacturing licenses | | | Blood Banks | Blood Storage Centers |
|-----------------|--------------------|------------------------|------------------|-----------|-------------|-----------------------|
| Retail licences | Wholesale licences | Allopathic drug | Homeopathic drug | Cosmetics | | |
| 46,207 | 16,425 | 553 | 9 | 181 | 310 | 532 |

10.23 Number of inspections (From 01.04.2019 to 31.1.2020)

| | No. of Inspections |
|------------------------------|------------------------------|
| Details | From 01.04.2019 to 31.1.2020 |
| Sales premises | 47,385 |
| Manufacturing premises | 1,248 |
| Hospitals and medical stores | 1,759 |
| Blood bank | 1,175 |

10.24 Details of samples drawn, tested and reported as Not of Standard Quality Drugs (From 01.04.2019 to 31.1.2020)

| | From 01.04.2019 to 31.1.2020 |
|---|--|
| Total Number of samples drawn | 7,583 |
| Number of samples Tested | 7,774 |
| Number of samples declared as Not of Standard Quality | 220 Tamil Nadu – 54 Other State -166 |

10.25 Number of sales licences suspended (From 01.04.2019 to 31.1.2020)

| | From 01.04.2019 to 31.1.2020 |
|---|-------------------------------------|
| Total Number of retail licence suspended | 23 |
| Total Number of wholesale licence suspended | 18 |
| Total Number of licence suspended | 41 |

10.26 Prosecution for certain contraventions under Drugs and Cosmetics Act, 1940, Drugs Price Control Order, 2013 and Drugs and Magic Remedies (Objectionable Advertisement) Act, 1954 From 01.04.2019 to 31.1.2020.

| Sl. No | Details | Number of cases |
|--------|---|---|
| | | From 01.04.2019 to 31.01.2020 |
| 1 | For the manufacture of spurious drugs | Tamil Nadu – 0 Other state – 6 Total – 6 |
| 2 | For the manufacture of Not of Standard quality drugs | Tamil Nadu – 12 Other state – 64 Total – 76 |
| 3 | For the sale of drugs without supervision of Pharmacist | 147 |
| 4 | For the sale of drugs without prescription of Registered Medical Practitioner | 282 |
| 5 | For the stocking/sale of date expired drugs | 2 |
| 6. | Contraventions under Drugs and Cosmetics Act, 1940 and Rules, 1945 | 378 |

| | | |
|---|--|---|
| 7 | Contraventions under Drugs and Magic Remedies (Objectionable Advertisement Act) 1954 | 2 |
| 8 | Number of sanctions issued under Drugs Price Control Order, 2013 | 2 |

10.27 The future plans of the Drugs Control department are

- Creation of 18 new zonal offices to the department by bifurcation from existing 14 zonal offices (Total 32 zonal offices)
- Creation of additional posts for the newly created zones for better administration and for the effective enforcement of Drugs and Cosmetics Act, 1940 and Rules, 1945 to ensure the production and distribution of safe, high quality medicines towards patient safety.

Chapter 11

Tamil Nadu State Health Transport Department

11.1 Tamil Nadu State Health Transport department is vested with the exclusive responsibility of maintaining all the vehicles attached to various directorates of the Health and Family Welfare department. Since 1959, a separate structure for the maintenance of health department vehicles was created which later became a separate directorate.

11.2 Mission and Functions of the Department:

11.2.1 Mission:

To effectively and economically maintain the vehicles attached to Health and Family Welfare department while also providing a robust grievance redressal mechanism. To act as a 'One Stop Solution' to all the issues faced by the vehicle users in repairs, maintenance, operation of vehicles and also in their condemnation and disposal.

11.2.2. Functions:

i. Maintaining all the Health and Family Welfare department vehicles plying in the State in a proficient manner.

ii. Providing complete solutions to all the problems encountered by the vehicle owning officers in the maintenance as well as in the operation of vehicles.

iii. Fixing and adhering time frames for all the services offered including for repairs and maintenance.

iv. Identifying the aged vehicles that would be uneconomical for further operation and taking appropriate action for their condemnation and disposal through e-auction.

v. Providing professional assistance during purchase of new vehicles and while customizing special purpose vehicles as per the needs and requirements of end users.

vi. Acting as a repository of all vehicle related data using a computerized Data Base programme and to use the programme to regularly assess, monitor and review the performance of each workshop attached to the department.

vii. Providing refresher training to the drivers of Health and Family Welfare department to reinforce and upgrade their existing knowledge and skills.

11.3 Three-Tier Structure:

A three-tier structure comprising of regional, district and mobile workshops at each level is followed in the department for the effective maintenance of vehicles. The 7 regional workshops of this department maintains a fleet of around 400 vehicles each by undertaking all major repairs and the 9 District Workshops assist the regional workshops in the maintenance. Apart from the regional / district workshops, 29 mobile workshops that are a unique feature of this department render periodical service and minor repairs right at the door step of vehicle owning officers.

11.4 HICORP:

This department is successfully implementing a grievance redressal mechanism named HICORP, an acronym for Health

Department vehicles Information and Complaint Redressal Programme to provide single window grievance redressal and information providing facility. The concerned medical officers and drivers, when required utilize this platform to register and resolve all the vehicle related problems by sending a Short Message Service (SMS) or by calling the helpline number. 94896 21111. This single window grievance redressal facility is a significant initiative taken by the department for maximum and effective utilization of vehicles.

11.5 Computerization of Activities:

A Vehicle Management Data Base programme with in-house resources has been designed, developed and implemented in this department. Using this programme, all the activities carried out in the workshops, stores and in the technical sections of the directorate have been computerized. Monthly comprehensive evaluation of each workshop attached to this department is done using the programme and ranks are also awarded to encourage healthy competition among the

workshops. The programme is also used to identify and focus on the areas of improvement.

11.6 Adherence to Time frames:

Time limits and deadlines have been fixed for each type of service offered by this department in order to ensure prompt delivery of service. For instance, the maximum detention period fixed for Hospital on Wheel (HOW) category vehicles - irrespective of the magnitude of repairs (including body and engine works) for which the vehicles are admitted is 20 days. The progress and repairs is monitored at different levels to ensure compliance with the prescribed time frame.

Chapter -12

HUMAN RESOURCES AND MEDICAL SERVICES RECRUITMENT BOARD

12.1 The Medical Services Recruitment Board was constituted exclusively for the Health and Family Welfare Department with the objective of recruiting the right candidates to fill up vacancies in various categories of posts of the health department. The Health and Family Welfare department is pivotal in maintaining the good health of the people of the State through ten directorates functioning under its control. More than 200 categories of posts in Government Medical Institutions with nearly one lakh Medical and Para Medical staff exist in the department in these directorates.

12.2 Need for a separate Recruitment Board for Medical and Paramedical staff:

The Medical Services Recruitment Board was formed in 2012 exclusively for timely filling up of vacancies in the Health and Family Welfare Department. The main objective of Medical Services Recruitment Board is to carry out all direct recruitments to fill up vacancies to various

categories of posts in a speedy and transparent manner. The Medical Services Recruitment Board conducts its selection through a fair procedure by way of open advertisement in the newspapers and receives applications online. In its endeavour to provide qualified personnel, Medical Services Recruitment Board recruits doctors, nurses and para medical personnel through written examination / adopting a weightage method depending on the category of posts, while following communal rotation and rule of reservation in force.

12.3 The Medical Services Recruitment Board has recruited the candidates for the following categories of posts till 28.02.2020 from date of inception.

| Sl. No. | Name of the post | No. of candidates selected |
|----------------|---|-----------------------------------|
| 1 | Assistant Surgeon (General) | 9,352 |
| 2 | Assistant Surgeon (Speciality) | 1,943 |
| 3 | Personnel for Tamil Nadu Government Multi Super | 72 |

| | Speciality Hospital | |
|----|--|--------|
| 4 | Assistant Surgeon (Dental) (General) | 59 |
| 5 | Assistant Surgeon (Dental) (Speciality) | 67 |
| 6 | Assistant Surgeon (General) (Special Qualifying Examination) | 1,151 |
| 7 | Assistant Medical Officer (Siddha) | 101 |
| 8 | Assistant Medical Officer (Homoeopathy) | 4 |
| 9 | Assistant Medical Officer (Ayurveda) | 1 |
| 10 | Assistant Medical Officer / Lecturer Grade-II (Yoga and Naturopathy) | 73 |
| 11 | Medical Physicist | 34 |
| 12 | Physiotherapist Grade-II | 126 |
| 13 | Nurses | 11,922 |
| 14 | Nurses (Sick New Born Care Unit) | 508 |
| 15 | Senior Lecturer in Optometry | 2 |
| 16 | Pharmacist | 974 |

| | | |
|----|---|-------|
| 17 | Pharmacist (Siddha) | 148 |
| 18 | Pharmacist (Ayurveda) | 38 |
| 19 | Pharmacist (Homoeopathy) | 23 |
| 20 | Pharmacist (Unani) | 20 |
| 21 | Laboratory Technician – Grade-II | 528 |
| 22 | Laboratory Technician Grade III | 2,398 |
| 23 | Radiographer | 287 |
| 24 | Radiotherapy Technician | 25 |
| 25 | Dental Hygienist | 1 |
| 26 | Village Health Nurse | 2,557 |
| 27 | ECG Technician | 30 |
| 28 | Therapeutic Assistant | 114 |
| 29 | Prosthetic craftsman | 62 |
| 30 | EEG / EMG Technician | 12 |
| 31 | Audiometrician | 16 |
| 32 | Occupational Therapist | 18 |
| 33 | Dark Room Assistant | 227 |
| 34 | Plaster Technician Grade-II | 87 |
| 35 | Heart Lung Hypothermia Machine Technician | 7 |

| | | |
|----|------------------------|--------|
| 36 | Anaesthesia Technician | 77 |
| 37 | Fitter Grade-II | 60 |
| | TOTAL | 33,124 |

12.4 So far 6,347 candidates during the year 2019-2020 (upto February 2020) have been recruited by Medical Services Recruitment Board which includes 2,389 Staff Nurses, 1,234 Village Health Nurses and 1,508 Lab Technician Grade-III.

Tentative Annual Planner for the year 2020-2021 has been hosted in the Medical Services Recruitment Board website in advance to inform the potential candidates. Accordingly, the recruitment process is under way for filling up of 8,634 vacancies in the following twenty nine categories in Medical and Paramedical posts during the current year.

| Sl.No. | Name of the post | No. of posts |
|---------------|------------------------------------|---------------------|
| 01. | Assistant Surgeon (General) | 2,516 |
| 02. | Assistant Medical Officer (Siddha) | 54 |

| | | |
|-----|--|-------|
| 03. | Assistant Medical Officer (Homoeopathy) | 5 |
| 04. | Assistant Medical Officer (Ayurveda) | 3 |
| 05. | Assistant Medical Officer (Yoga and Naturopathy) | 4 |
| 06. | Food Safety Officer | 112 |
| 07. | Nurses | 1,542 |
| 08. | Village Health Nurse | 1,357 |
| 09. | Radiographer | 89 |
| 10. | Pharmacist | 1,199 |
| 11. | Lab Technician Grade-II (Food Safety) | 19 |
| 12. | Field Assistant | 174 |
| 13. | Skilled Assistant Grade-II (Fitter Grade-II) | 87 |
| 14. | Skilled Assistant Grade-II (Welder Grade-II) | 3 |
| 15. | Skilled Assistant Grade-II (Electrician Grade-II) | 3 |
| 16. | Audiometrician | 17 |

| | | |
|-----|---------------------------------------|--------------|
| 17. | Dark Room Assistant | 90 |
| 18. | Dental Hygienist | 67 |
| 19. | Dental Mechanic | 15 |
| 20. | Occupational Therapist | 10 |
| 21. | Prosthetic Craftsman | 28 |
| 22. | Lab Technician Grade-II (TNMSS) | 168 |
| 23. | ECG Technician | 21 |
| 24. | Theatre Assistant | 175 |
| 25. | Multi Purpose Health Worker (Male) | 334 |
| 26. | Physician Assistant | 14 |
| 27. | Therapeutic Assistant | 73 |
| 28. | Assistant Surgeon (Speciality) | 410 |
| 29. | Ophthalmic Assistant | 45 |
| | TOTAL | 8,634 |

12.5 Special Gateway for highly specialised

doctors:- Medical Services Recruitment Board will also recruit Assistant Surgeon (Speciality) for Post Graduate doctors through walk-in selection process following the communal rotation and rule of reservation in force, in order to garner the services of various highly skilled doctors to provide better treatment for the public.

12.6 The aim of the Medical Services Recruitment Board is to fill up all the vacancies in Government Medical Institutions in a speedy manner with utmost transparency in recruitment for serving the public. The entire selection process is done in a transparent manner, with online filling up of application forms and displaying marks scored / attained by the candidates in the website of Medical Services Recruitment Board. Also extra care is taken by the Medical Services Recruitment Board to provide adequate information to candidates with rural background about the status of their application and the selection process.

Chapter – 13

TAMIL NADU MEDICAL SERVICES CORPORATION LIMITED

13.1 The Government of Tamil Nadu had constituted the Tamil Nadu Medical Services Corporation Limited in 1994 under Companies Act, 1956 with the objective to procure, test, store and distribute drugs, medicines, surgical and suture consumables to all Government Medical Institutions in the State. Later, it has expanded its operations to the procurement of medical equipments and to provide support and maintenance services for all equipments. Besides finalization of rate contract of Drugs, Surgical items, Larvicides, Insecticides, Veterinary drugs, this Corporation also procures nutritional kits for pregnant women, baby care kits for newborn and sanitary napkins towards menstrual hygiene programme. In addition, the Corporation engages itself in the procurement and supply of items such as bleaching powder, disinfectants, personal protective equipments and related products at times of emergencies such as flood, cyclonic storms etc.

The Corporation procures and maintains advanced diagnostic equipments on user charges collection basis such as CT, MRI, Lithotripsy, Linear Accelerator and Cobalt therapy units. It also extends logistics support to pay wards. Tamil Nadu Medical Services Corporation Limited fixes agencies for services such as housekeeping of health care facilities, diet supply, disposal of biomedical waste management and laboratory services.

Tamil Nadu Medical Services Corporation Limited has won its appreciation worldwide by following transparent procurement procedure, involvement and empowerment of stakeholders in procurement process, ensure timely and prompt payment. Tamil Nadu Medical Services Corporation Limited is an ISO 9001:2015 certified organisation.

13.2 Structure of the organisation:-

The Tamil Nadu Medical Services Corporation Limited functions with the Managing Director as the Head of the Corporation and 3 major domains viz., Drugs, Equipments and maintenance related Services. The members of the Board of Directors of Tamil Nadu Medical

Services Corporation Limited are Deputy Secretary, Finance Department, Managing Director of Tamil Nadu Medical Services Corporation Limited, Project Director-National Health Mission, Director of Medical Education, Director of Medical and Rural Health Services, Director of Public Health and Preventive Medicine, Director of Drugs Control, Chief Engineer, Public Works Department (Buildings) chaired by the Secretary to Government, Health and Family Welfare Department.

13.3 Procurement and Distribution of Drugs and Equipment:-

Tamil Nadu Medical Services Corporation Limited is the pioneer and role model organization in drug logistics system related to procurement, testing and distribution of drugs, medicines, surgical consumables and sutures.

The list of essential drugs, speciality drugs, surgical and suture consumables and anti haemophilic drugs are finalized based on the average annual consumption pattern of the last 3 years derived from the IT mechanism, through a committee of the Directors of Medical Education, Medical and Rural Health Services,

Public Health and Preventive Medicine, Family Welfare, Drugs Control department besides specialists from the Government Medical Institutions prior to floating of tenders.

Annual/Bi-Annual rate contracts and tenders are finalized for all categories of drugs, medicines and surgical consumables by way of open tenders and procurement is effected from multiple suppliers at the most competitive rates in line with The Tamil Nadu Transparency in Tenders Act and Rules. Presently 315 essential drugs, 366 surgical consumables and sutures and 517 speciality drugs are procured by this Corporation for use of Medical institutions.

The procurement and stocking of drugs and medicines at the warehouses are on dynamic mode, depending on the consumption pattern with a minimum stock level of 3 months availability. The office has 32 drug ware houses one at each district for stocking of drugs.

The Corporation also procures 225 veterinary drugs annually for the Animal Husbandry Department which is distributed to the Regional Joint Directorates.

The procurement of equipment are based on intend based sanction through the Government orders either with State or National Health Mission funds. Procurement of equipment under externally aided projects such as World Bank, Japan International Cooperation Agency (JICA) as per their procedures are also undertaken as per the needs of the State. The equipment carries 3 years warranty followed by 7 years comprehensive Annual Maintenance Charges at pre-fixed rates by which the performance of the equipment for the life period of 10 years is ensured.

13.4 Quality Assurance:-

The Corporation relies on post-shipment testing of every batch of the supplies. Every batch of drugs and medicine samples are taken from the warehouses and a common batch is drawn from the samples at head office and the identity are camouflaged and sent to the empanelled NABL (National Accreditation Board for Testing and Calibration Laboratories). Periodic Testing and stringent procedures are carried out by this Corporation to distribute the quality drugs.

13.5 Information Technology (IT) System:

The entire drug logistics is operated and monitored through a proven IT system. The inventory and release of payments are monitored through the software and the stakeholders and the suppliers are provided with the user name and the password to enable them to view their transactions besides posting of specific information through website. Real time SMS to all the vendors, stake holders, linking of scan centres to head office by installing CCTV camera at the warehouses and scan centres are some of the method adopted for better monitoring of the activities at the respective domains.

13.6 Consultancy Services:

As Tamil Nadu Medical Services Corporation Limited gained rich experience in the field of drug logistics, it also provides consultancy services in this field to the needy States who intend to replicate.

13.7 Service activities:

To ensure advanced diagnostic and treatment facilities to common public, Tamil

Nadu Medical Services Corporation Limited is operating state of the art CT scanners, MRI scanners, Lithotripsy machines in the Government Hospitals at a minimal user charge collection basis and the same facility is free for all patients under cashless mode for CMCHIS families.

CT Scanners:

Ninety Six CT scanners in Eighty Two centres are being operated across the State in Government Medical institutions with minimal user charges of Rs.500/- per scan and Rs.800/- for contrast and Rs.3,000/- for non-invasive cardiac scans in 128 Slice CT scanners and free for all CMCHIS patients.

MRI scanners:

Twenty Nine MRI scanners at Twenty Eight Government Medical hospitals are in operation with user charges of Rs.2,500/- per scan and Rs.4,000/- for contrast and free for all CMCHIS patients.

Tele-radiology for online reporting of CT and MRI scans is functioning to ensure quick

reporting of scans taken at remote centres in Government Medical institutions.

Lithotripsy machines:

Four Lithotripsy machines are being operated with user charge collection of Rs.4,000/- to Rs.5,000/- per sitting and free for all CMCHIS patients.

Linear Accelerator, Cobalt Therapy units:

Two Linear Accelerators one each in Government Royapettah hospital and Tamil Nadu Multi Super Speciality Hospital, Chennai are in operation since January 2020 and eight more are being established in Rajiv Gandhi Government General Hospital, Chennai, Kancheepuram, Madurai, Coimbatore, Thanjavur, Tirunelveli, Tuticorin and Salem Medical College Institutions. Cobalt therapy units in fifteen Government Medical institutions are being established to provide cancer care.

13.8 Logistics support to pay wards:

For the pay wards at GI Bleed and Hepato-biliary Centre in Government Stanley hospital, Chennai, Maternity Wards at the Institute of Obstretics and Gynaecology, Kasturba Gandhi

Hospital in Chennai and pay wards at Rajiv Gandhi Government General Hospital, Chennai, Tamil Nadu Medical Services Corporation Limited is entrusted with the responsibility as custodian of funds and providing necessary logistics support for providing the best services to the general public at subsidized rates.

Chapter - 14

TAMIL NADU URBAN HEALTH CARE PROJECT

14.1 The Government of Tamil Nadu with a view to provide world class health services to the people of Tamil Nadu has devised Tamil Nadu Urban Health Care Project to strengthen the health institutions in urban areas with the assistance of the Japan International Co-operation Agency(JICA).

14.2 Project Objectives:

The objectives of the project are to improve the quality of health services in urban areas thereby improving the health of people in Tamil Nadu through

- i. Strengthening the capacity of the key hospitals with up-gradation of the facility and equipment and
- ii. Strengthening the capacity of human resources with the focus on Non Communicable Diseases.

The main focus of the project is on –

- i. Improving the treatment of Non Communicable Diseases by providing advanced treatment for Cardio-vascular diseases, Cancer, Chronic respiratory diseases, Diabetes etc.
- ii. Improving the existing hospital infrastructure by replacing and recasting physically deteriorated and functionally out dated existing buildings with a comprehensively designed model "Central Diagnosis Block".
- iii. The project intends to introduce advanced Japanese medical technology such as hybrid operation theatre system, interventional radiology by constructing 'State of Art' facilities as well as devising operation and maintenance methodologies

Tamil Nadu Urban Health Care Project has an outlay of Rs.1,634 crores for implementation under the Japan International Co-operation Agency (JICA) . The project cost of Rs.1,634 crores includes a JICA loan component of Rs.1,388 crores (85%) and State share of

Rs.245.6 crores (15%). The project will be implemented over a period of seven years.

The project component includes-

- i. Upgrading tertiary care hospitals with facilities and equipment.
- ii. Strengthening referral hospitals with equipment.
- iii. Strengthening secondary care hospitals with facilities and medical equipment.
- iv. Strengthening hospital management.
- v. Strengthening primary health care in non communicable diseases.

14.3 Locations:

The project will be implemented in 17 cities and cover 21 facilities. Under this project the Government Medical College Hospitals located at Madurai, Kilpauk at Chennai, Coimbatore, Salem, Vellore, Thanjavur, Tirunelveli, Pudukottai, Tiruchirapalli, Thoothukudi, Kanyakumari, Krishnagiri, Dindigul and Tiruppur are included. Further, three district

hospitals of Erode, Cuddalore and Periyakulam and four secondary care hospitals at Avadi, Ammapettai at Salem, Velampalayam at Tiruppur and Kandiyaperi at Tirunelveli will also be strengthened.

14.4 Details of the Activities

14.4.1 Upgrading Tertiary Hospitals (Infrastructure Rs.368.20 crores and equipment Rs.497.41 crores):

With regard to infrastructure, it is proposed to provide Advanced Operation Theatre(OT) Centre containing OT Centre for General, Vascular, Cardiothoracic, Plastic surgery, Urology, ENT, Paediatric Surgery and Hybrid OTs, IVR rooms, Pre-operative Care unit, Sick Intensive Care Unit, Post Anaesthesia Care Unit, Imaging Centre, Auditorium, etc., at the Government Medical College Hospitals at Madurai, Kilpauk and Coimbatore at a cost of Rs.368.20 crores and with regard to equipment, it is proposed to provide equipment for Advanced Operation theatre centre containing OT centre with Anaesthesia work station, C-arm machine, Endoscopes, Hybrid OT equipment, IVR

system, Angiography system, Imaging Centre with MRI, CT scan, etc., at Government Rajaji Hospital, Madurai, Kilpauk Medical College Hospital and Coimbatore Medical College Hospital at a cost of Rs.497.41 crores.

14.4.2 Strengthening Referral Hospitals (Equipment - Rs.201.07 crores):

It is proposed to provide equipment for Radiology in Imaging Department with CT, Mammography etc., and Endoscopy centre with Gastro-fiberscope, Duodenoscopes, Operating Microscope, Ultrasound scan, C-arm machine, X-ray machine, etc., in 11 Government Medical College Hospitals at Salem, Vellore, Thanjavur, Tirunelveli, Tiruchirapalli, Pudukkotai, Thoothukudi, Kanyakumari, Dindigul, Krishnagiri and Tiruppur and also it is proposed to provide equipment for 3 District Head Quarters Hospitals at Erode, Cuddalore and Periyakulam such as CT scan, Digital Fluoroscopy, Endoscopy, Gastro-fiberscope for Imaging department and C-arm, X-ray unit, Anaesthesia work station etc. for Operation theatre at a total cost of Rs.201.07 crores.

14.4.3 Strengthening Secondary Care Hospitals -(Infrastructure Rs.109.50 crores and equipment Rs.51.43 crores):

With regard to infrastructure, it is proposed to provide In-patient wards, OT block, Outpatient department for General Medicine and Surgery, Obstetrics and Gynaecology, Paediatrics, Ear, Nose, Throat and Ophthalmology, Comprehensive Emergency Obstetric and Newborn Care centre (CEmONC) and Sick Newborn Care Unit(SNCU), Casualty Department, etc., at a cost of Rs.109.50 crores and with regard to equipment, it is proposed to provide beds, infusion stands in in-patient wards, operation tables Anaesthesia machine in Operation theatre, dental units in outpatient department, Cardiotocography, Radiant warmer, ventilator in SNCU and CEmONC, defibrillator in casualty department, digital X-ray machine, Computed Radiography in Imaging Department at a cost of Rs.51.43 crores in the Secondary Care Hospitals at Avadi in Chennai, Ammapettai in Salem, Velampalayam in Tiruppur and Kandyaperi in Tirunelveli.

14.4.3 Strengthening hospital management –(Rs.20 crores): It is proposed to give training on hospital management, medical equipment and Non Communicable Diseases (NCD) and trauma care management at a cost of Rs.20 crores.

14.4.4 Strengthening primary health care - (Rs.10.90 crores) :

It is proposed to establish model skills lab for NCD at a cost of Rs. 10.90 crores at Regional Training Centres at Chennai and Madurai and training on NCD will be given to primary health care personnel.

Chapter - 15

Tamil Nadu Health System Reform Program

15.1 The Government of Tamil Nadu is implementing the Tamil Nadu Health System Reform Program (TNHSRP) supported by World Bank to improve the health system in Tamil Nadu. This is being implemented as a Program for Results (P for R) mode which is a reimbursement model based on the achievement of pre determined health outcomes.

The loan agreement for the project was signed on 04.06.2019 at New Delhi between Government of India and World Bank and the program became effective from 29.07.2019.

15.2 The total project cost is INR 2857.003 crores (USD 410 million). Out of this, INR 1999.902 crores (USD 287 million) is the World Bank component and INR 857.101 crores (USD 123 million) is the Government of Tamil Nadu component. The project period is for 5 years. This programme also aims to achieve Sustainable Developmental Goals – 3 (Ensure healthy lives and promote well being for all at all ages) over a period of 5 years.

15.3 The Goal of the project is to improve quality of care, strengthen management of non-communicable diseases and injuries, and reduce inequities in reproductive and child health services in Tamil Nadu.

15.3.1 Program Development Objective Indicators

- (i) Increased number of public facilities with quality certification (primary, secondary and tertiary care)
- (ii) Improved scores in quality dashboard for primary, secondary and tertiary level facilities
- (iii) Increased screening in public sector facilities for cervical and breast cancers
- (iv) Increased share of adults with hypertension or diabetes whose blood pressure and blood sugar are under control
- (v) Improved provision of quality trauma care services
- (vi) Increased utilization of reproductive and child health services in priority districts

The project is implemented across the State with interventions in all Medical College Hospitals, District Head Quarters and Sub District Hospitals, all Primary Health Centers and communities.

15.4 Funds flow mechanism

The funds for the programme will be provided by the Government of Tamil Nadu in the financial budget of the Health Department, annually. The directorates will receive the funds directly from Finance department in their annual budget for the activities to be implemented by them. The disbursement claims will be made by the Tamil Nadu Health System Reform Program based on the results and report of the independent verification agency.

CHAPTER - 16

TAMIL NADU STATE AIDS CONTROL SOCIETY

16.1 Tamil Nadu State is the pioneer in constitution of State AIDS Control Society in 1994, which was then emulated by other States of the country.

16.2 The programs of Tamil Nadu State AIDS Control Society are governed by the guidelines of National AIDS Control Program (NACP), which is currently in its extended fourth phase, implemented as a fully funded project through National AIDS Control Organisation (NACO). Tamil Nadu State AIDS Control Society implements the National Strategic Plan (NSP) for Sexually Transmitted Infection (STI) and Human Immuno Deficiency Virus (HIV) (2017-2024) with a vision to end AIDS as a public health threat by 2030. The district level program of Tamil Nadu AIDS Control Society is implemented and monitored by the respective District AIDS Prevention Control Units (DAPCU).

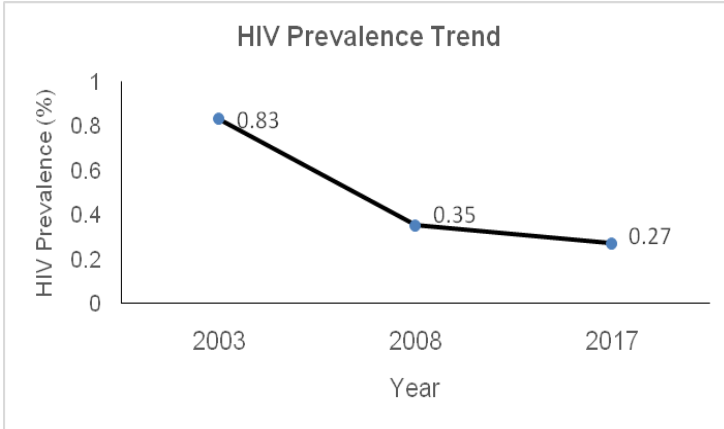
16.3 The program components of TANSACS:

- 1) Intensifying and consolidating the prevention services with focus on High Risk Groups(HRG) and vulnerable groups,
- 2) Expanding the Information, Education and Communication (IEC) services
- 3) Provision of comprehensive care, support and treatment services
- 4) Strengthening institutional capacity and strategic information management systems of the various divisions of TANSACS like Basic Services, STI, Blood Transfusion Services, IEC, Targeted Intervention, Mainstreaming and Lab services.

16.4 HIV Prevalence Trend:-

Over the years TANSACS has successfully reduced the prevalence of HIV in the State [0.83 in 2003, 0.35 in 2008 and 0.27 in 2017 among antenatal mothers, which is a proxy indicator for general population prevalence].

HIV Prevalence in Tamil Nadu:



This was possible because of the remarkable and continuous support provided by both State and Central Governments. The OVC Trust for Orphan and Vulnerable Children, Transgender Welfare Society, Drop-in Centers etc., are outstanding examples of the commitment from the State Government in this regard.

16.5 Structure and functioning of TANSACS

TANSACS manages the prevention-to-care continuum of services through its wide network of 780 Integrated Counseling and Testing Centres (ICTC), 1,797 Facility Integrated Counseling and Testing Centres (FICTC), 16 Mobile ICTC, 216 Designated STI/RTI Clinics

(DSRCs), 55 Anti-Retroviral Therapy (ART) centres and 174 Link ART centres, 85 Targeted Intervention (TI) Projects and 15 Link Workers Scheme (LWS).

TANSACS is marching towards the national goal of *Zero new infections, Zero stigma and Zero HIV related deaths*, with a series of innovative IEC initiatives, such as usage of popular FM radio stations for awareness creation, extensive multi-media campaign through folk-media troupes in rural areas, development of mobile application to bridge awareness with access to services, an user-friendly supply chain management system coupled with extensive data analysis, and evidence based block level intensive interventions. Special focus is being given to bring 'Zero' new infection through parent to child transmission mode in the State through sustained awareness and prevention strategies among the antenatal mothers and the general public.

16.6 Integrated Counseling and Testing Centres (ICTC):

- HIV counseling and testing services have been given to 31,87,755 number of general clients and 9,96,548 number of Antenatal Mothers (ANC) in the period of April to December 2019.
- HIV counseling and testing services are provided through 2,883 centers located at various health care facilities in the State.
 - 377 Stand Alone ICTC's (SA-ICTC) in Medical College Hospitals, District Head Quarters Hospitals and Government Hospitals, with the support of NACO.
 - National Health Mission supports 403 SA-ICTC's, 1,797 Facility Integrated ICTC's and testing services functioning in Block Primary Health centers and additional Primary Health Centers. 242 FICTC facilities have been established additionally in this financial year.

- 188 ICTCs are functioning under Public Private Partnership (PPP) model to strengthen Elimination of Mother to Child Transmission (EMTCT) coverage. 102 counseling and testing facilities have been established with the help of NGOs and CBOs for Community Based Screening (CBS).
- TANSACS also has 16 Mobile ICTC Vans in the State to reach out to the remote and inaccessible areas, to provide HIV counseling and testing services.

16.7 Elimination of Mother to Child transmission of HIV and Syphilis (EMTCT)

- The Government of Tamil Nadu is committed to eliminate HIV and Syphilis amongst newborns through universal screening of pregnant women for HIV and Syphilis as an essential component of the Antenatal Care (ANC) service package.
- The Elimination of Mother to Child Transmission (EMTCT) services are being

implemented in close collaboration with Reproductive and Child Health (RCH) programme of the National Health Mission (NHM) to scale up prevention and care interventions among Ante-natal mothers through primary prevention, family planning, voluntary counseling and testing, lifelong Anti-Retroviral Therapy (ART) services and counseling on infant feeding practices.

- In line with NACO guidelines and SDG, State level core committee headed by the Secretary – Health and Family Welfare department has been formed to monitor the progress of EMTCT. District Monitoring Committee headed by the respective District Collectors have been formed to monitor the implementation of EMTCT at the district level.
- “Early Infant Diagnosis (EID)” programme is implemented in the State through ICTCs.
- Under EMTCT new regimen (ARV prophylaxis), HIV exposed babies who are

born to HIV positive mothers are initiated on Nevirapine syrup upto 6 to 12 weeks from birth.

- All identified HIV positive mothers and infected infants are being provided with lifelong ART and follow-up counseling services.

16.8 Sexually Transmitted Infection/ Reproductive Tract Infection (STI/RTI) Services:

Designated STI / RTI clinics (DSRC)

- Under TANSACS there are 216 Designated STI/RTI Clinics functioning. These clinics are branded as "SUGA VAZHU MAIYAM / SURAKSHA CLINICS".
- 5,29,916 clients have benefited in the STI Clinics from April 2019 to December 2019 against the target of 5,80,753 for this year.
- In DSRC, as per NACO guidelines, syndromic case management system through color coded drug kits is followed and also all clinic attendees are screened for syphilis and HIV.

- Regular medical check-up services are being provided for High-risk groups at the DSRC.

16.9 Targeted intervention:

- The Targeted Intervention (TI) is being implemented through the Non-Governmental Organization (NGOs) / Community Based Organization (CBOs), with a view to bring behavioral changes among High Risk Groups (HRGs) namely Female Sex Workers (FSW), Men who have Sex with Men (MSM), Injecting Drug Users (IDU) Truckers, Migrants and Transgender (TG) in the State, who are at a risk of contracting HIV infection.
- As on December 2019, 85 NGOs/CBOs are functioning and reaching out to 74,543 HRG populations (FSW-41,123, MSM-28,879, TG-4,209, IDU- 332) Migrant-2,95,966 and Truckers-2,98,600.

16.10 Community Based HIV Screening

- Community Based Screening (CBS) for HIV is implemented for achieving the global policy of ending HIV/AIDS by 2030. NACO

and TANSACS have decided to conduct CBS through TI NGOs/ CBOs and LWS NGOs.

- In continuation, the TI projects are doing Community Based Screening for HIV, and 25,574 HRG were tested, and among them 9 HIV positives were identified and linked with ART for Care, support and treatment.

16.11 Link Workers Scheme

- Link Workers Scheme (LWS) is being implemented in 15 high priority districts to prevent STI / HIV / AIDS and TB. It also aims at providing prevention-to-care continuum of services to rural based High Risk Groups, Vulnerable and Bridge populations (Truckers/Migrants).
- Currently 14 LWS programmes are functional and each LWS project is working in 100 high prevalence villages in their respective districts.
- Through the LWS Projects, 8,018 HRGs, 35,819 Migrants, 53,398 vulnerable groups and 13,440 Truckers are covered and provided with HIV/AIDS and TB

services. Also 22,593 targeted communities were tested for HIV and 17 were identified as HIV positive and linked with ART centre.

16.12 Condom Promotion

- As condoms are the most effective tool for prevention of HIV and STI infection among high risk and general population, TANSACS provided 87,19,901 free condoms from April to December 2019 through STI clinics, ICTC, ART Centres and other outreach programmes implemented by Non Governmental Organisations (NGOs) / Community Based Organisations (CBOs) under Targeted Interventions and Link Workers Scheme.

16.13 HIV and TB intervention in all type of Prisons, Swadhar and Ujjawala homes in Tamil Nadu

- Tamil Nadu State AIDS Control Society has entered into an Memorandum of Understanding (MoU) on September 2018 with Prison Department and Social Welfare Department for implementing the HIV and

TB intervention in Prisons, Swadhar and Ujjawala homes to provide HIV, TB, STI, Viral hepatitis infection related services (Awareness, IEC, Training, Counseling, Screening, Testing, Care, Treatment, Referral and Linkage).

- In continuation of this programme there are 43,976 prison inmates who were tested for HIV and 93 were identified as HIV positive and 84 of them were linked with ART. There are 27,552 inmates who were screened for TB and 19 of them were diagnosed as TB positive and treated.

16.14 Blood Safety

- In order to meet out the requirements of Blood and Blood Components for the needy patients, 309 Blood Banks (90 State Government Blood Banks, 9 Central Government Blood Banks and 210 Private Blood Banks) are functioning in Tamil Nadu. In addition to the Blood Banks 528 Blood Storage Centres (Government 383 and Private 145) are also functioning to provide adequate, safe and quality blood and blood components. In all the

Government Hospital Blood Banks, total collection of blood is 2,48,005 units through 2,921 Voluntary Blood donation (VBD) camps in the period of April to December 2019. Voluntary non-remunerative blood donation camps are organized throughout the State as per the annual VBD calendar. Out of 90 Government Blood Banks 39 Government Blood Banks are functioning as Blood Component Separation Units (BCSU).

- All collected blood units are tested for 5 Transfusion Transmissible Infections (TTI) such as HIV, HBV, HCV, Syphilis and Malaria apart from grouping and typing. The ELISA (Enzyme Linked Immunosorbent Assay) and the Rapid card method tests are followed for HIV detection in the Government blood banks using the kits supplied by NACO.
- The Quality of screening and lab services are ensured in all the blood banks via three ways namely, External Quality Assurance Services (EQAS), Internal

Quality checking every month and by Vertical Audit of Blood Bank.

16.15 Greater Involvement for the People Living with HIV/AIDS (GIPA):-

Tamil Nadu AIDS Control Society has involved the People Living with HIV/ AIDS (PLHIV) and CBOs as one of the partner in implementing the program at the district level and the same is also being monitored by them, as follows

- Ensuring service delivery at the grass root level.
- Planning the program related to care and support activities at the district level involving PLHIV.

16.16 Hello + Helpline 1800 419 1800:-

Tamil Nadu AIDS Control Society has set up a dedicated help line for delivering the following services to the general public

- To enlighten the callers with required information about HIV/AIDS, STI.
- To clear doubts about HIV/AIDS and STI.

- To clear the myths, misconceptions pertaining to HIV/AIDS and STI.
- To share the callers on the available information on service centres in the respective district.

16.17 Legal Aid Clinic (LAC):

In association with Tamil Nadu State Legal Services Authority (TNSLSA), Legal Aid Clinics (LAC) have been established in all districts. Senior ART counselors attend the legal and non-legal issues of People Living with HIV/AIDS (PLHIV) and High Risk Groups (HRGs).

16.18 Red Ribbon Club (RRC):

- As a pioneer in the nation, Tamil Nadu AIDS Control Society established Red Ribbon Clubs (RRC) in the year 2005 to create awareness and to raise the risk perception and bring in behavioral changes among the youth.
- There are 2,229 Red Ribbon Clubs functioning in Arts and Science, Polytechnic, Engineering, Medical, B.Ed colleges and Teacher Training Institutions in the State.

16.19 Adolescent Education Program (AEP) in the name of Life Skill Education Program in Schools(LSEP):

This programme aims at providing information on life skills and knowledge on prevention of HIV/AIDS in 9,580 schools among the 9th and 11th Students in Tamil Nadu. It is implemented through State Council of Educational Research and Training (SCERT).

16.20 Care, Support and Treatment:

- Life-long free care, support and treatment services to HIV positive people is provided through ART centers attached to Government health facilities.
- Routine investigations, CD4 tests and viral load testing are performed at these centres. ARV drugs, opportunistic infection drugs, various counseling services, referral and linkage services are rendered through ART centres. In addition PLHIV are also imparted with yoga and life style modification sessions.
- Currently, 1,20,800 PLHIV are taking free treatment through 55 ART centers. In

addition, 174 Link ART centres act as drug dispensing units closer to their homes.

- Apart from this, 31 care and support centres provide services like tracking of treatment defaulters, psycho-social support and linkage to various benefit schemes.

16.21 Monitoring and Evaluation:

i. Strategic Information and Management System (SIMS):

SIMS is an integrated web-based reporting, data management and decision support system, with monthly reporting from almost all the programme components comprising ICTC, TI, blood banks, STI/RTI, IEC, Laboratories and DAPCU. Tamil Nadu AIDS Control Society receives all the field reports through this system.

ii. PLHIV – ART Linkage System (PALS):

PALS line list is a reporting cum tracking tool which collects, retains and updates individual wise details of all HIV positive clients (Pregnant women and General clients).

Each SA-ICTC or ART centre shall maintain their respective HIV positive line list which will contain all the details of the HIV positive clients tested at their centers or have registered at their centre for ICTC/ART services.

iii. HIV Sentinel Surveillance (HSS):

HIV Sentinel Surveillance (HSS) is carried out biennially all over the country to study the disease prevalence among pregnant women and High Risk Groups (HRGs).

- In Tamil Nadu for the year 2018-19, the prisons were newly included in the HIV Sentinel Surveillance.
- HSS is being conducted at 71 ANC sites, 3 prison sites and 44 HRG sites and carried out from 1st January 2019.

16.22 District AIDS Prevention and Control Unit (DAPCU):

- To ensure effective planning of the HIV program activities in accordance with the epidemiological profile of the district in line with the National AIDS Control Program (NACP) priorities and to establish proper

linkages with the NHM and other programs, 29 DAPCUs are functioning in the State of Tamil Nadu.

- These DAPCUs are managed by the Deputy Director – Health Services who act as District AIDS control Officer and work in close coordination with the District Collector.
- There are 29 Districts AIDS Prevention and Control Units (DAPCU) and 3 non-DAPCUs functioning in Tamil Nadu.
- Out of 29 DAPCUs, NACO is supporting financial assistance to 27 DAPCUs, and the two remaining DAPCUs in Ariyalur and Tiruppur districts are being supported by Tamil Nadu State Government.

16.23 Drop-in-Centers:

Government have revived the Drop-in-Centre services by permitting the Tamil Nadu AIDS Control Society to establish 34 Drop-In-Centers in 32 districts (3 in Chennai) by sanctioning a sum of Rs.2,41,06,000/- The Drop-In-Centres aims at

- Providing sustainable counseling and support services
- Organizing support group meetings
- Providing psychosocial support to PLHIVs
- Linkage with care and support service providers
- Linkage with government schemes
- Creating an enabling environment for obtaining services from government and private institution

16.24 Integrating Social Benefits:

Tamil Nadu Trust for Children Affected by AIDS: - The Government of Tamil Nadu has established a trust with a corpus fund of Rs.9.5 crore for providing financial assistance the Orphan and Vulnerable Children to support their nutritional and educational needs.

- During the financial year 2019-20, Rs.94.85 lakhs accrued interest amount was distributed to 3,828 children.
- The Government has sanctioned an additional fund of Rs.5.00 crores towards the corpus fund of Tamil Nadu Trust for

Children Affected by AIDS in the Financial Year 2019-20

- A monthly pension amount of Rs.1,000/- is being provided under the 'Honorable Chief Minister's Uzhavar Pathukappu Thittam' to 9,886 PLHIVs holding farmers card. This scheme is further extended to the children of infected farmers.
- Free bus passes are issued to PLHIVs to attend ART centres every month.
- Top priority is given to PLHIVs to access the various schemes as furnished below:
 - i. Widow Pension
 - ii. Old Age Pension Schemes
 - iii. Antyodaya Anna Yojana (AAY) Scheme
 - iv. Hon'ble Chief Minister's Solar Powered Green House Scheme.

Chapter-17

National Health Mission – Tamil Nadu

17.1 The National Health Mission (NHM) has been launched with a view to bring about qualitative improvement in the health system and the health status of the people, especially those who live in the rural and urban areas of the country.

National Health Mission aims to achieve the goals by making the public health delivery system fully functional and accountable to the community, human resources management, community involvement, decentralization, rigorous monitoring and evaluation against standards, convergence of health and related programmes from village level upwards, innovations, flexible financing and other interventions for improving the health indicators.

National Health Mission comprises two sub-missions as mentioned below:

1. **NRHM** – National Rural Health Mission (2005) - to meet health care needs of the rural population.

2. **NUHM** – National Urban Health Mission (2013) - to meet health care needs of the urban population.

17.2 National Health Mission, Tamil Nadu,

- Facilitates increased access and utilization of quality health services by all.
- Forges a partnership between the Central, State and Local self-governments.
- Setting up a platform for involving the Panchayati Raj institutions and community for the prevention, promotion and provision of Primary Health Care Services.
- Providing an opportunity for promoting equity and social justice.
- Establishing a mechanism to provide flexibility to the districts and the community to promote local initiatives.
- Developing a framework for promoting inter-sectoral convergence for promotive and preventive health care.

The programmes implemented by and through National Health Mission includes the following

- RMNCH + A: Reproductive, Maternal, Newborn, Child and Adolescent Health
- Family Welfare Programme
- National Tuberculosis Elimination Programme
- National Leprosy Eradication Programme
- National Filaria Control Programme
- Integrated Disease Surveillance Project (IDSP)
- National Vector Borne Disease Control Programme (NVBDCP)
- Non-Communicable Diseases, Injury and Trauma
- National Programme on Prevention and Control of Diabetes, CVD and Stroke
- National Programme for Prevention and Control of Deafness
- Universal Immunization Programme
- National Cancer Control Programme
- National Mental Health Programme
- National Iodine Deficiency Disorder Control Programme
- National Programme for Control of Blindness
- National Tobacco Control Program

- National Programme for Health Care of the Elderly (NPHCE)

The health system of the State is renowned for its success in providing quality public health services to its people and addressing challenges. Tamil Nadu is a forerunner in providing equitable, affordable and quality healthcare services to the people of the State.

Tamil Nadu has been a leading State in achieving goals and targets in health indicators. The state has already achieved the Millennium Development Goals set by the United Nation and has been ranked second in the SDG India Index Report, 2019 published by NITI Aayog. The state is determined to achieve all Sustainable Development Goals (SDG) well before the target 2030.

The Global Burden of Diseases report, 2016 showcased the epidemiologic transition happening in the state. Tamil Nadu's Disability Adjusted Life Year (DALY) which is a measure of overall disease burden expressed as the number of years lost due to ill-health, disability or early

death, shows that from the 1990s to 2016, the top causes of DALY in Tamil Nadu have moved from communicable, maternal, neonatal and nutritional diseases to Non-Communicable Diseases (viz., ischemic heart disease, stroke, chronic kidney disease, mental and substance abuse, musculoskeletal diseases, respiratory diseases).

National Health Mission Tamil Nadu, has formulated several schemes to strengthen the health system to combat the challenges posed by Non-Communicable Diseases. National Programme for Prevention and Control of Cancer, Diabetes, Cardiovascular Diseases and Stroke (NPCDCS) is the flagship program implemented by NHM for prevention and treatment of NCDs.

17.3 Maternal Health

17.3.1 Reproductive, Maternal, Newborn, Child Health and Adolescent Health (RMNCH+A) Services:

The RMNCH+A strategy is built upon the continuum of care concept and is holistic in design, encompassing all interventions aimed at

reproductive, maternal, newborn, child, and adolescent health (RMNCH+A). It includes components like institutional delivery, emergency obstetric care, family planning services, Child health services and adolescent health services.

17.3.2 Janani Suraksha Yojana:

The scheme is being implemented with the objective of reducing maternal and neonatal mortality by promoting institutional deliveries. The scheme provides financial assistance of Rs.700/- and Rs.600/- in rural and urban areas respectively for mothers to access Maternal and Child Health services. From Apr 2019 to Jan 2020, about 3,47,812 mothers have been benefitted by this scheme through Direct Beneficiary Transfer.

17.3.3 Janani Sishu Suraksha Karyakram (JSSK):

To address the issue of Out-of-pocket expenditure related to maternal and newborn care which is considered to be catastrophic to the poor people, this scheme has been implemented since 2012. The entitlements under

JSSK for the mother and infants includes free cashless delivery (including cesarean), free drugs, free diagnostics, free provision of blood, free diet, and free transport to and fro to a health facility. Beneficiaries under JSSK are as follows. From April 2019 to Jan 2020, 4,70,300 mothers have been provided with free drugs and consumables, diagnostics and free diet services. 1,41,230 mothers have been picked up from home through 108 services. 2,05,132 mothers have been dropped back home after institutional delivery. 1,27,343 mothers have been provided with inter-facility transport services.

17.3.4 Comprehensive Emergency Obstetrics and Newborn Care Centres (CEmONC):

In Tamil Nadu, about 99.9 % of the deliveries are institutional deliveries as per NFHS 4 (2015-16). Of the institutional deliveries, 60% of deliveries occur in Government Health facilities and 40 % at Private Health Facilities (State HMIS, Jan' 2020). The State has established 126, round the clock Comprehensive Emergency Obstetric and New Born Care (CEmONC) centre which includes 22

Government Medical College Hospitals and 104 Secondary Care Hospitals across the state to provide definite emergency services for all pregnant women without any further referral to any higher centres.

CEmONC Performance: From 2015 -16 to 2019-20

| Details | 2015-16 | 2016-17 | 2017-18 | 2018-19 | 2019-20 (Apr 19- Jan20) |
|--|----------------|----------------|----------------|----------------|--|
| Total Maternal Admission | 4,59,587 | 5,73,954 | 4,95,360 | 6,26,324 | 5,13,582 |
| Deliveries | 2,78,124 | 3,21,622 | 3,14,408 | 3,47,656 | 3,09,176 |
| LSCS | 1,45,351 | 1,68,282 | 1,61,396 | 1,84,295 | 1,50,469 |
| Blood Trans- fusion for OG cases | 1,22,273 | 1,23,981 | 1,20,542 | 1,24,705 | 92,426 |
| Scan for OG Cases | 4,93,013 | 5,30,476 | 5,08,301 | 6,23,046 | 5,38,298 |
| Neonatal Admissions | 1,40,525 | 1,28,085 | 1,19,316 | 1,34,554 | 1,10,453 |

17.3.5 LaQshya

LaQshya is an initiative in Labour Room and Maternity OT to improve the quality of care and respectful maternity care during delivery and immediate post-partum period.

LaQshya is being implemented in 188 facilities which includes all Medical College Hospitals (MCH), 31 Government. District Head Quarters Hospitals (DHQ), 73 Sub-District Hospitals (SDH) and 62 Community Health Centres-(CHC) Tamil Nadu is the first state in the country to have obtained LaQshya certification for 3 of its Medical College Hospitals namely – Theni, Trichy and Tirunelveli. Apart from this 22 Medical College Hospitals have completed internal assessment and 7 Medical College Hospitals have completed External assessment.

Out of 104 Secondary Care Institutions: 31 District Head Quarters Hospitals and 73 Sub

District Hospitals have completed Internal Assessment. 14 District Head Quarters Hospital and 4 Sub District Hospitals have completed External assessment for which National certification has been obtained for 12 District Head Quarters Hospitals and 1 Sub District Hospital.

17.3.6 Provision of Specialist Services

(Hiring of Specialists for MCH Care):

With an aim to bring specialist services to rural areas especially anesthesia and obstetric services, hiring of such services on a case to case basis for family welfare is being done as per the local needs. A flexible fund is provided as remuneration for hiring of specialist every year. The hired specialists have performed about 40,217 deliveries (Apr 2019- Jan 2020) in the state.

17.3.7 Anaemia Mukht Bharat Scheme:

Under the scheme Iron and Folic Acid Supplementation is given as per the following schedule

| S.No | Age Group | Frequency of Iron and Folic Acid Supplementation |
|-------------|--|---|
| 1. | 6-59 months | Twice a week |
| 2. | 5-9 years | Weekly once (Junior WIFS) |
| 3. | 10-19 years | Weekly once |
| 4. | Pregnant Women (Since 12 weeks) and lactating mother till 180 days | Daily |

So far from April 2019 to Jan 2020 2,45,721 Children in the age group of 6 to 59 months, 22,69,950, children in the age group of 5 to 10 years, 38,19,573, Children in the age group of 10 to 19 years 6,86,167-Mothers during antenatal period have been benefitted.

Also the state has taken an initiative for provision of Weekly IFA supplementation to Women in the reproductive age group of 20 to 30 years. 60 lakh Women in the reproductive age group of 20 to 30 years will be benefitted.

17.3.8 Gestational Diabetes Mellitus Control Programme:

All pregnant women who come for AN check up for the first time irrespective of duration of pregnancy are screened for GDM with Glucose Challenge Test. The Antenatal mothers are screened by GCT during 12 – 16 weeks, 24 - 28 and 32 – 34 weeks of gestation. From Apr 2019- Jan 2020, 11,864 Pregnant mothers have been identified as positive for Gestational Diabetes Mellitus and have been managed effectively to prevent adverse Neonatal outcomes.

17.3.9 Blood Bank and Blood Storage Services:

In order to provide sufficient, safe and quality blood and blood components to the needy patients in Tamil Nadu, NHM provides

budgetary support to TANSACS for blood transfusion services.

17.3.10 Feeding and Dietary Charges:

Provision of diet for all in-patients in the public hospital, including pregnant women is an essential part of the package of assured services offered by the public facility. Diet during stay in the health institutions (up to 3 days for normal deliveries and upto 7 days for caesarian deliveries) is provided. Under the scheme 5,26,254 antenatal mothers and 4,70,300 postnatal mothers (Apr 2019- Jan 2020), have been provided with diet in Government health facilities.

17.3.11 High Risk Mother Observation:

Antenatal mothers with high risk factors are being admitted in the Upgraded PHC and are referred to the appropriate CEmONC centers well before the EDD to provide quality EmONC services and to prevent adverse outcomes. To detect and monitor the High risk patients, camps are being conducted during 9th of every month under Surakshit Matritva Aashwasan (SUMAN) initiative. From Apr 2019 –Jan 2020, 34,485

High Risk mothers have benefitted under this scheme. Also the patient list of High Risk mothers are being tracked by the Health Staff at all levels by the following methods:

Mentoring of Block Medical Officers and their team has been initiated for effective tracking of pregnant mother. Three types of mentoring has been initiated.

- ✓ Virtual Mentoring:-The Obstetricians from Sub District Hospital /District Head Quarters Hospital /Government. Medical College Hospital have been pooled and allotted blocks based on the geographic contiguity of the respective institutions where they work The obstetrician will mentor the doctors in a Whatsapp group
- ✓ Real Mentoring:- The Mentor Obstetrician will guide the Block team –Block MO / PHC MO/ UCHC one to one basis during emergencies.Mentoring of Secondary care Institution by the Tertiary Care Obstetrician is also being done.

- ✓ PICME Dashboard and THAIMAI App- PICME dashboard has been created at all levels with specific colour coding so as to track the high risk mothers. Thaimai app is a mobile based application developed in collaboration with UNICEF which is an add on to the PICME tracking to provide real-time monitoring and tracking of Mothers and Infants.

17.3.12 Special strategies to tackle key issues contributing to Maternal Deaths:

- 7.2% of HOB contributes to 25.4% of maternal deaths and hence Special month long drive for Family Welfare Services has been initiated wherein, 10178 Mothers have undergone permanent sterilization and 29365 Mothers have adopted temporary methods. 829 males (Apr 2019 to Feb 2020) have undergone No- Scalpel Vasectomy (NSV) procedure. Also, Special Fixed Day Services (FDS) are organized to provide Sterilization and PPIUCD services so as to cover the uncovered HOB mothers in the 120 HOB Blocks of Tamil Nadu

- 6% of total maternal deaths are caused by heart disease complicating pregnancy. The Tamil Nadu State Pregnancy and Heart disease Registry is being established at state level. The formulated registry will render detailed evaluation of the clinical profile, cardiac assessment, treatment strategies, and fetal / maternal outcomes.
- To prevent and treat hypertension complicating pregnancy Standard Protocols to identify and treat hypertension during pregnancy through injection-Magnesium Sulphate adopted at PHC level itself. Tablets Calcium 500 mg twice daily is provided to prevent Pregnancy Induced Hypertension.
- To prevent sepsis related death which is 9 % of the total maternal deaths during the Intrapartum period, one delivery one kit is promoted in all Health Institution and periodic swab / fumigation of Labour room and Operation Theatre is ensured.
- To prevent sepsis related complications during post partum period, AMMA Baby Care Kit is provided for all Postnatal mothers.

- 5% of total deliveries are of first pregnancy above 30 years of age (elderly prime) which contribute to 21% of maternal deaths. Hence, first pregnancies above 30 years of age are booked as high risk cases and regular follow up is being done.
- To address the problem of 4 % antenatal deaths due to faulty abortions, Antara, an Injectable contraceptive and New Oral Contraceptive pill named Chhaya have been recently introduced. Safe Abortion Practices are extensively available in 385 Block across the state by Medical Termination of Pregnancy; Manual Vacuum Aspiration (MVA) and Medical Method of Abortion (MMA).
- To Register and track the Visitors, Migrant mothers and Unregistered mothers, revamped PICME 2.0 is rolled out for the entire state where the Visitor mother register through Common Service Centre / Online / 102 Call Centre for self-registration similar to pre-registration of Antenatal mothers.
- Anaemia contributes to Maternal Mortality and hence under Anemia MukthBarath, Oral Iron and Folic Acid (IFA) to Antenatal and

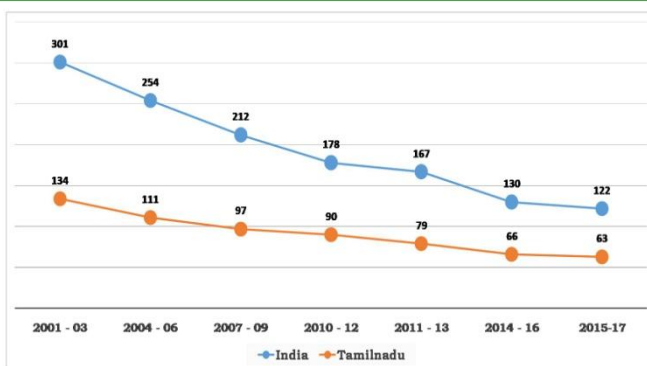
Post-natal mothers including Iron sucrose injections are provided at all PHCs.

- Amma Nutrition Kit introduced for all Antenatal mothers during 3rd and 5th month of gestation under Dr.MRMBS scheme
- Availability of Non Pneumatic Anti-Shock Garments and Misoprostol tablet are ensured even at PHC level to avoid death due to post partum Hemorrhage. In the current year with the support of NIE, ICMR, Chennai, 60 Non Pneumatic Anti-Shock Garments have been provided to 55 CEmONC Centres.
- To find out the cause of death and to prevent maternal deaths, Maternal death audit is done at four levels;
 - 1) Community based audit by PHC team ,
 - 2) Special Maternal Death Audit at District level
 - 3) District Level Audit by the District Collector
 - 4) State level audit by MD,NHM/MCH Commissioner every month through video conference.

17.3.13 Maternal Mortality Ratio

Tamil Nadu currently ranks third lowest in Maternal Mortality Ratio (MMR) with 63 per 100,000 live births among major States in India (SRS,2015-2017). The decline of MMR is attributed to all the targeted interventions and strategies implemented by the State in the last two decades. As per State HMIS Jan 2020, the MMR has dropped to 57 per one lakh live births. The reduction in maternal mortality in the State involves a set of both direct and indirect strategies with focus on factors including health systems strengthening, economic growth, infrastructure development, education, nutritional status, and an exclusive focus on marginalized sub-groups.

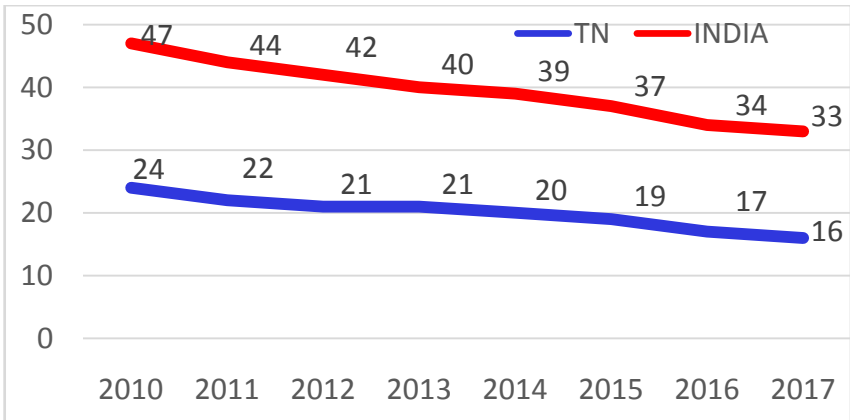
MATERNAL MORTALITY RATIO



Source: SRS (2017)

17.4 Child Health

17.4.1 A significant reduction in Infant Mortality Rate (IMR) from 24 per thousand live births in 2010 to 16 in 2017 as per Sample Registration System (SRS) Data 2017 against the National IMR of 33 and reduction in Crude Birth Rate (CBR) from 15.9 in 2010 to 14.9 in 2018, are indicative of the robust policy frame work and sincere efforts of this Government to improve the health profile of the State. The State ranks as the second lowest IMR among the major States in the country.



Source: SRS 2017

Institutional Based Interventions

17.4.2 Facility based newborn care:

Different levels of care are being provided for the newborn at various health facilities.

- ✓ 74 Special Newborn Care Units are dedicated centres providing tertiary care treatment to the very sick neonates at 24 Medical College Hospitals and 50 District and Taluk / Non-Taluk Hospitals. 1,00,400 children have been admitted and treated in SNCUs from April 2019 to Jan 2020.
- ✓ 156 New born stabilisation units have been established at 114 Government. hospitals and 42 Level-II MCH centres in PHCs to stabilize sick babies needing moderate care. They also serve to decrease the case load at the SNCUs by taking care of minor ailments of the new born.
- ✓ Newborn care corners have been established in all labour rooms to provide resuscitation immediately after birth.
- ✓ Regular follow up clinics are being conducted to review the newborn discharged from the SNCUs.

17.4.3-Nutrition Rehabilitation centres:

Six nutrition rehabilitation centres have been established at Government. Dharmapuri Medical College Hospital, Institute of Child Health and Hospital for Children Egmore, Government. Rajaji Hospital Madurai, Government. Tiruvannamalai Medical College Hospital, Government. Tirunelveli Medical College Hospital and Perambalur District Headquarters Hospital. The children with malnutrition are being identified in the outpatient department and also through referral from the community and admitted in the Nutrition Rehabilitation Centre. Special nutritious formula feeding is provided by cook cum care taker under the guidance of a Paediatrician and assisted by a Nutrition Counselor. 3014 malnourished children have been treated at these centres from April 2019 to Jan 2020.

17.4.4 Delivery Point Screening and linkage with CMCHIS:

Newborn screening at public health facilities by existing health service providers (Medical Officers) at all designated delivery points have been trained to detect, register and

report the congenital anomaly identified within 48 hours of life. Every newborn born sick or preterm or with low birth weight or any birth defect is referred and followed up at the District Early Intervention Center. From April 2019 to Jan 2020, 2,87,359 new born were screened and 1,031 identified with defects at birth. Among the screened, children who require surgical intervention like corrective surgeries for Congenital Heart Diseases, Cleft Lip, Cleft Palate, Club Foot, Congenital Cataract, Cochlear implantation for congenital deafness and treatment for Autism disorders are referred to Tertiary Centres and are covered under the Chief Minister's Comprehensive Health Insurance Scheme(CMCHIS).

Community based newborn care:

17.4.5 Home Based New Born Care and Home Based Young Child Care:

The scheme ensures Provision of home based new born care by the field health functionaries such as VHNS to ensure the survivability of the child, timely referral on detection of danger signs, promotion of exclusive breast feeding and improving Infant

and Young Child Feeding (IYCF) practices. Training of health functionaries in Integrated Management of Neonatal Childhood Illness (IMNCI) also has greatly added to the reduction of mortality due to neonatal illness. This has now been expanded for children upto 15 months of age under Home Based Young child (HBYC) care in two aspirational districts of Virudhunagar and Ramanathapuram where in 5 visits are made by the Angan Wadi Workder / ASHA . The Angan Wadi Workder / ASHA are provided with performance based incentive. From April 2019 to Jan 2020, 21,255 children in the age group of 0 to 1 year have benefitted in the 2 districts. In the year 2020-21, another 21 more Health unit districts have been taken for rolling out the Home Based Young child (HBYC) care in the state where in 232303 new born would be benefitted.

17.4.6 - Vitamin A supplementation

Vitamin A is essential for child survival, health, growth and development. Children with even mild or moderate vitamin A deficiency have weaker immune systems and suffer from more respiratory infections, diarrheal diseases and

measles, contributing to an increased risk of death. By meeting the vitamin A needs (through supplementation) of children under five years ,mortality and morbidity among under 5 children is reduced. Vitamin A supplementation was given to 58,96,935 beneficiaries covering 98% of target population in the month of August 2019.Vitamin A Supplementation for the year 2020 is planned to be held on March 2020 for children under five years.

17.4.7- Rashtriya Bal Swasthya Karyakram (RBSK)

Rashtriya Bal Swasthya Karyakram (RBSK) is being implemented throughout the State of Tamil Nadu since 2015, which envisages Child Health Screening and Early Interventions for care, support and treatment. The programme aims at early detection and management of a set of 30 health conditions prevalent in children less than 18 years of age. Children in the age group from birth to eighteen years including the newborn and those attending Anganwadi Centres and Government/ Government-aided schools are benefitted through this programme.

Two Mobile Health Teams (MHTs) are functioning per block and a total of 770 MHTs

are functioning in rural areas throughout the State. In addition to it, 15 Mobile Health Teams in Greater Chennai Corporation and 20 Mobile Health Teams in the rest of the urban areas of Tamil Nadu are functioning to cater to the needs of the urban population.

From April, 2019 to January 2020 95,72,000 children have been screened in schools and Anganwadi centres. 5,97,114 children have been identified with disease conditions and 4,60,729 children have been referred and treatment provided for the same at secondary and tertiary care institutions. Till date, 18,536 children (from April 2015 to Jan-2020) have been identified for surgeries and out of which 17,264 children have been managed surgically. Under Kannoli Kappom Thittam (KKT), children in 14,772 schools have been screened and out of which 1,85,940 children have been identified with refractive errors and are provided with free spectacles.

Surgeries performed under RBSK program (April 2015- Jan 2020)

| S. No. | Disease condition | Children Confirmed | Children Medically Managed | Children Needed Surgery | Surgery Done |
|---------------|--------------------------|---------------------------|-----------------------------------|--------------------------------|---------------------|
| 1 | CHD | 23,355 | 11,955 | 11,314 | 10,679 |
| 2 | RHD | 4,668 | 4,253 | 442 | 429 |
| 3 | Club foot | 2,939 | 1,926 | 1033 | 982 |
| 4 | Cleft lip | 3,646 | 196 | 3523 | 3,154 |
| 5 | Cong. | 1,007 | 240 | 764 | 727 |
| 6 | Cong. | 4,003 | 2,806 | 1,196 | 1,073 |
| 7 | Neural | 410 | 144 | 264 | 220 |
| | TOTAL | 40,028 | 21,520 | 18,536 | 17,264 |

17.4.8- District Early Intervention Centre (DEIC):

DEIC's are functioning at 34 facilities (13 District Headquarters Hospitals and 21 Medical College Hospitals) for early detection and intervention so as to minimize disabilities of the children diagnosed with health conditions. DEIC has the required facilities for providing social, educational, vocational and economic rehabilitation services provided by a 12-member team headed by a dedicated DEIC Pediatrician. All 34 DEIC facilities have been empanelled

under CMCHIS. From April 2019 to Jan 2020 1,40,895 children have been managed in 34 DEICs.

17.4.9-Block Early Intervention Centres (BEIC):

The children diagnosed with disease conditions (Developmental delay / Neuro muscular disorder) and managed at DEICs, require daily interventions, but are unable to reach the DEICs regularly due to distance and other reasons such as loss of wages for the parents. Hence, an early intervention centre is being established at block level to provide and continue the intervention services. One BEIC per Health Unit District, i.e. 42centers established in coordination with Education Department. The Specialists from DEIC will be visiting the BEICs once in 15 days for monitoring and supportive supervision. This ensures continuum of care, increased accessibility and good follow up.

17.4.10-Infant Death audit:

The Infant death audit committee under the chairmanship of District Collector reviews select infant deaths monthly. Institutional infant

death audit is conducted every week by the pediatricians and Obstetricians in CEMONC centers. The PHC Medical Officer conducts detailed verbal autopsy from the parents/caretakers of the infant deaths occurring in their area. Infant death line list is consolidated at state level and complete analysis is being done and corrective measures taken.

17.5 Adolescent Health

17.5.1 Weekly Iron and Folic Acid Supplementation (WIFS)

The programme is implemented in all districts to control anaemia among adolescents in rural and municipal areas. The programme involves distribution of one Iron and Folic Acid (IFA) tablet a week to all adolescent girls and boys (10 to 19 years of age), both in school and out of school along with biannual de-worming (February and August every year). The blue IFA (100 mg elemental Iron and 500 micrograms Folic Acid) tablets are given on every Thursday under supervised consumption by teachers and Anganwadi workers.

17.5.2 Rashtriya Kishore Swasthya Karyakram (RKSK) programme

This programme comprehensively address the health needs of the adolescents and is implemented in 19 districts in the state. In these districts, Adolescent Friendly Health Clinics (AFHC's) are successfully functioning in 253 Block PHC, 148 GH, 19 District Head Quarters Hospital and 12 Medical College Hospitals. These adolescents Friendly Health Clinics identify and treat the health issues among adolescent boys and girls aged between 10-19 years. Treatment is being given to health problems and counseling services is offered to those adolescents having social and mental issues. Community-based interventions are provided through peer educators. The scheme envisages on improving the knowledge, attitude and behavior, in relation to Sexual and Reproductive Health which includes menstrual hygiene. Adolescent health club is conducted every month for the 4 Peer educator selected for every Village Health Water Sanitation committee at the Sub centre by the Village health Nurse. The Adolescent health days are carried out on a quarterly basis to spread

awareness and knowledge on the adolescent health issues at each of the Village and Town Panchayath level by the Village Health Water Sanitation committee members by including the Peer Educator.39,640 peer educators have been selected and trained under the programme

17.6 Untied Funds

Health sector reforms under the National Health Mission (NHM) aims to increase functional, administrative and financial resources. There is an autonomy to the field units under which District Head Quarters Hospitals are given 10 Lakhs / year, Sub District Hospital and Community Health Centres are given 5 Lakhs / year, Primary Health Centres are given 1.75 Lakhs per year, Health Sub Centres are given 10,000 / year. These Flexi pool funds are available with the Medical Officer of the respective facilities for completion of minor civil work, minor repair works of equipment, consumables, and upkeep of facilities and improvement of patient amenities. This reduces the Out-Of-Pocket Expenditure (OOPE) of the poor people approaching the public health facilities and improves the patient satisfaction.

17.7 Village Health, Water, Sanitation and Nutrition Committee (VHWSNC)

Village Health, Water Sanitation and Nutrition Committee (VHWSNC) has been constituted under National Health Mission (NHM) in rural areas to plan and implement activities at village level. The main purpose is community involvement at local level to promote decentralization in planning. This committee provides leadership and a platform for addressing issues related to health services, raising community awareness and promoting community involvement.

VHSNC is constituted with VHN, Local Panchayat President, Anganwadi worker, Local school teacher, Health Inspector and representative of SHGs for ensuring community participation, effective communication and for prevention of diseases. Every VHSNC is entitled to an annual untied grant of Rs. 10,000. This fund is jointly operated by Panchayat President and VHN. There are about 15,015 VHSNCs in Tamil Nadu which proactively monitors the access of healthcare services.

17.8 Training

17.8.1 Managerial Skill Training for Medical Officers

This training is imparted to all the newly recruited Medical Officers for a period of 15 days on all health programmes being implemented and also includes their administrative role in the PHCs. Since 2011, 6,479 Medical Officers have been trained till date.

17.8.2 BEmONC Training (Basic Emergency Management of Obstetric and Neonatal care)

This training is provided for a period of 6 days to all the PHC Medical Officers to upgrade the knowledge on the subject. This training is being conducted at 6 Regional training institutes in association with their corresponding Government Medical Colleges. Since 2012, 6,110 Medical Officers have been trained till date.

17.8.3 MCH skill lab Training to Medical officers /Staff nurse/ANM

MCH skill lab training is conducted periodically for Medical officers, Staff nurses,

ANM at the skill labs of all 6 Regional Training Institutes to upgrade the skill and knowledge on reproductive, maternal, newborn child plus adolescent health for reducing maternal and child morbidity and mortality. Since 2012, 4,583 Health Staff have been trained till date.

17.8.4 Poison management training

Poison management training is imparted to familiarise the medical officers in handling medical emergencies and provide systematic management skills for handling toxicology patients. Since 2014, 3,372 Medical Officers have been trained till date.

17.8.5 Life Saving Anesthetic Skills Training (LSAS)

This training programme of 24 weeks is provided to MBBS doctors since 2007 and specifically focuses in developing skills of obstetric anesthesia to operationalize comprehensive emergency obstetric and new born care centers along with cardio pulmonary cerebral resuscitation. It is being conducted in 11 Government medical college institutions. 634 doctors have been trained till date from the

inception of the training. Since 2017, 10,203 Caesarean sections, 44,187 other surgeries were anaesthetized by certified anesthetists through this training.

17.8.6 Emergency Obstetric Care Training (EmOC):

This training is implemented to train medical officers in providing high quality emergency care services in underserved areas to prevent maternal mortality and morbidity. Intensive programme of 25 weeks training is conducted in 5 government medical institutions Since 2009. 143 doctors have been trained till date. Since 2017, 1954 Caesarean sections and 5768 other surgeries were conducted by trained EmOC doctors.

17.8.7 National Nodal Centre, (NNC)

College of Nursing, Madras Medical College

This centre acts as a Centre of Excellence for the pre-service education for nursing-midwifery cadre in the state and would contribute to the overall strengthening of

nursing-midwifery cadre .This six weeks training course for the nursing faculty aims at strengthening their teaching skills, knowledge and the same to their students in their colleges. Since 2016, 118 Nursing midwifery Tutors have been trained till date.

17.9 Tribal Health

17.9.1 Provision of Accredited Social Health Activists (ASHAs) in Tribal /Difficult areas

2650 ASHAs are being engaged in tribal / hilly / remote / difficult PHCs of the state to deliver health services to the tribal and hard to reach areas. Since ASHAs are from the same tribal community, they motivate the Tribal mothers for regular antenatal checkups in Health Sub-Centres and Primary Health Centres, which result in promoting institutional safe delivery practices.

17.9.2 Birth Waiting Room in 17 tribal PHCs

In non motorable roads and villages with a long distance to a health facility, the tribal mothers are being admitted two weeks before the Expected Date of Delivery in birth waiting room established in 17 PHCs in the foot hills of

tribal areas for safe delivery to occur under institutional care. In Birth Waiting Room (BWR) nutritious diet is provided to the antenatal mother and attender during their entire period of stay. Since 2016, 10582 Tribal AN mothers have benefitted through the tribal birth waiting rooms till date.

17.9.3 Referral Services in Tribal Districts

The State has a well-established emergency referral transport system established through TN-EMRI. In order to reach those tribal areas which are inaccessible by regular ambulances, four wheel drive vehicles suitably equipped as ambulances have been provided in 76 identified points in tribal / hilly areas to reach the Tribal Hamlets. These vehicles ensure timely referral of tribal people to higher referral centres and prevent adverse outcomes.

17.9.4 Tribal Bed Grant Scheme

Tribal Bed Grant is a Scheme where free Diagnostics, Drugs for IP patients, Surgeries and diet are being given to the tribal people who are hospitalized in tribal areas. This scheme is being operated through NGOs by an MOU with the

DDHS of the concerned district. This Scheme has increased the health seeking behavior in the tribal Community, access to quality health care and has reduced out of pocket expenditure. This has also improved the maternal and child health care of the tribal community, by the increase in percentage of institutional deliveries. Since 2016, 5497 tribal patients have benefited through this scheme till date.

17.9.5 Tribal Counselors

Tribal Counselors have been placed in the 10 Government Hospitals in the tribal districts. They act as ambassadors between the health systems and tribal community. They also function as health activists in the institution where they not only create awareness on health and its determinants but also motivate the community towards healthy living practices.

17.9.6 Prevention and Control of Hemoglobinopathies

Among the South Indian States, Tamil Nadu is the first state to implement Prevention and Control of Hemoglobinopathies program for early detection of Hemoglobinopathies like Sickle

Cell Anaemia, Thalassemia among the tribal population. Hemoglobinopathies are preventable genetic disorders which in their severe forms are associated with severe morbidity, disability or death. All Thalassemia major affected children need regular blood transfusion once in 2- 3 weeks to survive and few Sickle Cell Anemia patients may need regular transfusions. Timely identification of the trait and proper genetic counseling will prevent the transmission of the abnormal genes from the parents to offspring, thus breaking the propagation of the disease process.

NHM, TN along with other Directorates are screening for Hemoglobinopathies (Sickle Cell Anaemia and Thalassemia) in adolescent children studying in 10th and 12th standard and unmarried school dropouts above the age of 14 in 30 selected tribal blocks in 13 Districts since November 2017. The programme is being implemented in Dharmapuri, Salem, Krishnagiri, Namakkal, The Nilgiris, Coimbatore, Thiruvannamalai, Villupuram, Vellore, Tiruchirapalli, Dindigul, Erode and Kanyakumari districts. The programme involves primary

screening of school children with CBC, NESTROFT and SOLUBILITY tests done by the tribal MMU. Final diagnosis of the screened positive children is done at Government Medical College Hospitals using High Performance Liquid Chromatography (HPLC)

On identification of the trait, the children and their parents are provided with genetic counseling at District Early Intervention centres. Since 2017, 21,399 Children have been screened for the disease with a positivity rate of 9.7%. In the forthcoming year, this programme will be extended to screen antenatal mothers. With the successful implementation of the programme, the incidence of thalassemia and sickle cell anemia will be reduced and the future generations will become free from Hemoglobinopathies.

17.9.7 Establishment of Integrated Treatment Centres for Hemophilia and Hemoglobinopathies in 5 Government Medical College Hospitals of Tamil Nadu

To provide continuum of care and services for children/adults affected with Hemophilia and Hemoglobinopathies, comprehensive day care

centre has been established at 5 regional zones namely:

1. Institute of Child Health and Hospital for Children, Chennai-8 (Nodal Centre)
2. Government Mohan Kumaramangalam Medical College Hospital, Salem
3. Government Dharmapuri Medical College Hospital, Dharmapuri.
4. Government Rajaji Madurai Medical College Hospital, Madurai.
5. Government Theni Medical College Hospital, Theni.

These centres benefit children/adults requiring frequent blood/factor transfusions and provide iron chelation therapy for transfusion dependent hemoglobinopathies. The Integrated Treatment Centres help in better compliance and efficient monitoring of Sickle cell / Thalassemic Children and Hemophilia patients. Since 2018, 2655 patients have received Blood Transfusion and 1835 patients have received factor transfusion through these centres.

17.10 Mobile Medical Units

17.10.1 Hospital on Wheels Programme in Rural areas

Hospital on wheels have been provided in all blocks of the state so as to cover remote, hilly/tribal and inaccessible areas. There are 395 Hospital on wheels each manned by one medical officer, one nurse, one lab technician, one driver and one attendant. Each Mobile Medical Unit covers 42 villages on an average based on fixed days as per a fixed tour programme.

Package of Services rendered are antenatal care / post natal care, immunization for the drop outs, new born screening / under five care, RTI/STI management, adolescent care, health checkup for children, treatment of minor ailments, drug distribution including non-communicable drugs, fever surveillance, family welfare counseling, copper T insertion etc, apart from basic lab services.

Since 2011, about 12 crore people have benefited through 16,82,979 camps till date.

17.10.2 Tribal Mobile Outreach Services

To augment the Mobile Outreach Services in tribal and hard to reach areas, an additional 20 Mobile Medical Units are being operationalized through NGOs in tribal blocks of 13 Districts. These Tribal Mobile Outreach Team comprises of one Medical Officer, Staff Nurse, Lab Technician and Driver. The team conducts minor ailment clinic, antenatal screening, Non Communicable Disease screening and lab tests. Free drugs are also distributed. In addition to above treatment the team screens 10th and 12th Standard Tribal and Non-Tribal children and dropouts above the age of 14 for Haemoglobinopathy traits. Since 2016, 8,93,723 patients in tribal villages have been benefitted.

National Quality Assurance Standards

17.11.1 National Quality Assurance Standards (NQAS) Programme in Government Health Facilities: NQAS aims to match patients' expectations through filling up the gaps in the service delivery and monitoring it by three levels of assessments i.e. Internal Assessment, State Assessment and National Level External Assessment. NQAS assessment measures quality

through eight broad areas of concern – Service Provision, Patient Rights, Inputs, Support Services, Clinical Care, Infection Control, Quality Management and Outcome. Qualified facilities are financially incentivized with an amount of Rs.10,000 per functional bed for the certified year and the subsequent two years, duly completing the assessment as per guidelines. During the year 2019-20, the State has achieved NQAS National certification for 3 District Head Quarters Hospitals, 12 Sub-District Hospitals, 14 Community Health Centres and 18 Primary Health Centres.

17.11.2 Kayakalp Award Scheme (Cleanliness Drive and Award) undertaken in Public Health Facilities: Kayakalp certification ensures to promote cleanliness and enhance the quality of public health facilities through seven parameters- Hospital/Facility Upkeep, Sanitation and Hygiene, Waste Management, Infection control, Support Services, Hygiene Promotion and Cleanliness beyond Boundary Wall. The purpose of this initiative is to appreciate and recognize the efforts to create a healthy environment in all DHQH, SDH, CHC, PHC, UCHC and UPHC. In 2019-20, Kayakalp award programme activity has been implemented

across the state and external assessment has been completed for the following facilities:

| Type of facility | Total No. of facilities participated in Kayakalp assessment | Total No. of facilities score above 70% in Kayakalp Assessment |
|---------------------------------|---|--|
| District Head Quarters Hospital | 31 | 28 |
| SDH | 141 | 129 |
| CHC | 276 | 226 |
| Primary Health Centre | 596 | 451 |
| UCHC | 10 | 2 |
| UPHC | 217 | 168 |
| HWC-HSC | 200 | 167 |
| | | |

7.11.3 Mera Aspataal: Mera Aspataal programme is an Information and Communication Technology (ICT) based systems that captures the patient feedback. The ultimate goal of this application is to provide patient-centric care and improve quality of services at healthcare facilities. District Hospitals are ranked under District Hospital ranking system based on

Patient Satisfaction System Score generated in Mera Aspataal. District Hospital, Namakkal stands first in the performance of State Health Facilities based on Patient Satisfaction Score for the last two years.

NON-COMMUNICABLE DISEASE PREVENTION, CONTROL AND TREATMENT

17.12 The State of Tamil Nadu is a pioneer in implementing the Non-Communicable Diseases Intervention Programme covering all 32 districts. The program is implemented under the aegis of National Health Mission (NHM) as National Programme for Prevention and Control of Cancer, Diabetes, Cardiovascular Diseases and Stroke (NPCDCS).

The Program covers 2,516 Government health facilities across Primary / Secondary / Tertiary and municipal levels of health care. Under the programme, screening, treatment and follow-up services are provided for Hypertension, Diabetes Mellitus, Cervical and Breast cancer to all individuals aged 30 years and above attending any Government health facility in the State. In addition to the above, counseling services for individuals on 'Life Style Modification' are also provided. To augment the follow up services, activities have also been initiated to strengthen

the Intensive Care Units (ICUs) in 29 District Headquarter Hospitals and two Medical College Hospitals besides strengthening the Cancer diagnostic services by establishment of Free Pathology Services in Districts without Medical College.

The NPCDCs is funded by NCD flexi pool at a budget of Rs. 71.67 Crores for the year 2019-20.

Performance under facility based or opportunistic screening for NCDs

The State level performance of all health facilities under NPCDCS program for screening of NCDs during the period from July 2012 to January 2020 is presented below:-

| | | |
|--|----------|-------------|
| Hypertension | Screened | 7,09,80,952 |
| | Positive | 58,09,418 |
| Diabetes Mellitus | Screened | 5,71,93,274 |
| | Positive | 24,54,037 |
| Screened for Cervical Cancer with VIA test | | 2,20,73,440 |
| VIA Positive | | 5,94,739 |
| Screened for Breast Cancer with CBE | | 2,73,00,521 |
| CBE Positive | | 2,77,944 |

17.12.1. Strengthening of Cancer Care at State and District Level:

A state-of-the-Art 'Apex State Cancer Institute' for providing Tertiary treatment, Research and Education in Cancer care is being established at Government Arignar Anna Memorial Cancer Institute, Karapettai, Kancheepuram. Four Regional Cancer Centers are being established in Government Rajaji Hospital Madurai, Government Coimbatore Medical College Hospital, Government Tirunelveli Medical College Hospital and Government Thanjavur Medical College Hospital at a total cost of Rs.60 Crores.

Under strengthening of cancer care activities, 10 Old Cobalt-60 units were replaced with new Cobalt-60 units. In addition to this, 4 more new Cobalt-60 units and 11 high end Linear Accelerator units are being established at Government health institutions.

17.12.2 District Level Day Care Chemotherapy Centres: Day care chemotherapy centres are functional in District Headquarter Hospital in all districts except in

Tiruvannamalai, Karur and Pudukkottai where it functions in Government Medical College Hospitals.

The final treatment decision for the patients confirmed with cancer will be done by the tumour board at tertiary care hospital and the first chemo cycle also would be given there. Then, the follow-up or maintenance chemotherapy which involves more cycles will be given at District Headquarters hospital under supervision of one physician and staff nurse in each district trained in Day Care Chemotherapy. This will amply benefit cancer patients who find it most inconvenient to report to the same tertiary care institution for the maintenance chemotherapy and also incur lot of Out-of-Pocket Expenditure (OOPE) or fail to follow-up in the absence of such programme.

17.12.3 Free Pathology Services : Under the 'Free Pathology Service' initiative, histopathology laboratories have been established in district headquarter hospitals of Cuddalore, Dindigul, The Nilgiris, Nagapattinam, Namakkal, Perambalur, Ramanathapuram, Tiruppur, Tiruvallur and Virudhunagar.

17.12.4 Population (or) Community based NCD Screening and Follow up: Under NPCDCS program, Population or Community based NCD screening is done by enumerating the community through house-to-house visits through field functionary (ASHA/WHV/AWW). They also create awareness on NCDs and risk factors, screen for Hypertension using a Digital Blood pressure apparatus and for Diabetes Mellitus by a Glucometer for all those aged 30 years and above. The Women Health Volunteers are identified through Tamil Nadu Corporation for Development of Women (TNCDW) and are entrusted the job of community based NCD screening and are paid through performance based incentives.

The individuals suspected for Hypertension / Diabetes at the household level get referred to the nearest PHC for confirmation and further follow up. Women aged 30 years and above are in addition motivated to attend nearest PHC for Cervical and Breast cancer screening. The field functionary will also refer those suspected for Oral cancer, Tuberculosis, Leprosy and Mental Health, Chronic Kidney Disease and Chronic

Obstructive Pulmonary Disease. Besides the survey, the field functionary also carries out a risk assessment using Community Based Assessment Checklist (CBAC) for those in 18-29 years age group and refer those with a high-risk score to PHCs for screening. They will also do group counseling and form patient support groups in the community for various NCDs in the community.

Population based NCD screening is currently under way in 6 districts completely (Pudukottai, Perambalur, Krishnagiri, Karur, Ramanathapuram and Virudhunagar) and one block per HUD in rest of the districts covering 35 UHC Blocks (a total of 2034 HSCs) with 1732 WHVs and 302 ASHAs. The program has also been rolled out in 2 Corporations fully (Tirunelveli and Coimbatore) and 30 Urban-PHCs of Greater Chennai Corporation (GCC) by involving four field functionaries in one UPHC area with 284 WHVs. The program will further be extended to all the remaining Corporations in Tamil Nadu including the entire Greater Chennai Corporation (GCC).

Up to January 2020, a total of 63,01,536 individuals were screened at households for

Hypertension and 58,72,654 for Diabetes in the rolled out districts. Among those screened, 5,63,768 and 4,41,262 were suspected for Hypertension and Diabetes respectively and referred to PHCs for confirmation. Among them, 46,343 individuals were put on treatment after confirmation for Hypertension and 34,761 for Diabetes. The field functionaries have referred 5,33,300 women for screening of cervical cancer and 5,29,860 for screening of Breast cancer at the PHCs. A total of 91,609 individuals were referred for screening of Oral Cancer during this period. The field functionaries were also able to identify and put on treatment 143 TB and 27 Leprosy cases.

17.13 Universal Health Coverage:

“Anaivarukkum Nalavazhvu Thittam”.

- Universal Health Coverage (UHC) project has been piloted successfully in 3 pilot blocks of Veppur, Shoolagiri and Viralimalai in 3 Health Unit Districts (HUDs) of Perambalur, Krishnagiri and Pudukottai respectively covering 67 HSCs and 17 PHCs (including block PHCs) since 2016. In 2017-18, the program was up-scaled to additional 39

blocks @ 1 block per HUD at a total cost of Rs.2,474.07 lakhs.

- UHC aims to bring comprehensive set of services to the doorstep of the people thereby reducing out-of-pocket expenditure. UHC also aims to address the healthcare needs of the people in the long-term. The full spectrum of essential, quality health services should be covered including health promotion, prevention and treatment, rehabilitation and palliative care. The Sub-Centre strengthening is the pillar for the UHC program.
- In the year (2018-19), Government had made an announcement to transform its 985 Health Sub-Centres, 716 Additional PHCs and 214 Urban PHCs to Health and Wellness Centres (HWCs) with Government of India support of Rs.9,357.47 lakhs (rural and urban). In 2019-20, the State will transform 668 Additional PHCs and 246 Urban PHCs to Health and Wellness Centres (HWCs) with Government of India support of Rs.13,573.64 lakhs (rural and urban).The roll out plan for HWC in Tamil Nadu is given below

| Year | HSCs | Addl. PHCs | Urban PHCs | Total |
|---------|-------|------------|------------|-------|
| 2017-18 | 67 | 14 | - | 81 |
| 2018-19 | 918 | 702 | 214 | 1,834 |
| 2019-20 | 796 | 668 | 246 | 1,710 |
| 2020-21 | 667 | - | - | 667 |
| Total | 2,448 | 1,384 | 460 | 4,292 |

- The HWCs will provide a set of 12 Comprehensive set of services including Preventive, Promotive, curative Rehabilitative and Palliative care for a package of services related to RMNCH+A, Communicable diseases, Non- communicable diseases, Ophthalmology, ENT, Dental, Mental, Geriatric care, treatment for acute simple medical conditions and emergency and trauma services. The HWCs would be the window of opportunity for strengthening the primary health care system in our State.

17.14 Patient Support Groups (PSG) in UHC Blocks in Tamil Nadu

Patient Support Group (PSG) is a community-based intervention which is currently being implemented in Tamil Nadu for

strengthening community participation for better NCD control including compliance to treatment for common NCDs especially Hypertension and Diabetes. The group can address a lot of issues faced by them in the management of the NCDs and mutually benefit each other through sharing of experiences. It was piloted in the UHC blocks of 3 districts namely Cuddalore, Villipuram and Virudhunagar during August 2019 and is currently being up-scaled to all 47 UHC blocks of Tamil Nadu. This will be integrated with the visit schedule of 'Hospital on wheels' program through the Mobile Medical Units (MMU) in villages covered by MMU Team and in rest of the villages, it would be covered as part of the regular work plan of Health and Wellness centres. The Women Health Volunteer from the SHG network is the first point of contact for the community in the household level screening for NCDs. From the untied funds of the HWC an incentive of Rs. 250/PSG meeting is given to the leader in -charge for the PSG by the MMU /HWC for the conduct of the meeting.

17.15 National Program for Palliative Care (NPPC)

Palliative care primarily aims to relieve suffering and improve quality of life of adults and children affected by life-threatening and life-limiting illness. This involves inclusion of their family members as a part of care giving services.

It is estimated that 7 % of the population of Tamil Nadu require palliative care. From 2016 -19, District level Palliative care units have been established at 26 DHQH and 6 Medical College Hospitals and Oral Morphine is made available in all the districts of Tamil Nadu.

Further, Community Based Palliative Care Services are being implemented at block level in a phased manner to provide home based Palliative care nursing services. Trained staff nurse designated as 'Community Palliative Care Nurse' @ 1 per block are providing home based Palliative care nursing services for those who are bed-ridden.

During June 2018 to January 2020, Community Based Palliative Care Services have

been implemented in 210 blocks covering all HUDs by placing one Staff Nurse in each of the blocks trained in Community based Palliative Nursing Care. 58,955 individuals have benefited from home based palliative care.

17.16 Occupational Health Services for Unorganized sector workers

In Tamil Nadu, the un-organized sector work force constitute 93% of the total workforce (Census 2011). They suffer from various occupation-induced diseases like Silicosis, Asbestosis, Deafness, Irritant Dermatitis, Spondylosis etc. Since most of the occupation-induced diseases result in irreversible damage, timely screening, prevention and early treatment is the way forward.

Government has issued orders for implementation of occupational health services for unorganized sector workers in all 385 blocks through respective MMUs. The MMUs visit the unorganized sector areas every Saturday and in addition one working day of first week of every month and provide occupational health services to workers. From April 2019 to January 2020, 83,091 un-organized sector workers were

screened, of whom 7,604 workers were referred to district level hospital for further investigations and treatment.

Government has introduced 50 Mobile Health Clinics for providing Occupational Health Services for construction workers. This activity is funded by Department of Labour and Employment and implemented through NHM-TN.

17.17 Geriatric Care

As per Census 2011 10.4% of Tamil Nadu population is above 60 years of age against the national average of 8.6% (Census 2011); thus becoming the third state in India with highest share of elderly which stresses the importance of geriatric care in the state. The elderly suffers from various degenerative disorders that render them dependent and vulnerable. To cater to the health care needs of Geriatric Population, Government of Tamil Nadu through National Health Mission, Tamil Nadu has already taken initiatives by establishing elderly-friendly healthcare facilities at various levels of care under National Program for Health Care of Elderly (NPHCE).

17.17.1 National Centre for Ageing, Chennai: A joint venture of Government of India and Government of Tamil Nadu, this 200 bedded institute is of national importance and currently under development at the campus of King Institute of Preventive Medicine, Guindy, Chennai.

17.17.2 Regional Geriatric Centre (RGC), Rajiv Gandhi Government General Hospital, Chennai The Department of Geriatric Medicine, Rajiv Gandhi Government General Hospital, Chennai is serving as the Regional Geriatric Centre and provides tertiary level of care, training of health professionals and research.

17.17.3 Medical College / District Hospitals: Government of Tamil Nadu has established Geriatric units in 18 Government Medical College Hospitals of Coimbatore, Salem, Trichy, Madurai, Tirunelveli, Thanjavur, Vellore, Villupuram, Dharmapuri, Chengalpattu, Kanniyakumari, Karur, Pudukkottai, Sivagangai, Theni, Thiruvavur, Thoothukudi, Thiruvannamalai and 13 Government District Head Quarter Hospitals of Ariyalur, Cuddalore, Dindigul, Erode, Krishnagiri, Namakkal, Nagapattinam, Ramnad,

Tiruvallur, Tiruppur, Perambalur, Virudunagar and The Nilgiris with required man power.

The following facilities are available in each district level hospital under NPHCE:

1. Exclusive 'Geriatric OP' for elderly patients on all days of the week.
2. Separate 'Q' for elderly at OP Ticket issue counter, Pharmacy, Laboratory and Radiology.
3. Twenty bedded elderly-friendly ward with anti-skid floor, side-rails and western toilets with adjacent grab bars.
4. Physiotherapy unit for elderly patients.
5. Intensive-Care facilities- Four ICU cots and One Ventilator reserved for elderly.

The details of elderly patients that have availed services from April 2019– January 2020 under NPHCE is given below:

| | |
|---|----------|
| Number of Elderly persons attended Geriatric OPD | 5,73,897 |
| Number of Elderly persons admitted in geriatric wards | 27,912 |
| Number of Elderly persons given rehabilitation services | 88,484 |

| | |
|--|---------|
| Number of Laboratory tests performed for the elderly | 72,1795 |
|--|---------|

17.17.4 At Block level: The Government has sanctioned 385 posts of Physiotherapists for 385 Block PHCs @ 1 Physiotherapist per Block PHC to avail geriatric care services at block and community level.

17.18 Transgender Clinics

To cater to the specific needs of Transgender people, Government has established Multi-Specialty Transgender Clinics at Rajiv Gandhi Government General Hospital, Chennai and Government Rajaji Hospital, Madurai. (RGGGH) The Multi-Specialty Transgender Clinic at RGGGH, Chennai runs every Friday. 220 Transgender people have registered at the Clinics from June 2019 to Jan' 2020 and 12 Sex Reassignment Surgeries were conducted at RGGGH Chennai during this period.

17.19 National Oral Health Programme

Oral Health is vital for overall well-being and quality of life. Poor oral health can have a detrimental effect on general health. With an

objective to improve the oral health among the population of Tamil Nadu, the National Health Mission - Tamil Nadu (NHM TN) has initiated the National Oral Health Programme (NOHP) in 2015-16 and now it is implemented in all the 42 Health Unit Districts (HUDs). NHM TN has established 389 Dental Clinics in Primary and Secondary Health Care institutions across the State to provide accessible, affordable and quality oral health care services.

NHM TN supports these Dental units by providing adequate infrastructure which includes buildings, equipment, supplies, and consumables that forms a crucial part in providing Oral health services. From April 2019 to January 2020 a total of 12,95,891 Dental procedures were carried out to treat various Oral Health Conditions among the people of Tamil Nadu. Now as a subsequent step in this program, NHM TN is establishing 88 Additional Dental Units to improve access to Dental Care services and cater to the Oral health needs of the general population across the State.

17.20 Oral Pre-Cancer Screening Programme:

In Tamil Nadu, the burden of oral cancer is very high, contributing greatly to morbidity and mortality. The main risk factors for oral cancer are HPV, tobacco, alcohol consumption, and the rates are higher in disadvantaged groups, who are more likely to smoke or drink and have low access to dental care. Oral cancer is often diagnosed at a late stage, which results in poor prognosis and a low survival rate, hence screening and early detection is crucial.

Tamil Nadu was the first in the country to launch the Oral Pre Cancer Screening program in 2016 to promote prevention and enable earlier detection. This innovative program supports the Oral Health professionals under NHM to raise awareness of Oral Precancer and Cancer, identify people at risk, discuss the risk factors, encourage behavior change, detect early signs, refer appropriately and reduce the impact of the disease. Since the inception of the programme, 57,92,461 patients were screened for Oral Precancer or Cancer lesions and out of these 253

patients were diagnosed positive for Cancer and treatment was initiated for the same.

17.21 Pradhan Mantri National Dialysis Programme:

Tamil Nadu tops the country with 927 Hemodialysis machines, the largest number in the Government sector. In Tamil Nadu, 0.8% of the population are suffering from End-Stage Renal Disease (ESRD). To resolve the issues of ESRD patients like financial constraints, low service accessibility and prolonged dependency for survival on Dialysis, National Health Mission Tamil Nadu, initiated the National Dialysis Program (NDP) in 2016 across the State.

Under this programme, free Hemodialysis services are available in 121 Centres including 24 Medical College Hospitals, 89 Taluk and Non-Taluk Hospitals, 5 Urban Primary Health Centres and 3 Block Primary Health Centres across the State. Between April 2019 and January 2020, about 2,58,608 Dialysis cycles were conducted for 4,367 patients with ESRD in Tamil Nadu.

17.22 District Mental Health Programme

Tamil Nadu is the 1st state to cover all districts under District Mental Health Programme. The Institute of Mental Health, Chennai, is the State Nodal Centre for implementing the District Mental Health Programme. Satellite Clinic are conducted by outreach Psychiatrist in all Block PHC's on a fixed day as per ATP (Advanced Tour Plan). 4,50,630 patients are being managed from April 2019 to Jan 2020 under DMHP.

17.22.1 State Mental Health Authority: As mandated under section 74 of the Mental Healthcare Act, 2017, Mental Health Review Boards have been formed in the State at 13 locations encompassing all the districts. Each board is headed by a chairperson in the rank of retired district Judge and other members such as Representative of the District Collector/ Psychiatrist/ Medical Practitioner and two Persons with mental illness or care givers or persons representing organizations of person with mental illness or care givers or non Governmental organizations working in the field of mental Health.

Functions of the Mental Health Review Boards include:-

- Review supported admissions
- Register and review advance directives
- Appoint nominated representative
- Decide objections against Mental Health Professional and Mental Health Establishment
- Decide for non-disclosure of persons with mental illness information
- Visit jails, and to protect human rights.

Tamil Nadu State Mental Health Policy and Implementation Framework has been published on 4.7.2019.

- Emergency Care and Recovery Centres (ECRC) has been established with 50 beds catering to the needs of wandering mentally-ill in 7 districts. The centre provides treatment, shelter rehabilitation, vocational training and reintegration services through NGO's in 7 districts of Vellore DHQH, Villupuram MCH, Theni DHQH, Tiruvannamalai MCH, TiruppurDHQH, Chennai Corporation and Pudukottai DHQH. From October 2018 to

January 2020, 585 patients were admitted under ECRC, in which 232 patients have been reintegrated with their family.

- Mentally ill patients are shifted to hospitals through mentally ill retrieval Vehicle (1 per district). From October 2018 to January 2020, 661 patients have benefitted from these services.
- In order to treat and rehabilitate individuals addicted to alcohol and drugs, 30 bedded de-addiction centres have been established in the District Headquarters Hospitals at Kancheepuram and Cuddalore. 4061 patients have been treated from the month of April 2019–January 2020.
- Global burden of disease, IHME report 2016, states that self harm (4.3%) is the 3rd leading cause of DALY. In order to reduce the suicide rate, Government of Tamil nadu has implemented Counseling for prevention of suicide by trained psychologist for Self-harm cases reported through Tamil Nadu Accident and Emergency Care Initiative (TAEI) Centres. From April 2019 - Jan 2020, 85,474 patients have been reported through TAEI

portal and 22,502 patients have been counseled.

- District mental health Programme is linked with NGO in 10 districts at The Nilgiris, Thiruvallur, Coimbatore, Thanjavur, Trichy, Perambalur, Kancheepuram, Cuddalore, Thiruvanamalai, Villupuram. The NGO conducts door to door survey to screen mentally ill patients, creates awareness about mental illness in the community.

17.23 National Urban Health Mission (NUHM)

- As per 2011 census, among major states of Tamil Nadu is the most urbanized state with 48.4% of the population living in urban areas.
- The National Urban Health Mission aims to address the health concerns of the urban poor by facilitating equitable access to available health facilities.
- NUHM endeavors to achieve its goal through the following approach:

- Need based city specific urban health care system to mete the diverse health care needs of the urban poor and other vulnerable sections.
 - Institutional mechanism and management systems to mete the health-related challenges of a rapidly growing urban population.
 - Partnership with community and local bodies for a more proactive involvement in planning, implementation, and monitoring of health activities.
 - Availability of resources for providing essential primary health care to urban poor
- To cater to the Urban population under NUHM guidelines, Government of Tamil Nadu has established 420 Urban Primary Health Centers (UPHCs) in 11 Corporations including Greater Chennai Corporation and 75 Municipalities having more than population of 50,000.

| Sl. No | Facility Under | No. of UPHCs |
|---------------|------------------------------|---------------------|
| 1 | Greater Chennai Corporation | 140 |
| 2 | Rest Of TN – 10 Corporations | 154 |
| 3 | Rest Of TN - Districts | 126 |
| | Total | 420 |

In addition to providing comprehensive primary health care services, NUHM provides special services namely,

1. Special Outreach Camp (SOC)
2. Urban Health Nutrition Days (UHNDs)
3. Urban Mobile Medical Units (MMU)
4. Urban Polyclinic
5. Mahila Aarogya Samiti (MAS)

1. Special Outreach Camp (SOC): Special outreach session is organized along the lines of integrated case management, involving periodic provision of services at the rate of 3 SOC/month @ Rs. 10,000/camp by health professionals and specialists (including Gynecologists, Cardiologists, Neurologists, Psychiatrists, Dentists), nurses, laboratory technicians. From April 2019 to Jan 2020,

11,340 camps have been conducted and 23,95,634 individuals have benefited from these camps.

2. Urban Health Nutrition Day (UHN Day):

UHND is conducted to cover the women and children living in slums among the urban population. The service is provided on monthly basis by the ANM in coordination with Anganwadi Worker (AWW) at a community structure in slum/urban areas. From April 2019 to Jan 2020, 13,347 UHN days have been conducted and 4,96,942 Adolescent girls and mothers have been benefited.

3. Urban Mobile Medical Units: 10 units will be established under NUHM (5 for Greater Chennai Corporation and 1 each for Coimbatore, Madurai, Tiruchirappalli, Tiruppur and Salem corporations) to reach the unreached population of the slum, migrant population and the workers of unorganized sector.

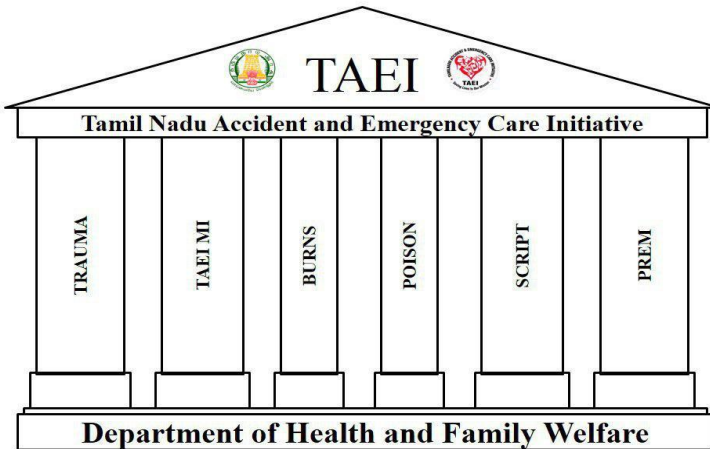
4. Urban Polyclinics: A specialty care to the urban poor, a "Polyclinic – Specialist Outpatient Clinic" in 96 UPHCs is conducted in

the evening from 4.30 to 8.30 pm. Specialty services provided are General Medicine, Pediatric Medicine, Dental, Ophthalmology, ENT, Obstetrics and Gynecology, Dermatology, Psychiatry, Orthopedics and Physiotherapy services on specific days and monitored through a web based application . From April 2019 – Jan 2020, 3,82,418 individuals have benefited from this specialty clinic.

5. Mahila Arogya Samiti (MAS): Mahila Arogya Samiti (MAS) is a community based federal group of around 50 to 100 households, depending upon the size and concentration of the slum population and are selected through Tamil Nadu Corporation for Development of women (TNCDW) through Self Help Group (SHG). 3324 MAS have been approved for 11 Corporations and they are responsible for health and hygiene, behavior change promotion and facilitating community risk pooling mechanism in their coverage area.

17.24 Tamil Nadu Accident and Emergency Care Initiative (TAEI)

The Government is committed to reduce morbidity and mortality due to emergencies including trauma. The Tamil Nadu Accident and Emergency Care Initiative (TAEI) program is being implemented with the aim of strengthening Emergency Care System in the State since 2017. Six major medical emergencies are being covered under this program.



Aim:

To establish a sustainable model of Emergency Care System

Objectives:

- To reduce the trauma morbidity and mortality by half by the year 2023.
- To reduce the cerebro-vascular accident morbidity and mortality by 33% by the year 2023.
- To reduce the myocardial infarction related morbidity and mortality by 33% by the year 2023.
- To reduce Burn Injury related morbidity and mortality by 33% by the year 2023.
- To reduce the self harm and poison related morbidity and mortality by 66% by the year 2023.
- To reduce the paediatric emergencies related morbidity and mortality by half by the year 2023.

Key Concepts of TAEI:

TAEI introduced a few key concepts and paradigm shifts in patient care in Tamil Nadu Emergency Care System. Existing casualty room converted as Emergency Department(ED). The

following are components of Emergency Department:

- Emergency Room(ER) including bed side lab services and radiological services
- Hybrid High Dependency Unit(HHDU)
- Emergency Operation Theatre(EOT)
- Counselling and Rehabilitation room

Activities during the year 2019-20:

- Emergency ambulance service strengthened with additional 60 advanced life support [Adult Retrieval Vehicle (ARV)] vehicles.
- Paediatric Resuscitation and Emergency Management (PREM) units were established at 10 Government. Medical College Hospitals.
- The Emergency Room(ER) and Hybrid High dependency Unit (HHDU) is being strengthened with civil modification and equipment in 32 secondary care TAEI facilities under Director of Medical and Rural Health services (DMRHS).
- 41 out of 80 TAEI Centers have been strengthened with 542 additional health

personnel to improve quality of emergency care to the patients.

- The Government. Taluk Hospital, Ambur and Government. Taluk Hospital, Papanasam strengthened with Emergency Room (ER) equipment.
- Transport ventilators to be installed at 12 Medical College Hospitals.
- Lab services within the ER have been strengthened with Point of Care Testing (POCT) equipment.
- New Cath labs have been installed at Dharmapuri, Kanyakumari, Pudukotai, Theni, Thoothukudi and Villupuram Medical College Hospitals under the TAEI MI program.
- The Rajiv Gandhi Government General Hospital strengthened with a Portable CT.
- Twenty Government. Medical College Hospitals strengthened with additional C-arm equipment.

- Existing Centre of Excellence for Burn care at Government. Kilpauk Medical Hospital strengthened with additional building and equipment.
- Hot line services installed at 55 TAEI secondary care facilities under DMRHS.
- Following training sessions conducted at 5 Regional Training Centers (RTC) during 2019-20 period:
 - Five day TAEI TSG training has been conducted for 632 doctors and 1005 staff nurses.
 - One day paediatric emergencies management course conducted for 228 doctors and 262 staff nurses.
 - 2 days Paediatric Advanced Life Support (PALS) Training conducted for 606 doctors and 735 staff nurses.
 - One day training for stroke management completed for 129 doctors, 47 staff nurses and 25 CT technicians.

- One day training for heart attack management completed for 69 doctors, 110 staff nurses and 3 cath lab Technicians.

Achievements of TAEI in 2019-20:

- **Response Time Reduction of Emergency Ambulances:**

Due to Dynamic allocation of ambulances, the response time in the rural area is 16.81 minutes in 2019 and there has been a significant reduction in response time in the urban area from 13.48 min in 2018 to 12.70 min in 2019. The response time in the metro has decreased further from 8.36 min in 2018 to 7.53 minutes in 2019.

- **Reduction of Road Traffic Accident(RTA) deaths:**

To achieve SDG goals by 2030 and to meet out state target of reducing trauma related morbidity and mortality by half by 2023, the state is working meticulously and has reduced the number of Road Traffic Accident deaths from 16157 in 2017 to 9797 in 2019(Jan-Nov'2019).

17.25 Essential Diagnostics Services System (EDSS):

The Government of Tamil Nadu has started a new initiative of Essential Diagnostics Services System (EDSS) in the year 2019-2020 with a cumulative budget of Rs. 273.14 Crores covering a period of 3 years. This programme is implemented with an intention to reduce the out of pocket expenditure of patients(OOPE)and to make all diagnostic services available at the grass root. To achieve this goal, it has been decided to strengthen the Labs in Government health facilities and to connect them through a Hub and Spoke mechanism.

A pilot project was run in Tiruvallur district with Government. Stanley Medical College Hospital as Hub and 11 Sub district hospitals and Tiruvallur District Head Quarters Hospital as Spokes. Samples are transported in Hub and Spoke model through messengers. Around 3500 samples have been transported through Hub and Spoke Model in the Pilot District till date.

Based on the success model of the pilot, it has been planned to upscale this programme to all the districts this year.

17.26 DNB Programme in District Hospitals:

To improve the services in secondary care hospitals and to bridge the gap between primary care services and tertiary care, DNB courses were initiated in the District Head Quarters Hospital funded by NHM. 40 accredited DNB seats were approved in 10 Secondary Care hospitals and 2 Medical college hospitals. Tamil Nadu is one among the 2 states which got accredited with 5 Emergency Medicine seats in Government Pudukottai Medical College Hospital, Government Omandhurar Medical College Hospital and Government Headquarters Hospital, Erode. To expand DNB - Emergency Medicine to other District Head Quarters Hospitals, 13 District Head Quarters Hospitals are in the process of getting accreditation with National Board of Examination, which will indirectly help in getting trained emergency medicine consultants for Trauma Accident and Emergency Department.

17.27 Health Management Information System (HMIS)

The use of Information and Communication Technology (ICT) in health service delivery will

improve the quality of health care services provided to the patients at the Government health facilities. The Government of Tamil Nadu implemented Health Management Information system (HMIS) in the Government health facilities since 2008 in phases. The existing HMIS has three components;

1) **Hospital Management System (HMS):**

This is used to help in the day to day hospital Functions in 312 Hospitals (263 Secondary Care Hospitals + 49 Tertiary Care Hospitals including MCH, associated Hospitals and Dispensaries). The software helps in registration of patients, prescription of drugs, distribution of diet and other ancillary hospital functions. This is one of the largest medical databases in the world.

2) **Management Information System (MIS):**

This is used for monitoring and administrative purposes in 2285 Primary Health Centres (1807 Rural PHCs and 478 Urban PHCs) and in 309 Secondary Care hospitals (31 Head Quarters Hospitals + 204 Taluk Hospitals + 67 Non Taluk Hospitals) and in 49 Tertiary

Care Hospitals including 23 MCH, 22 associated Hospitals and 4 Dispensaries

3) College Management System (CMS) and University automation system (UAS):

This is used by various medical colleges and The Tamil Nadu Dr MGR Medical University for admission, allocation of registration number, hall ticket, mark sheet preparation, publication of results, award of certificates to allotment of seat in Convocation Hall for all students under the University automation system.

17.28 New initiatives

- 1) **Online Family Register:** demographic profile, family profile, individual member health profile will be created and stored in secured environment using technology like block chain. Data will be made available to health applications through establishing an Open Neutral Shared IT Infrastructure. Based on the unique identifier the operational storage space may be designated as 'Digital Health Wallet' with 'Digital Signature' to build trust among the beneficiaries ensuring privacy and confidentiality.

- 2) **Enhancing Telemedicine:** Beneficiaries can be connected to health staff, doctors and specialist through a communication system to have consultation and receive drugs in the local health facility. All additional PHCs and Urban PHCs in the State will be established as “Telemedicine Spoke” Units. All Medical colleges will be established as “Telemedicine Hub” Units. This will also be supported with WhatsApp based application and Interactive voice response systems (IVRS) based helpline for scheduling the consultation.
- 3) **Health Information Systems Standards:** The State will develop a set of standards for applications, data exchange, data security, IT systems evaluation to transform experiential learning in HMIS implementation into a robust Health IT architecture. This will help the state to retain the historical data and enable to upgrade the applications time to time.
- 4) **Developing a Unified Data Exchange Platform:** IT Stack in compliance with Health Information Systems Standards will enable the health programmes to integrate.

Convergence of health and related programmes will lay the road map for convergence of Health Information Systems.

- 5) **IT Systems Approach:** Implement HMIS by providing new hardware and minimum assured internet connectivity in all Government health facilities and administrative units of all directorates. Provide adequate hands-on training to health staff to use the applications.

17.29 Tamil Nadu Blindness Control Society

In our State, the activities of NPCB are implemented by the Tamil Nadu State Blindness Control Society and 32 District Blindness Control Societies since 01.04.2019. They are functioning as a vertical programme under National Health Mission Tamil Nadu.

23 Government Medical College Hospitals, 32 District Head Quarters Hospitals, 50 Sub District Hospital and 61 NGO Eye Hospitals together have performed 2,33,411 cataract operations with IOL implantation under this programme. 19 eye banks have collected 8,360 eye balls and 40% of them have been utilized

for corneal transplantation surgeries. 27,88,302 school going children were screened for refractive errors and free spectacles were provided to 1,11,417 children.

Screening to detect congenital anomalies in all new born children and screening all preterm low birth weight infants for ROP is done routinely. For this we have provided dedicated neonatal portable fundus cameras (RETCAM) to seven Government Medical College Hospitals (Regional Institute of Ophthalmology and Government Ophthalmic Hospital Chennai, Government. Tiruvannamalai Medical College Hospital, Government. Thanjavur Medical College Hospital, Government Coimbatore Medical College Hospital, Government Mohan Kumaramangalam Medical College Hospital Salem, Government Rajaji Hospital Madurai, Government Tirunelveli Medical College Hospital) at a cost of about Rs.126 lakh through TNMSC.

For Glaucoma, Diabetic Retinopathy, Squint Management; in-service training is provided at NGO eye Hospitals Aravind Eye Care System, Sri Kanchi kamakotti Medical Trust hospitals, Sankara Nethralaya and others to

ophthalmologists under NPCB. For screening patients for Diabetic Retinopathy; 27 Portable fundus cameras have been supplied to four districts (Salem, Vellore, Cuddalore, Tirunelveli) at a cost of about Rs.300 lakh through TNMSC. Teleophthal network and one Tele V Care centre per district were established at a cost of 567 lakh.

Ophthalmic equipment to various Government Medical College Hospitals and Government. Hospitals has been supplied through TNMSC at a cost of Rs.1120 lakh. Under the Chief Ministers Comprehensive Health Insurance Scheme 8039 patients have been benefited from Government hospitals and Private hospitals to the tune of Rs 869 lakh. Eye operation theatre and Post operative wards are constructed at a cost of Rs.525 lakh. At Virudhachalam, Vaniyambadi, Krishnagiri, Kanyakumari, Tirunelveli and Cuddalore Government. Hospitals. New eye operation theatre and post operative wards at a cost of Rs.180 lakh is under construction at Tiruppur, Palani and Tiruchendur Government hospitals.

During the current year, a centre of excellence in Ophthalmology at Regional Institute of Ophthalmology and Government Ophthalmic Hospital, Chennai for Rs.65.60 crore and a Regional Eye Care Centre at Thanjavur for Rs.16.47 crore has been sanctioned. Awareness programme about Eye donation, Diabetic retinopathy Congenital Cataract, Glaucoma, Vitamin A deficiency by creating IEC materials, conducting exhibition, Public Rally, Competition among peer groups and CME programmes for Doctors, Para Medical Ophthalmic Assistants and public are being conducted.

This year we are making arrangements to provide free spectacles to all individuals including school children to old people and provide 3 mobile ophthalmic screening units for Tiruvallur, Ramanathapuram and Salem districts. Along with these we have also made arrangements to provide new Eye operation theatre and Post Operative wards for Tenkasi, Kancheepuram, Sirkali, Virudhunagar and Cheyyar Government Hospitals and Ophthalmic equipment to Government Hospitals for Rs.95 lakh through TNMSC.

Chapter - 18

CHIEF MINISTER'S COMPREHENSIVE HEALTH INSURANCE SCHEME

18.1 Government of Tamil Nadu with the objective of providing health services to every citizen at their preferred health facilities implementing the Chief Minister's Comprehensive Health Insurance Scheme (CMCHIS) since 11.01.2012. The scheme covers 1.58 crore families whose annual income is less than Rs.72,000/-. In view of the enormous public benefit due to the successful implementation of the scheme for five years, the scheme was continued further for five years starting from 11.01.2017. The Government of Tamil Nadu has integrated the Government of India's Pradhan Mantri Jan Arogya Yojana (PMJAY) along with CMCHIS in the State from 23.09.2018.

18.2 The salient features of CMCHIS being continued from 11.1.2017 are as follows:-

- ❖ Sum insured – All the beneficiary families get health coverage upto Rs.5.00 lakh per year / per family.

- ❖ Procedures: After integration with PMJAY totally 1,450 medical and surgical treatment procedures (including 154 specialized procedures, 154 follow up procedures, 38 standalone diagnostic and 8 high end procedures).
- ❖ Migrant labourers certified by Labour Department who reside for more than six months in the State are included under the Scheme.
- ❖ Orphans as defined by the State Government are also covered under the scheme.
- ❖ CMCHIS health insurance card is used for claims processing and the same can be downloaded and printed from the CMCHIS website.
- ❖ The scheme mandates NABH entry – level accreditation / NQAS for all empaneled hospitals including the Government Hospitals.
- ❖ Minimal Electronic Health Record are available for beneficiaries from website.
- ❖ At present, 1008 hospitals (258 Government Hospitals and 750 private

Hospitals) are empanelled under the scheme.

18.3 Grievance Redressal:

There is a well established grievance redressal mechanism, including online tracking and SMS acknowledgement. Public can also contact 24 X 7 toll free No.1800 425 3993 for any details of the scheme and to register the complaints. A State and District Monitoring and Grievance Committee are available to redress grievances.

18.4 Performance:

Since 11.01.2012 to 10.02.2020, 41.88 Lakh beneficiaries have availed of treatment worth Rs.6,690.53 crores. Of these 19.20 lakh patients got treated in Government hospitals at a cost of Rs.2,509.54 crores(including diagnostic procedures).

18.5 Specialty wise authorization issued for surgery are given in the table below:

Specialty wise authorization issued (11.01.2012
to 10.02.2020)

| Sl. No. | Speciality | No. of claims | Amount Rs. in crores. |
|----------------|---|----------------------|------------------------------|
| 1 | KIDNEY DISEASE - DIALYSIS | 6,75,944 | 540.44 |
| 2 | CARDIAC STENT FOR HEART ATTACK | 77,890 | 523.71 |
| 3 | CARDIAC BY PASS SURGERIES | 37,915 | 357.50 |
| 4 | CARDIAC VALVE REPLACEMENT SURGERIES | 27,656 | 295.72 |
| 5 | CANCER - RADIOTHERAPY | 1,28,410 | 295.55 |
| 6 | KNEE REPLACEMENT | 43,807 | 286.41 |
| 7 | CONGENITAL CARDIAC DISEASE | 30,880 | 240.06 |
| 8 | FRACTURES | 1,24,653 | 225.93 |
| 9 | KIDNEY STONE SURGERY | 1,20,163 | 222.88 |
| 10 | CANCER - CHEMOTHERAPY | 4,24,317 | 206.43 |
| 11 | NEW BORN DISEASES | 1,44,501 | 200.92 |
| 12 | SPINAL SURGERY | 50,193 | 170.41 |
| 13 | HEART ATTACK MEDICAL MANAGEMENT | 69,065 | 163.70 |

| | | | |
|----|-------------------------------------|----------|--------|
| 14 | CANCER | 46,832 | 145.28 |
| 15 | HIP REPLACEMENT | 15,461 | 112.84 |
| 16 | EYE SURGERY LIKE RETINAL SURGERY | 76,071 | 109.31 |
| 17 | HYSTERECTOMY | 64,938 | 103.49 |
| 18 | VASCULAR SURGERY | 41,488 | 103.30 |
| 19 | HEARING AID | 1,24,525 | 99.94 |
| 20 | GIT - SURGERY | 38,441 | 94.44 |
| 21 | PLASTIC SURGERY | 46,796 | 90.02 |
| 22 | CARDIAC ARRHYTHMIAS MANAGEMENT | 10,579 | 73.52 |
| 23 | NEUROSURGERY | 15,957 | 67.92 |
| 24 | COCHLEAR IMPLANT SURGERY | 3,926 | 65.80 |
| 25 | STROKE MANAGEMENT | 36,193 | 64.20 |
| 26 | PROSTATE SURGERY | 26,693 | 59.42 |
| 27 | HYSTERECTOMY FOR CANCER | 18,950 | 45.75 |
| 28 | RENAL TRANSPLANTATION | 2,853 | 44.62 |
| 29 | GYNAEC SURGERY | 18,859 | 43.50 |
| 30 | INTERVENTIONAL RADIOLOGY | 8,218 | 41.88 |
| 31 | BREAST CANCER | 20,312 | 40.21 |
| 32 | BLOOD CANCER | 47,370 | 38.80 |
| 33 | BURNS | 14,102 | 34.79 |

| | | | |
|----|--|--------|-------|
| 34 | LAVH | 19,248 | 28.34 |
| 35 | BRAIN TUMORS | 4,632 | 26.32 |
| 36 | GIT | 9,535 | 25.41 |
| 37 | THYROID SURGERY | 11,713 | 24.35 |
| 38 | EYE SURGERY-ADULT GLAUCOMA | 15,447 | 18.13 |
| 39 | PAEDIATRIC CONGENITAL MALFORMATIONS | 4,663 | 15.10 |
| 40 | BONE MARROW / STEM CELL TRANSPLANTATION | 764 | 13.58 |
| 41 | CANCER SURGERY | 4,848 | 10.54 |
| 42 | EYE SURGERY-DIABETIC | 19,505 | 9.07 |
| 43 | DENGUE SHOCK SYNDROME | 7,456 | 9.06 |
| 44 | PMR (PHYSICAL MEDICINE REHABILITATION) | 1,444 | 8.70 |
| 45 | EYE SURGERY- PAEDIATRIC CATARACT | 4,942 | 7.59 |
| 46 | EPILEPSY SURGERY | 675 | 6.84 |
| 47 | LIVER TRANSPLANTATION | 268 | 4.83 |
| 48 | SQUINT SURGERIES | 3,190 | 3.66 |
| 49 | BARIATRIC SURGERY | 153 | 2.64 |
| 50 | HYSTERECTOMY - PREGNANCY RELATED | 974 | 2.28 |

| | | | |
|----|-------------------------------------|-----------|---------|
| 51 | THALASSEMIA CHELATION THERAPY | 4,442 | 2.11 |
| 52 | HEART and LUNG TRANSPLANTATION | 74 | 1.47 |
| 53 | STEM CELL TRANSPLANTATION | 64 | 0.89 |
| 54 | EYE SURGERY- PAEDIATRIC GLAUCOMA | 159 | 0.23 |
| 55 | OTHERS | 6,35,275 | 979.44 |
| | GRAND TOTAL | 33,83,429 | 6409.24 |

18.6 A corpus fund has been created by Government to meet out high cost procedures like Liver Transplantation, Renal Transplantation, Heart and Lung transplantation including post transplantation Immunosuppressant Therapy, Bone Marrow Transplantation, Cochlear Implantation, Auditory Brain Stem Implantation and Stem Cell Transplantation. All the beneficiaries for such high-end procedures are approved by an Expert Committee.

18.7 So far, 8,847 beneficiaries (as on 10.02.2020) have been approved for these high end surgeries from the Corpus Fund as per the following details:

| Sl. No | Nature of Surgical procedure | Number of beneficiaries authorized | Amount in Rs. |
|---------------|-------------------------------------|---|----------------------|
| 1 | Liver Transplantation | 615 | 130,61,00,000 |
| 2 | Renal Transplantation | 2,886 | 112,17,85,860 |
| 3 | Cochlear Implantation | 4,177 | 303,61,71,800 |
| 4 | Bone Marrow Transplantation and | 1,024 | 96,02,93,732 |
| | Stem Cell Transplantation | | |
| 5 | Heart transplantation | 99 | 19,57,50,000 |
| 6 | Heart and Lung transplantation | 16 | 459,50,000 |
| 7 | Lung transplantation | 11 | 282,00,000 |
| 8 | Auditory Brain Stem Implantation | 19 | 346,58,280 |
| | Total | 8,847 | 672,89,09,672 |

18.8 Medical Camps and Special Medical Camps:

From January 2012 to January 2020, 46,135 health camps (Mega camps, hospital camps and special health camps) were conducted and about 66,28,252 persons were screened in both Government and private empanelled hospitals.

18.9 Integration of Pradhan Mantri Jan Arogya Yojana (PMAJAY) with the ongoing CMCHIS:

Under PMJAY, Government of India pays 60% of the premium for 77.81 lakh families based on Socio Economic and Caste Census (SECC) data.

Chapter - 19

108- Emergency Ambulance Services

19.1 “108” Ambulance Service is successfully being operated in Tamil Nadu on PPP mode through a single **Toll Free number** and the services are available **24x7 free** to the public. Every ambulance has one fully trained Emergency Medical Technician (EMT) who provides pre-hospital care to the patient.

19.2 Ambulance Deployment:

Based on the population density, accident prone areas, hilly terrain and remote areas in each District, 108 ambulances are deployed in all 37 districts across the State. At present, 941 ambulances are under operation providing Basic Life Support, Advanced Life Support and Neonatal care. Four wheel drive ambulances are deployed exclusively for difficult terrain and hilly areas. In addition 4 VVIP ambulances and 41 First Responder Bike Ambulances form part of the 108 System.

Fleet Strength :

| S.No. | Ambulance Type | Number of vehicles |
|--------------|-----------------------------|---------------------------|
| 1. | Basic Life Support (BLS) | 738 |
| 2. | Advance Life Support (ALS) | 62 |
| 3. | Neonatal Life Support (NLS) | 65 |
| 4. | Four Wheel Drive | 76 |
| 5. | Total Ambulance | 941 |
| 6. | Additional VVIP Convoy | 4 |
| 7. | First Responder Bike | 41 |

19.3 Categories of Medical Emergencies for the year (April 2019 to January 2020)

| Type of Emergencies | Percentage |
|----------------------------|-------------------|
| Pregnancy Related | 23.30 |
| Road traffic Accident | 16.28 |
| Acute abdominal pain | 7.84 |
| Cardiac Related | 5.54 |
| Respiratory | 4.30 |
| Poisoning | 4.23 |
| Injured in assault | 3.23 |
| Epilepsy | 2.38 |
| Neonatal | 1.99 |
| Suicides | 0.61 |
| Others | 30.38 |
| Total | 100.00 |

19.4 Highlights for the year 2019-2020(up to Jan'2020)

- 99,285 lives in very critical condition, were saved
- 54,595 Medical emergencies attended in tribal areas
- 22,167 Neonatal cases handled

19.5 Beneficiaries details and other details under this Service

| Parameters | 2016 - 2017 | 2017 - 2018 | 2018 - 2019 | 2019 - 2020 (up to Jan'20) |
|-----------------------------------|--------------------|--------------------|--------------------|-----------------------------------|
| Total Beneficiaries | 10,50,998 | 12,87,445 | 13,01,546 | 11,02,528 |
| Pregnant Mothers | 2,40,827 | 3,22,868 | 3,24,932 | 2,56,861 |
| RTA | 2,19,310 | 2,28,549 | 2,45,049 | 1,79,485 |
| Other Emergency | 5,90,861 | 7,36,028 | 7,31,565 | 6,66,182 |
| Tribal related | 45,103 | 64,457 | 62,562 | 54,595 |
| Total neo natal cases transported | 20,584 | 20,343 | 21,518 | 22,167 |
| Critical lives saved | 97,845 | 72,344 | 81,642 | 99,285 |

19.6 Neonatal Ambulances:

Launched in June, 2011 for the first time in the country, Neonatal Ambulances are exclusively available for handling emergencies of Neonates less than 28 days. Neonates requiring intensive care are transported from Primary / Secondary care hospitals to Tertiary care

hospitals with Neonatal Intensive Care units (NICU). These ambulances are equipped with life saving equipments like Transport Incubator, Syringe Pump, etc and specially trained Emergency Medical Technicians are deployed to provide care during transit. Over 22,167 babies have benefited through this specialty service for this year. Currently 65 ambulances are in operation throughout the State.

19.7 Emergency Care Centre (ECC)

Emergency Care Centres are established for stabilizing the critical cases during long distance transport, especially in highways. This enables the critical cases to receive timely medical intervention within the Golden Hour which also significantly reduces the mortality rate. ECC is a three bedded centre equipped with doctors and advanced paramedics available 24x7 and provided with emergency drugs and advanced life saving equipments like ventilator, defibrillator with multi Para monitor, etc. At present 6 Emergency Care Centres are established namely at Tambaram, Padiyanallur, Injambakkam, Mahabalipuram, Veppur and Sriperumbudur respectively.

19.8 Bike Ambulance (First Responder Bike) and Mobile medical kit:

Bike Ambulances have been launched on 08.02.2016. First Responder Bikes are provided with a comprehensive, portable medical kit which is easy to handle at scene. Emergency Medical Technician holding a valid driving license are engaged in this service. Till date 61,327 cases have benefited through this service. It is planned to extend this service to major metropolitan cities across the State.

19.9 104 -Health Help Line Service

This is a 24x7 service through which people can get health related advice, medical counselling and information about various Government Health Schemes.

Services provided are as follows:

- Doctors and Health Professionals provide medical advice and information related to health problems
- Pregnant woman are informed about the medical facilities available in the hospitals near to them.

- Information and feedback regarding Government schemes such as (CMCHIS) Chief Minister Comprehensive Health Insurance Scheme, Dr.Muthulakshmi Reddy Maternity Benefit Scheme are channeled through this service.
- Nutritional advice and periodic counseling for patients with suicidal tendency are also being provided.
- Public can also make complaints / suggestions about functioning of any Government Health facility in the State.
- Total beneficiaries: 1,503,124(Since Launch to Jan'2020)

19.10 102- Free drop back service (JSSK):

102-JSSK Scheme operated through Indian Red Cross Society provides 100% free drop back service to delivered mothers and treated sick infants from Government Hospitals to their home. Since launch 6,17,045 numbers of cases (Up to Jan' 2020) are transported through this service. 161 vehicles are functioning in this service.

19.11 155377-Free Hearse Service:

The corpse of the deceased are transported from Government Hospitals to the place of disposal or home free of cost irrespective of the distance within the State. This service also renders support during major accidents, natural calamities and disasters by transporting the deceased to the Government Hospitals for autopsy and then to their destination. For cases requiring transportation beyond 300 kms, Railways are used as mode of transport. So far 7,33,119 numbers of cases are transported through this service since launch. Currently 151 vehicles are functioning in this service. It is planned to increase the fleet strength to 180 in future.

Chapter-20

Communicable Diseases

20.1 Communicable disease have been posing a continuous challenge to mankind. Tamil Nadu is at the fore front in prevention, control and treatment of communicable diseases. Occurrence of infectious diseases are notified to the concerned local bodies and PHCs for organizing control measures. Cases from neighboring states are also notified through Integrated Disease Surveillance Programme(IDSP). State level, district level and block level rapid response teams are formed to organise control measures on war footing. Promotion of environmental sanitation, immunization and early identification and treatment of cases are the key strategies followed. Infectious diseases are mainly transmitted through water, food, air, fomites and vectors like mosquitoes. IDSP monitors the occurrence of communicable diseases on 24x7 basis.

20.2 Vaccine Preventable Diseases: Vaccine Preventable Diseases (VPDs) namely

Tuberculosis, Diphtheria, Pertussis, Hepatitis B, Haemophilus influenza B, Tetanus, Polio, Measles, Rubella, Rota virus and Japanese Encephalitis (in selected 13 endemic districts) are covered under the Universal Immunization Programme.

20.3 Immunization Programme: All pregnant women and their newborns need to be protected against Vaccine Preventable Diseases. Immunization Programme aims to reduce mortality and morbidity due to Vaccine Preventable Diseases (VPDs), particularly for children. Tamil Nadu started the immunization programme against six vaccine preventable diseases in 1978. In order to strengthen the programme further Universal Immunization Programme was launched in 1985. Annually, around 10.44 lakhs pregnant women and 9.53 lakhs infants are being covered under this programme. Pregnant mothers are immunized every year with Tetanus Diphtheria injection for prevention of tetanus infection during delivery. The State has consistently reported coverage of over 95%. The coverage with respect to BCG, Oral Polio Vaccine, Pentavalent, and Measles

Rubella are respectively 97%, 100%, 100% and 99.5% for the year 2019-20 (Upto February 2020). Because of this consistent immunization for more than three decades, vaccine preventable diseases like neo-natal and maternal tetanus, whooping cough have disappeared from the State. Polio free status is maintained for the past sixteen years. The incidence of Pertussis, Tetanus are almost nil and there is significant reduction in Diphtheria and Measles cases.

20.4 Pulse Polio Immunization (PPI)

For the eradication of poliomyelitis, Pulse Polio Immunization campaign was introduced in the year 1995-96 along with routine immunization. The above strategy had successfully eliminated the dreaded disease and the State had attained a polio free status for the past 15 years. World Health Organisation certified the eradication of Polio virus-type 2 in 2015 signifying a great leap in eradication of poliomyelitis. Consequently instead of trivalent OPV the State has introduced successfully bivalent OPV from 25th April 2015 onwards. In addition, injectable polio vaccine is added in the

immunization schedule. Now, World Health Organisation certified the eradication of Polio virus-type 3 in October 2019. India celebrated Pulse Polio Silver Jubilee year on 31-10-2019. During 2020, one round of pulse polio immunization campaign completed on 19.01.2020.

20.5 Japanese Encephalitis Vaccination

Japanese Encephalitis (JE) vaccination programme is being implemented in 13 identified endemic districts namely Cuddalore, Villupuram, Virudhunagar, Madurai, Tiruvarur, Tiruchirapalli, Perambalur, Ariyalur, Thanjavur, Tiruvannamalai, Pudukottai, Karur and Thiruvallur to prevent Japanese Encephalitis under the age group of 2 years (two doses of JE vaccine is given at the age of 9-12 months and 16-24 months).

20.6 Special Mission Indradhanush

The Ministry of Health and Family Welfare (MoHFW) Government of India (GoI), launched Mission Indradhanush in December 2014 as a special drive to vaccinate all unvaccinated and partially vaccinated pregnant mothers and

children below 2 years of age under Universal Immunization Programme. The Mission focuses on interventions to improve full immunization coverage for children from 65% to 90% by 2020. Under Mission Indradhanush programme, so far, 6 phases have been completed.

Intensified Mission Indradhanush 2.0 implemented in two aspirational districts of Virudhunagar and Ramanathapuram (4 Health Unit Districts namely Virudhunagar, Sivakasi, Ramanathapuram and Paramakudi) with 4 rounds from December 2019 to March 2020. All the four rounds were completed.

20.7 Measles-Rubella vaccine

As per the National Technical Advisory Group on Immunization (NTAGI) recommendation, with an objective to eliminate Measles and Rubella, a massive vaccination campaign was conducted in Tamil Nadu from 6th February to 31st May 2017 and 1.7 crore children in the age group of 9 months to 15 years were vaccinated with Measles-Rubella vaccine and simultaneous switch from Measles to Measles Rubella vaccine in the National Immunization Schedule.

20.8 Rota Virus vaccine

The Government of Tamil Nadu launched Rota virus vaccine. Hon'ble Chief Minister inaugurated Rota virus vaccination programme on 17-9-2017 at Salem. Rota virus vaccine is administered in Routine Immunization as 5 drops orally for infants at 6, 10 and 14 weeks of age along with Pentavalent and Oral Polio Vaccine.

20.9 National Vector Borne Disease Control Programme

At present the State is implementing multi-various initiatives in vector control through the Directorate of Public Health and Preventive Medicine and also the local bodies. The National Vector Borne Disease Control Programme supports these initiatives as part of the National Health Mission.

20.10 Dengue

Dengue Fever (DF), an outbreak prone viral disease is transmitted by Aedes mosquitoes. Dengue Fever is characterized by fever, headache, muscle and joint pains, rash, nausea and vomiting. Some infection

results in Dengue Haemorrhagic Fever (DHF) - a syndrome that in its severe form can threaten the patient's life primarily through increased vascular permeability and shock. Dengue Fever and Dengue Haemorrhagic Fever are caused by the four dengue viruses DEN 1, 2, 3 and 4, which are closely related antigenically. Infection with one serotype provides lifelong immunity to that virus but not to the others. Though Tamil Nadu has been able to keep Dengue under control, currently it is reported in more than 100 countries and is almost all the States in India. In Tamil Nadu, the Government of India has identified 30 Sentinel Surveillance Hospitals including Medical College Hospitals, Zonal Entomological Teams, Institute of Vector Control and Zoonoses, Hosur, and District Headquarters Hospitals, Cuddalore and Ramanathapuram and one apex laboratory at King Institute of Preventive Medicine and Research, Guindy for diagnosis of Dengue and Chikungunya. This facility has also been extended to other Headquarters Hospitals by the Government and at present we have 125

ELISA testing centres. The Public Health department in coordination with the local bodies and other departments deploy temporary mazdoors regularly to undertake elimination of vector control activities ,like source reduction of artificial containers such as broken utensils, discarded tyres, plastic waste cups and broken bottles which are critical for the control of Aedes mosquitoes and spread of dengue fever. Further fogging operation is also carried out.

As a unique method in the country, Tamil Nadu is detecting Dengue antigen in Aedes mosquitoes caught from different areas. Based on the results, control measures are initiated in positive areas as an early warning signal.

| S.No | Year | No. of Cases | No. of Deaths |
|-------------|----------------------|---------------------|----------------------|
| 1 | 2015 | 4,535 | 12 |
| 2 | 2016 | 2,531 | 5 |
| 3 | 2017 | 23,294 | 65 |
| 4 | 2018 | 4,486 | 13 |
| 5 | 2019 | 8,527 | 5 |
| 6 | 2020 (11.03.2020) | 1,425 | 0 |

20.11 Chikungunya

Chikungunya is caused by a virus and transmitted to humans by *Aedes* mosquitoes. There is a decline in Chikungunya cases due to the control measures taken by the Government. The prevention and control measures against Chikungunya are carried out in an integrated manner with the Dengue control measures.

| S.No | Year | No. of Cases |
|-------------|------------------|---------------------|
| 1 | 2015 | 329 |
| 2 | 2016 | 86 |
| 3 | 2017 | 131 |
| 4 | 2018 | 284 |
| 5 | 2019 | 623 |
| 6 | 2020(11.03.2020) | 157 |

20.12 Malaria

Malaria is caused by parasites known as *Plasmodium vivax* (*P.vivax*), *Plasmodium falciparum* (*P.falciparum*), *Plasmodium malariae* (*P.malariae*) and *Plasmodium ovale* (*P.ovale*). It is transmitted by the infective bite of *Anopheles* mosquito. Man develops disease after 10 to 14 days of being bitten by an infective mosquito.

Inside the human host, the parasite undergoes a series of changes as part of its life cycle. The parasite completes its life cycle in liver cells and red blood cells. The two types of parasites of human malaria, *P. vivax*, and *P. falciparum*, are commonly reported from India. Infection with *P.falciparum* is complicated form of malaria.

The National Malaria Control Programme (NMCP) was implemented in the State during 1953 and the programme has expanded in the following years and now India is in the process of Malaria elimination by 2016 - 2030. In continuation of Malaria elimination activity a total of 5,53,374 LLIN (Long Lasting insecticide Impregnated Mosquito Net) have been received from Central Government for distributing the same to the people living in Malaria endemic areas.

Though the number of cases has shown a steady decline, still it is reported in few urban and rural areas in Tamil Nadu viz., Chennai, Ramanathapuram, and Kanniyakumari districts. Two rounds of indoor residual spray are being carried out during June and September of every

year in malaria endemic villages to prevent malaria transmission due to monsoon.

Last year 2,049 Malaria positive cases were recorded in the State. In the current year 91 malaria cases have been reported till 11.03.2020. The vector control initiatives are now taken up by the local bodies in a comprehensive manner and are not limited to Dengue specific mosquito control.

| S.No | Year | No. of Cases | No. of Death |
|-------------|------------------|---------------------|---------------------|
| 1 | 2015 | 5,587 | 0 |
| 2 | 2016 | 4,341 | 0 |
| 3 | 2017 | 5,444 | 0 |
| 4 | 2018 | 3,787 | 0 |
| 5 | 2019 | 2,049 | 0 |
| 6 | 2020(11.03.2020) | 91 | 0 |

20.13 Filaria

The National Filarial Control Programme is under implementation in the State from 1957 with current control activities being carried out in 43 urban areas. 25 control units and 44 night clinics are presently functioning.

Mass Drug Administration(MDA) programme with Diethyl Carbamazine Citrate (DEC) tablet started in 1996 in Cuddalore District as a pilot project and it was carried out from 1997-1998 in all endemic districts. MDA was completed in all Filaria endemic districts in 2014.

Since most of the Filaria endemic districts have reported less than 1% Micro Filaria Rate, two rounds of Transmission Assessment Survey had been conducted using Filaria antigen test strips in 20 districts, as per the World Health Organisation(WHO) guidelines.

Post MDA surveillance is being conducted every year in these districts after Mass Drug Administration. Migratory population screening Entomological survey, Parasitological survey for children in the age group of 5-9 years, Hydrocelectomy, Enumeration of Lymphatic Filaria cases, Morbidity Management training are carried out. The Filaria Lymphoedema cases are given the Morbidity Management Kit containing soap, mug, basin, towel, soap box medicine and ointments.

Government is providing financial

assistance of Rs.1,000/- per month to the Grade IV Filaria patients. 8,023 patients have been benefitted by this scheme for which Government has allotted Rs.9.62 crore.

20.14 Multi-Dimensional approach to mosquito borne diseases control

- Release of short films and advertisements educating the masses of their role in preventing mosquito breeding. Ensuring sustained Information, Education and Communication (IEC) campaign to educate the masses of their role in preventing mosquito larval breeding and making people aware on the steps taken by the Government to counter the communicable diseases.
- Ensuring that the facilities for effective treatment of diseases are easily available at the nearest health facilities and providing adequate and easy access to diagnosis and treatment facilities such as Elisa test centres, cell counters, medicines, blood and blood components.
- Organizing entomological surveillance, employing adequate manpower both in

local bodies and on the public health side for identifying and eradicating sources of breeding by providing adequate equipments and larvicides for vector control.

- Sending rapid response teams and medical teams to the areas reporting higher incidence of fever and creation of special fever wards.
- Conducting fever camps.
- Putting in place 10 persons per block under the Health Department, 20 persons per block through the Rural Development Department, 10 additional labourers in Town Panchayats and 1 per 250 houses in Municipalities and Corporations for identifying and eliminating sources of breeding.
- Providing adequate equipment for vector control.
- Action against quacks and over the counter sale of medicines without prescriptions.
- Making available traditional Indian Medicines such as Nila Vembu, Malai

Vembu and Papaya leaf juice and promoting natural healing.

- Taking multi-pronged multi departmental actions in identified hot spots.

The District Collectors take continuous action to review and control these vector borne diseases at the field level.

20.15 Coordination with neighboring States

Inter-state meetings in border districts, sharing of information on the occurrence of cases and organizing control measures.

20.16 Japanese Encephalitis

Japanese Encephalitis (JE) over the years has emerged as one of the major public health problems in the country due to its complex eco-epidemiology. Japanese Encephalitis (JE) is a mosquito borne zoonotic viral disease. The virus is maintained in animals, birds, pigs, particularly the birds belonging to family Ardeidae (e.g. Cattle egrets, pond herons, etc.) which act as the natural hosts. Pigs and wild birds are reservoirs of infection and are called as amplifier hosts in the transmission cycle.

The virus does not cause any disease among its natural hosts and transmission continues through mosquitoes primarily belonging to *Culex vishnui* sub group mosquitoes.

Vector mosquito is able to transmit JE virus to a healthy person after biting an infected host with an incubation period ranging from 5 to 14 days. In Tamil Nadu, 13 Revenue Districts are considered as to Endemic Districts which include Perambalur, Ariyalur, Villupuram, Cuddalore, Tiruvannamalai, Virudhunagar, Tiruchirapalli, Thanjavur, Tiruvarur, Madurai, Pudukottai, Karur and Thiruvallur districts. After completion of JE immunization in campaign mode in all the above districts for the children 1-15 years of age, JE vaccination has now been brought under routine immunization. First dose of JE vaccine is administered after ninth months and second dose is administered between 16-24 months. JE vector monitoring is being carried out regularly in the endemic districts. JE vector mosquito pools are collected in the area and subjected for Antigen Detection and mapping of JE virus positive areas is carried out. Fogging

operation is being carried out in villages where suspected JE cases are reported.

Acute Encephalitis Syndrome (AES) Surveillance is being carried out in District Headquarters Hospitals, Medical College Hospitals and major private hospitals.

Following are the list of Sentinel Surveillance Hospitals where samples of suspected JE cases are referred for testing:

- King Institute of Preventive Medicine and Research, Guindy
- KAP Viswanatham Government Medical College, Tiruchirapalli
- Government Villupuram Medical College, Villupuram
- Government Thanjavur Medical College, Thanjavur
- Government Madurai Medical College, Madurai
- Government Tirunelveli Medical College, Tirunelveli
- Government Coimbatore Medical College, Coimbatore

The positive cases requiring tertiary care are referred to Government Medical College Hospitals with Paediatric Intensive Care Unit (PICU) where the cases are treated. Currently, the disease in the State is under control. However vaccination and disease surveillance protocols prescribed for these diseases are being followed carefully.

| S.No | Year | No. of Cases | No. of Death |
|-------------|------------------|---------------------|---------------------|
| 1 | 2015 | 53 | 0 |
| 2 | 2016 | 51 | 0 |
| 3 | 2017 | 127 | 0 |
| 4 | 2018 | 147 | 0 |
| 5 | 2019 | 201 | 1 |
| 6 | 2020(11.03.2020) | 50 | 0 |

20.17 Leptospirosis

Leptospirosis is primarily a disease of animals, occasionally infecting humans. Heavy rainfall leaves a lot of surplus water and the water logged areas are contaminated by Leptospirosis organism via urine of rodent. The farmers and agricultural labourers working in

the contaminated water logged fields acquire the infection. So it is called as occupational disease. Leptospirosis is one of the Zoonotic diseases which require timely diagnosis, treatment and control measures. A State Level Reference Laboratory is functioning at State Headquarters to provide laboratory confirmation and training. Leptospirosis testing facilities are also available in all District Public Health Laboratories and TANUVAS (Tamil Nadu Veterinary and Animal Sciences University), Madavaram, Chennai. The preventive measure for Leptospirosis is to create awareness about the diseases, mode of transmission and its prevention. A total of 849 cases were recorded during 2019 and in the current year, only 141 cases are reported (upto 11.03.2020)

| S. No. | Year | No. of Cases | No. of Death |
|---------------|----------------------|---------------------|---------------------|
| 1 | 2015 | 1,284 | 0 |
| 2 | 2016 | 1,216 | 0 |
| 3 | 2017 | 1,080 | 1 |
| 4 | 2018 | 693 | 2 |
| 5 | 2019 | 849 | 0 |
| 6 | 2020 (11.03.2020) | 141 | 0 |

20.18 A H1N1 Disease (Swine Flu)

Swine Flu is one of the types of Influenza fever. While the WHO has downgraded its pandemic alert and declared this as a seasonal Influenza, the State always has not reduced the alert. Apart from awareness and focus on hand washing, the Public Health Department has stocked adequate stocks of capsule Oseltamivir and also annually procures adequate doses of vaccines for the health workers. Focus is on contact tracing and treatment and special focus on the high risk groups especially pregnant women, children and people with diabetes and chronic illnesses.

20.19 National Leprosy Eradication Programme

The National Leprosy Eradication Programme is a centrally sponsored health scheme of the Ministry of Health and Family Welfare, Government of India. While the NLEP strategies and plans are formulated centrally, the programme is implemented by the State Government. The Programme is also supported

as partners by the World Health Organization, the International Federation of Anti-leprosy Associations and certain Non Governmental organizations.

Leprosy is a chronic infectious disease caused by *Mycobacterium leprae*. It usually affects the skin and peripheral nerves, but has a wide range of clinical manifestations. The disease is characterized by long incubation period generally 2 to 5 years and is classified as paucibacillary or multibacillary, depending on the bacillary load. Leprosy is a leading cause of permanent physical disability. Timely diagnosis and treatment of cases, before nerve damage has occurred, is the most effective way of preventing disability due to leprosy.

TREATMENT OF LEPROSY:

National Leprosy Eradication Programme was started in 1983. Initially, "Dapsone" was given as Monotherapy. Since dapsone has to be given for life long, Multi Drug Therapy (MDT) was introduced in 1983 which consists of Rifampicin, Clofazimine and Dapsone as per

recommendations of WHO to cure Leprosy in a shorter time and prevent Leprosy transmission in the community. Since then the services for leprosy patients gradually changed from institutional to outpatient care through health centres and field clinics. Gradually the infected and cured leprosy patients began to be accepted by the community as a result of intensive health education and visibly successful results of MDT.

20.20 MILESTONES IN NLEP:

| | |
|------|--|
| 1955 | National Leprosy Control Programme (NLCP) launched |
| 1983 | National Leprosy Eradication Programme launched |
| 1983 | Introduction of Multidrug therapy (MDT) in Phases |
| 1991 | States fully covered by MDT |
| 2005 | Elimination goal achieved (PR 1/10,000 pop) |
| 2017 | Sparsh Leprosy Awareness Campaign |
| 2018 | Sparsh Leprosy Awareness Campaign |

20.21 NEW INITIATIVES:

The prevalence rate of Leprosy in 1983 was 118/10,000 population. In 2005, the prevalence of leprosy declined to one per 10,000 population and the state achieved elimination status. Since the Leprosy prevalence rate and new case detection rate has been constant over the past 10 years, Government advised certain innovative activities to reduce the prevalence rate, incidence rate and deformity rate.

- LCDC - Leprosy Case Detection Campaign II in 18 districts was carried out and 815 new cases were detected.
- SLAC - Sparsh Leprosy Awareness Campaign 2020 (Anti-Leprosy Day) was conducted on 30th January 2020 on the occasion of death anniversary of Mahatma Gandhiji. In our State, 12,826 villages conducted Grama Sabha meetings and pledge taken. During Anti Leprosy fortnight (30th January to 13th February 2020), 476 new cases and 3 Grade II deformity cases were detected by various

mode of detection and all newly deducted cases put on treatment.

- Focused Leprosy Campaign for 86 Grade II cases was carried out and 7 new cases were detected.
- Post Exposure Prophylaxis – A single dose Rifampicin is given to all contacts (Family and neighbors) of newly detected Leprosy Patients - Given to 28,456 contacts from April 19 to February 2020.
- Contact survey for 3,355 new cases were conducted in their villages and urban and 186 new cases were detected.
- DPMR – Disability Prevention and Medical Rehabilitation.

| | |
|---|--------|
| Total No. Reconstructive Surgeries | 150 |
| Total No. Self care kits distributed | 15,954 |
| Total No. MCR foot wears given | 9,806 |
| No. of patients treated for Reaction and Neuritis | 290 |
| No. of Persons receiving monthly pension | 10,500 |

20.22 Epidemic control activities at the State and District level

The State level epidemic monitoring committee and the public health disease surveillance unit, look at the overall monitoring and the State level coordination issues with all departments and the stakeholders. At the district level, the Collectors are involved in ensuring the prevention of the public health challenges like outbreak of acute diarrheal diseases by taking effective steps such as – ensuring regular cleaning of water tanks, testing water samples, preventing sewage contamination and effective solid waste management practices etc. Sustained anti-larval measures, improving environmental sanitation and public hygiene in districts through effective coordination with the local bodies, other line departments and also involving the communities have been the cornerstone in the effective prevention and control strategy adopted by the State against communicable diseases.

The District Collector, being the Chairperson of the District Coordination

Committee to control epidemic diseases, holds regular reviews to ensure the prevention and control of these diseases at the field level in order to reduce the spread of communicable diseases and contain epidemic outbreak. The Epidemic control committee also oversees the prevention of other communicable diseases, waterborne diseases including diarrhoea, infective diseases such as Swine Flu and other forms of Influenza, rabies etc. All such diseases have been prevented and occasional cases of outbreak have been localized and treated completely to ensure that people's health is not put at risk.

20.23 Corona Virus Disease -2019 (COVID-19)

WHO has declared the recent COVID-19 epidemic affecting 25 countries as Public Health Emergency of International Concern (PHEIC) and a pandemic. Government of Tamil Nadu has strengthened the surveillance and control measures against the disease, as per the national guidelines. The passengers from all flights from China, Hong Kong, Thailand Singapore, Japan and South Korea are screened

universally through thermal screening at all International Airports and Seaports. All over India the screening is carried out in 22 airports. In Tamil Nadu, passengers are screened at the Airports of Chennai, Trichy, Madurai, and Coimbatore. In the background of the present COVID-19 epidemic, the general public are advised to adhere to health advisories issued by the Government. Public are requested to follow the cough etiquette by covering the face using handkerchief / towel while sneezing / coughing. Do frequent hand-washing with soap and water. All those who have arrived with travel history to China and COVID-19 spread countries should remain under strict home isolation or hospital isolation for 28 days from the date of arrival in India. Consequent to the situation arising out of spread of COVID-19 epidemic in the country, the Government have declared corona virus disease as a notified disease in the State of Tamil Nadu under the Tamil Nadu Public Health Act,1939.

20.24 Integrated Disease Surveillance Programme (IDSP)

Integrated Disease Surveillance Programme (IDSP) was launched as a Project with World Bank assistance in November, 2004 to detect and respond to disease outbreaks quickly. The project was further extended up to March, 2012. Currently, IDSP is implemented as a programme by NHM with Government of India support. The important achievements of IDSP are,

- Weekly disease surveillance data on epidemic prone communicable diseases are collected from reporting units such as Health Sub Centres (HSCs), Primary Health Centres (PHCs), Community Health Centres (CHCs), Hospitals including Government and Private Sector Hospitals and Medical Colleges. The data are collected on 'S' syndromic; 'P' probable and 'L' laboratory formats using standard case definitions. Presently, more than 90% districts report such weekly data through e-mail / portal (www.idsp.nic.in). The weekly data are analysed at State Surveillance Unit (SSU)

and District Surveillance Unit (DSU) for disease trends. Early Warning Signal (EWS) is generated whenever there is rising trend of illnesses or any clustering of cases from Government and Private Institutions. EWS is sent to the periphery for the early intervention and control of any eventual outbreak. The outbreaks are notified immediately to the Public Health System.

Surveillance of Epidemic prone Infectious Diseases Communicable Disease Surveillance Portal (CDSP)

- A Web based surveillance on epidemic prone infectious disease notification system in 12 corporations of Tamil Nadu (Communicable Disease Surveillance Portal - CDSP) was established in 2018. The objective of the project is to simplify and automate with near real time data collection on disease information and to give automated alerts and communicate the same for necessary public health action using Geographic Information System. This has the potential to be expanded to all the districts of Tamil Nadu.

- Government of India has planned to launch Integrated Health Information Platform replacing the IDSP program. The Integrated Health Information Platform (IHIP) is a web-enabled electronic information system that is embedded with all applicable Government of India's e-Governance standards, Information Technology (IT), data and meta data standards to provide State-of-the-Art single operating picture with geospatial information for managing disease outbreaks and related resources. The IHIP and CDSP will synergize and strengthen the dynamic disease surveillance in Tamil Nadu.

20.25 District Public Health Laboratories (DPHL) under IDSP

The DPHL are the backbone of the laboratory network in Integrated Disease Surveillance Program (IDSP) for the prevention and control of epidemic prone diseases. The laboratory has an important role in improving the quality of health by rendering appropriate diagnosis

thereby decreasing the morbidity and mortality in the community.

Role of the District Public Health Laboratory

- Establish a system of specimen collection, transportation and investigation to enable outbreaks in the district to be investigated and confirmed rapidly.
- Monitor any clustering of cases from laboratory data received from Government and Private Institutions to detect Early Warning Signals (EWS) of impending epidemics and provide information to the District Surveillance Unit (DSU) at the earliest.
- Implement the Bio-Medical Waste Management protocol in all the health institutions.
- Ensure Quality Assurance in laboratory services with Standard Operating Procedures (SOPs) and effective implementation of Internal and External Quality Assurance Scheme (EQAS).

- Training, technical support, supervision and monitoring of peripheral laboratories functioning in Primary Health Centres (PHCs) and Government Hospitals.
- Operation Theatre Swab (OT Swab) Analysis for the prevention and control of hospital acquired infections.
- Bacteriological analysis of drinking water to prevent Acute Diarrhoeal Diseases.

20.26 International Health Regulations (IHR)(2005)

The IHR (2005) aim to prevent, protect against, control and respond to the international spread of disease while avoiding unnecessary interference with international traffic and trade. The IHR (2005) are also designed to reduce the risk of disease spread at international airports, ports and ground crossings. The IHR (2005) establish a set of rules to support the global outbreak alert and response system and to require countries to improve international surveillance and reporting mechanisms for public health events and to

strengthen their national surveillance and response capacities. This makes the IHR (2005) central to ensuring global public health security. The International Health Regulations (2005) is an international law which helps the countries to work together to save lives and livelihoods caused by the international spread of diseases and other health risk and came into effect since 15th June, 2007 and are binding on 194 countries across the Globe, covering all WHO Member States / Countries including India. The IHR (2005) require Countries to notify WHO of all events that may constitute a public health emergency of international concern and to respond to requests for verification of information regarding such events. This enables WHO to ensure appropriate technical collaboration for effective prevention of such emergencies or containment of outbreaks and, under certain defined circumstances, inform other States of the public health risks where action is necessary on their part.

20.27 Specific diseases under the IHR (2005)

Under the IHR (2005), all cases of these four diseases must be automatically notified to WHO.

- i. Smallpox,
- ii. Poliomyelitis due to wild-type poliovirus,
- iii. SARS and
- iv. Cases of human influenza caused by a new subtype.

Vaccination against Yellow Fever is required for any traveller leaving an area where the WHO has determined that a risk of Yellow Fever transmission is present. In Tamil Nadu, two international vaccination centres have been established one at King Institute of Preventive Medicine and Research, Guindy, Chennai which functions on Tuesday and Friday and another at Port Health Organization, Chennai which functions on Monday and Wednesday. Airport and Seaport screening for the international travellers are regularly being done to monitor the spread of diseases notified by WHO as Public Health Emergency of International

concern. Regular mosquito control measures are also being undertaken in the Airport and Seaport to prevent and control the spread of vector borne diseases.

20.28 Sanitation and Hygiene

Hygiene is most important component in the prevention and control of diseases spread through Air / Fomite, Water, Food, Vector and Zoonotic causes. Simple messages are spread through these campaigns on the need to wash hands regularly to prevent diseases like Swine Flu, keep the surrounding environment clean to prevent breeding of mosquitoes and to prevent mosquito borne diseases.

The main areas of thrust are,

- Hand washing / Hand Hygiene
- Respiratory Hygiene
- Personal/Reproductive Hygiene
- De-worming
- Environmental Sanitation – solid and liquid waste management
- Effective inter-departmental coordination
- Encouraging stakeholder participation to make it into a public movement.

20.29 Water Analysis Laboratories - Water Quality Monitoring:

The Water Analysis Laboratories established in Chennai, Coimbatore, Tiruchirapalli and Tirunelveli, collect and examine water samples from various protected water sources to control pollution and contamination of drinking water. These laboratories also assist the Tamil Nadu Pollution Control Board in examining samples of industrial wastes and conducting field surveys to ensure the prevention and control of environmental and industrial water pollution. Additionally the local bodies, Tamil Nadu Water Supply and Drainage Board(TWAD) and Chennai Metropolitan Water Supply and Sewerage Board(CMWSSB) also independently do such testing at their levels also.

20.30 24x7 Epidemic Information Cell

This cell is functioning at the office of Directorate of Public Health and Preventive Medicine. It functions as a contact point for public and other stakeholders to interact and register any public health related issues. The

phone numbers are 044-29510400, 044-29510500 and 9444340496, 8754448477. Functions of the cell are -

- i. Information from Public, Media, Government Officials and Newspaper are communicated to the respective Districts and State Level Officers for taking timely action for the prevention and control of diseases.
- ii. The information collected from the 42 HUDs about Cholera, fever etc., are communicated (through email, Phone and SMS) to concerned Deputy Director of Health Services to monitor and review the public health measures against the spread of diseases.
- iii. Health related issues during natural disasters such as earth quake, flood and cyclone are also communicated through this cell.

20.31 One Health Initiative

Tamil Nadu is the first State in India which started adopting the "One Health Initiative". Under this, human, animal and environmental health are discussed under one umbrella with a view to share disease intelligence especially on Zoonotic and Vector Borne issues. It would gradually be expanded to research to supplement the efforts in respective fields.

Chapter - 21

NATIONAL TUBERCULOSIS ELIMINATION PROGRAMME

21.1 The Revised National Tuberculosis Control Programme (RNTCP) has been renamed as National Tuberculosis Elimination Programme (NTEP) in the year 2020 with the aim of stepping up its efforts of elimination of the menace of Tuberculosis in India. This Programme delivers TB Care Services with its full potential in line with the National Strategic Plan 2017-2025.

The objectives of the NTEP are:

| Objectives | Base line | Target | | |
|---|-----------|--------|------|------|
| | 2015 | 2020 | 2023 | 2025 |
| To reduce estimated TB Incidence rate (per 100,000 population) | 217 | 142 | 77 | 44 |
| To reduce estimated mortality due to TB (per 100,000 population) | 32 | 15 | 6 | 3 |
| To achieve zero catastrophic cost for affected families due to TB | 35% | 0% | 0% | 0% |

21.2 The NTEP aims at early diagnosis and free treatment for Tuberculosis patients both in the public as well as in the private sector. Drug Sensitive TB is treated using Fixed Drug Combinations (FDC) as per appropriate weight bands. The FDCs are also made available to private providers for those patients who prefer treatment in private hospitals.

21.3 The infrastructure and the facilities available in the State under the programme are as follows:

| | |
|---|--|
| State TB Training and Demonstration Centre (STDC) and State TB Cell | 1 |
| District TB Centres (DTCs) | 35 |
| TB Units (TU) | 461 |
| Designated Microscopy Centres (DMCs) | 1984 |
| Intermediate Reference Laboratory (IRL) | 2 - (Chennai, Madurai) |
| Culture and Drug Sensitivity (Cand DST) Labs (excluding IRL) | 2 -(Trichy Medical College and Christian Medical College, Vellore) |
| Liquid Culture Laboratories for 2 nd line DST | 2- (Chennai IRL, Madurai IRL) |

| | |
|--|------------------------|
| Cartridge Based Nucleic Acid Amplification Testing (CBNAAT) Labs | 68 + 2 (Mobile) |
| Nodal Drug Resistant TB Centre (DRTBC) (MDR TB Wards) | 7 – Nodal DRTB Centres |
| District Drug Resistant TB Centre (DDRTBC) (MDR TB Wards) | 31 |

21.4 Notification and Monitoring of TB Patients:

Through an online web portal called NIKSHAY is used for monitoring the TB patients, so far 1,10,529 TB patients are being monitored. We also ensured Private Sector engagement in TB cases notification through this portal. So far 25,305 Private Health facilities have been registered in the NIKSHAY portal. An exclusive website '**NIKSHAY AUSHADHI**' is used to monitor the Drug logistics and supply chain management of Anti-TB drugs.

21.5 Programmatic Management of Drug Resistant TB (PMDT):

- The programme provides Universal access to quality diagnosis and treatment of Drug resistant Tuberculosis.

- The Cartridge Based Nucleic Acid Amplification Test (CBNAAT) is available at all District Tuberculosis Centre to identify Rifampicin Resistant Tuberculosis.
- Specialised lab diagnostic services such as Line Probe Assay (LPA), Mycobacterium Growth Indicator Test (MGIT), Solid Culture test (LJ-Lowenstein Jensen Medium) are done at (IRL) Intermediate Reference Laboratory and Culture and Drug Sensitivity Test (Cand DST) Labs.
- Exclusive wards have been created for programmatic Management of Drug Resistant Tuberculosis at all districts.
- New drugs namely Bedaquiline for adult TB patients and Delamanid for pediatric TB patients have been introduced in our State for the first time in the country for DR-TB patients.
- Extensively Drug Resistant TB (XDR-TB) Cases are managed at Government Hospital for Thoracic Medicine at Tambaram and Otteri, Government Medical College Hospitals of Coimbatore, Madurai, Tirunelveli, Thanjavur and Vellore.

21.6 TB – HIV Services: The risk of developing Tuberculosis is estimated to be between 16-27 times greater in people living with HIV than among those without HIV infection. In view of this all the presumptive and registered TB cases are screened for HIV and vice versa.

| YEAR | HIV TESTED | HIV-TB CO-INFECTED |
|-------------|-------------------|-------------------------------|
| 2018 | 75,662 | 3,047 |
| 2019 | 78,811 | 3,456 |

21.7 Paediatric Services (Diagnosis and Chemoprophylaxis):

Children less than 6 years are particularly vulnerable for severe disseminated TB disease and TB related mortality. Under NTEP all children who are in contact with the people diagnosed with tuberculosis are regularly screened and Isoniazid preventive therapy (IPT) is given. Fixed Drug Combinations (FDCs) are available for confirmed Pediatric Tuberculosis Cases as per weight bands.

21.8 Nutritional Support through Direct Benefit Transfer (DBT):

In order to improve the Nutritional status of TB patients financial assistance of Rs.500/- per month is given to all notified TB patients through Direct Benefit Transfer(DBT) under Nikshay Poshan Yojana Scheme. So far Rs.16,11,29,500 has been disbursed under this scheme to the TB patients. Nutritional support not only aids in better treatment outcomes but also increases the compliance of drug intake.

21.9 Involvement of private sector for increasing case detection:

Since 2018 Private sector TB Treatment providers are actively engaged to notify TB patients through the project named "Joint Effort for Elimination of TB". As a part of patient provide support agency PPSA – 'Zero TB Chennai Project -2023' has been initiated in greater Chennai Corporation engaging NGO's for providing notification and management of TB patients seeking treatment in the private sector. In addition to this 21 districts have been covered under PPSA Lite for Private Sector engagement.

21.10 New Initiatives:

- To achieve elimination of TB by the year 2025, the Tamil Nadu Government launched **“TB Free Tamil Nadu – 2025”**. A Strategy document based on the four pillars of national strategic plan, namely “Detect – Treat – Prevent – Build” (DTPB) was developed for implementation.
- Active Case Finding (ACF) is conducted in all the districts of Tamil Nadu using two mobile CBNAAT vans and Digital X-ray Vans.
- Screening of inmates of prisons and other closed settings like Swadhar and Ujjwala homes for both TB and HIV.

21.11 Government welfare schemes for persons affected by TB:

Under the Chief Minister’s Uzhavar Padukappu Thittam (UPT) the Tamil Nadu Government has sanctioned monthly pension of Rs.1,000 till the completion of treatment period to the Farmer Members, who has been temporarily incapacitated due to Tuberculosis.

CHAPTER 22

NATIONAL TOBACCO CONTROL PROGRAMME

22.1 The National Tobacco Control Programme (NTCP) is implemented in Tamil Nadu and the State Tobacco Control Cell is functioning under the Directorate of Public Health and Preventive Medicine since 2007. All the District in the State are implementing Tobacco Control Activities as per COTPA, 2003 (under section 4, 5, 6, and 7). District Tobacco Control Cell are being formed in a phased manner in the following 10 districts namely: Kancheepuram, Villupuram, Madurai, Coimbatore, Trichirappalli, Pudukottai, Cuddalore, Nagapattinam, Tiruppur and Tirunelveli.

22.2 The significant activities of the State and District Tobacco Control Cell Programme for the period from 2nd October 2008 to 29th February 2020 is presented below:

1. Enforcement activities:

| | |
|------------------------------|----------------|
| Total No. of Violators fined | 2,31,906 |
| Total fine amount collected | Rs.4,20,30,537 |

2. Training:

| | |
|---------------------------------|--------|
| Total No. of Training conducted | 1,196 |
| Total No. of Persons Trained | 70,776 |

3. School Program:

Awareness Programs conducted in Schools and Colleges all over Tamil Nadu which resulted in Tobacco Free Educational Institutions are detailed below:

| | |
|---|--------|
| Total No. of Schools declared as "Tobacco free Schools" | 13,080 |
| Total No. of Colleges declared as "Tobacco free Colleges" | 1,344 |

4. Tobacco Cessation:

Tobacco Cessation Centers are established in two Pilot Districts namely Villupuram and Kancheepuram in which training is imparted and the details are furnished:

| | |
|-------------------------|-----|
| Medical Officer Trained | 684 |
| ICTC Counselors Trained | 53 |

| | |
|--------------------------|-----|
| NCD Staff Nurses Trained | 148 |
| Health volunteers | 78 |

5. IEC:

Mass Campaign – Celebration of World No Tobacco Day, Rallies, IEC on Wheels, Human Chain, Signature Campaign, Pledge taken against Tobacco usage, Distribution of Pamphlets are some of the IEC activities carried out.

22.3 Declaration of Smoke free places

- Smoke Free Villages
- Smoke Free Embassies
- Smoke-Free Police Commissioner’s Office and Police Stations
- Smoke Free Prison in Tamil Nadu, Smoke Free Transportation
- Smoke-Free Tamil Nadu Postal Circle
- Smoke Free Educational Institutions, Medical Colleges/ Dental College/ Government Hospitals/ PHCs
- Smoke Free Government Buildings
- Smoke Free Hotels/ Restaurants/ Malls

- Smoke Free Industries , Smoke Free Slums in Chennai City
- Tobacco Free Cinema Theatres and so on.

22.4 Banning of E-Cigarettes:

One of the new developments included is banning of E-cigarettes in the State. The manufacture, sale (including online sale), distribution, trade, display, marketing, advertisement, use, import and possession of Electronic Nicotine Delivery Systems (ENDS) is banned in Tamil Nadu and the same is being implemented effectively.

Chapter - 23

The Tamil Nadu Dr. M.G.R. Medical University

23.1 This Medical University was established in the year 1987 by enacting the Tamil Nadu Medical University Act, 1987 (Act No. 37/1987). The name was later amended as the Tamil Nadu Dr.M.G.R. Medical University (TNMGRMU) and the University is functioning from July 1988 and currently, this is one of the largest health sciences universities in India. The University currently has 1,04,371 students spread across its affiliated institutions.

With over 643 institutions of Medical, Dental, AYUSH, Pharmacy, Nursing and various other allied health streams under its fold, the Tamil Nadu Dr.M.G.R. Medical University has set itself the twin objectives of quality education and Applicative Research in medical, dental, para-medical and AYUSH specialities.

23.2 This is the only health sciences University in Tamil Nadu capable of granting affiliation to new institutions under Government or Self-financing establishments in Medical, Dental,

AYUSH, Pharmacy, Nursing, Physiotherapy, Occupational therapy and various Allied Health Sciences Educational Streams, awarding degrees.

The quasi-academic and administrative workload of the Tamil Nadu Dr.M.G.R. Medical University is also huge and time-bound. On an average, about 11,700 Eligibility Certificates to various candidates were issued in 2019. Around 1,347 Migration Certificates are issued annually.

23.3 ACHIEVEMENTS OF THE UNIVERSITY IN 2019-20

23.3.1 With the objective of developing international cooperation and academic, and scientific exchange projects, the Tamil Nadu Dr. Medical University (TNMGRMU) entered into a partnership with The Federal University of Mato Grosso (UFMT), Brazil and signed an MoU, on 7th October 2019.

23.3.2 The Tamil Nadu Dr. M.G.R. Medical University and Tiruvalluvar University, Vellore (TUV) entered into an MoU with the objectives of undertaking joint studies on herbal management of chronic disorders organizing conferences etc.,

and exchange of faculty between TUV and TNMGRMU.

23.3.3 A novel new course of Post-Graduate Diploma in Public Health Journalism was started for aspiring journalists with the objectives of improving the quality of public health reporting.

23.3.4 The University addresses the factor of quality education by several measures. One such measure is to ensure high-quality examination and evaluation. Stringent and fool-proof methods are adopted in all processes of the examination right from the level of setting the questions till the time of publication of results. Tamil Nadu Dr.M.G.R Medical University has implemented recently real-time surveillance/ live monitoring of examination centres across the State. To begin with, 35 medical colleges were monitored for M.B.B.S exam during February 2020 sessions. This system will be introduced for other courses soon.

23.3.5 The Tamil Nadu Dr.M.G.R Medical University has implemented the system of on-screen evaluation to avoid any mishandling or tampering of answer scripts. This ensures a

quick and efficient evaluation process. The system has been refined and fine-tuned further, from the time of its original inception and as a result, has anchored itself in academic excellence. Consequent to such robust refinement, this University has been requested by other universities and academic bodies around the country to help in the setting up of similar systems in their respective consoles.

23.3.6 This University began to fulfill its social responsibility in a new additional dimension by conducting public interaction programmes in which eminent specialist physicians readily shared their expertise with the common man through lectures and doubt-clearing sessions. As of now, these interactive programmes are being conducted fortnightly at the Guindy campus of the University utilising the expertise and services of various specialty experts in the University and the affiliated institutions.

23.3.7 A one-day Basic Training Programme on Human Rights was conducted on 21.12.2019 with authorities from the State Human Rights Commission and Honb'le Judges

from Madras High Court. Further efforts are underway to start appropriate joint programmes in Medical Law, Legal Medicine and Genetic Technology in co-ordination with certain other universities of the State.

23.3.8 The environmental health also was a matter of concern for the University. Around 50 tree saplings were planted on the occasion of Tree Plantation Day – 2019 on 27.09.2019. To protect them from cracking and from diseases, insects and fungus, the trunks of about 200 trees in the University campus were painted by the volunteers among the staff members of the University. In addition, to stay in tune with nature as a way for healthy living, the University established a herbal garden with native herbs and plants for everyday use.

23.3.9 Intellectual plagiarism is a problem in the emerging world. With more and more technological advancement, it becomes easier to plagiarise than to install measures to curb it. We have dedicated ourselves to resolve this issue. The University is set to embark on a project to not just ensure protection but provide appropriate recognition of intellectual property.

Such a measure will not only fortify existing research avenues but also open the doors for newer, relevant and better-focused projects. The departments of the University have had good performance records over the last year.

23.4 Department Of Epidemiology:

The Department of Epidemiology has been vividly active during the academic year 2019-2020. The department started a novel one-year Post Graduate diploma course in public health journalism for aspiring journalists. This course aims to professionalise budding journalists for a career in public health and improve the quality of reporting in public health, which can eventually have a greater positive impact on the development of a healthy community.

23.5 Department of Experimental Medicine:

The HIV testing laboratory in the Department of Experimental Medicine has been accredited by NABL (National Accreditation Board for Laboratories) with validity till May 2021. The department NRL has been identified as one of the HIV sentinel surveillance testing centres.

23.6 Department of Immunology:

The Department of Immunology is recognized as an ICMR nodal centre for Zika, Dengue and Chickungunya virus testing. The department conducts regular training programmes for lab technician, medical students and faculty of various colleges. It is also been recognized as a centre for doing pre and post-Renal transplant workup by Transplant Authority of Tamil Nadu (TRANSTAN).

23.7 Department of Medical Education and Curriculum Development:

The goal of the Medical Education and Curriculum Development Department is to create structured curricula that will be providing the Medical and Para-Medical graduates with essential knowledge, skills, and attitude to carry out their respective role in health care delivery; to bring about reforms in the Curricula of Medical and Paramedical Courses and to implement active approach towards Teaching and Learning. This Department offers courses of limited duration focusing into areas of sub specializations at Graduate and Post Graduate

levels which form subsets of existing specialties offered by the University.

23.8 Department of Medical Genetics:

The Department of Medical Genetics offers diagnostic services conduct capacity-building workshops and pursue applicative research. Patients are referred from Government and private hospitals for diagnosis and counseling.

23.9 Department of Siddha:

The Department of Siddha has a recognized Drugs Standardization Laboratory. The Siddha Post Graduate students affiliated to this University are utilizing this laboratory for their research programme. The department of Siddha is recognized centre for conducting Ph.D. programme in Siddha.

23.10 Department of Transfusion Medicine :

The Department of Transfusion Medicine is conducting MCI recognised course of MD (IHand BT) from the academic year 2005-06. The Department of Transfusion Medicine has a licensed Blood Bank and it has been identified by NACO under Ministry of Health and Family Welfare, New Delhi as "Regional Training

Centre”, which conducts voluntary blood donation camps, single donor platelets preparation by apheresis procedure and Advanced Immuno-haematological work-up.

23.11 Students Welfare section:

The University has an established University Research Council and an Accreditation Centre for Continuing Education Programmes, in order to train the Post-Graduate students to meet international standards.

The University also promotes the regular Continuing Education Programme activities in all the affiliated institutions by offering financial assistance. The University has a well established Sports Council which promotes sports and games activities among the students of the affiliated institutions by providing sports grants.

23.12 Regional Medical Library:

The University offers students a conducive atmosphere for learning by providing easy access in the library and also accommodating an own books reading complex in the campus. Book exhibition was conducted in the year 2019 and the students and faculties visited the Exhibition

and recommended the latest editions of the books for updating the Regional Medical Library. The University has formed the e-consortium through which the students and faculties can access the e-journals on all the days from their institution, or from their home or from anywhere by using their user name and password generated by the Library through ezproxy software. The dissertations submitted by the Post-Graduates and research scholars are provided as open access through e-repository. The students can search, browse and download the dissertations of the University. The University offers students a conducive atmosphere for learning by providing easy access in the library and also accommodating an own books reading Hall in the campus.

Overall, the University is positively contributing to the growth of health sciences education, while upholding the highest ethical and professional standards.

Chapter-24

CERTAIN IMPORTANT ACTS

24.1 The Tamil Nadu Private Clinical Establishments (Regulation) Amendment Act, 2018.

The Government of Tamil Nadu has enacted Tamil Nadu Private Clinical Establishments (Regulation) Act, 1997 to regulate and control clinical establishments. The Government of India has enacted the Clinical Establishment (Registration and Regulation) Act, 2010 on 19.08.2010 and sent draft model State Rule to State Government for consideration and adoption. A Committee was constituted on 03.12.2012 to give its report and for examining the salient features of the above two Acts. Based on the recommendations of the said Committee, Tamil Nadu Private Clinical Establishments (Regulation) Act, 1997 has been suitably amended in the year 2018. So far Directorate of Medical and Rural Health Services has received 34,516 applications and registered 15,127 Clinical establishments after inspection.

24.2 Pre-Conception and Pre-Natal Diagnostic Techniques (Prohibition Of Sex Selection) Act, 1994:

Pre-Conception and Pre-Natal Diagnostic Techniques (PCPNDT) Act, 1994 is an Act of the Parliament of India enacted to stop female foeticide and curtail the declining sex ratio in India.

The PCPNDT Act is being implemented intensively and effectively throughout the State of Tamil Nadu by prosecuting the scan centres for violations of PCPNDT Act. Due to effective implementation of the PCPNDT Act the Sex Ratio at birth has increased from 912 to 931.

433 public awareness programmes were conducted throughout the State of Tamil Nadu against the practice of preconception sex selection, pre-natal determination of sex and female foeticide.

Capacity building workshop is being conducted regularly for the District Appropriate Authorities twice a year regarding provisions and implementation of the PCPNDT Act, 1994.

24.3 The Transplantation of Human Organs Act, 1994

To provide the regulation of removal, storage and transplantation of human organs for the therapeutic purpose and to prevent commercial trade of Human Organs, the Government of India has enacted the Transplantation of Human Organ Act 1994. In Tamil Nadu, transplantation of human organs are being done only in the hospitals registered under the Act. The Director of Medical and Rural Health Services is the State Appropriate Authority for the implementation of this Act. The Hospitals which apply for Registration under this Transplantation of Human Organ Act 1994 are inspected by a team of specialists from the nearby Government Medical College Hospitals. Based on the inspection report furnished by the above specialists, the State Appropriate Authority will issue the Registration Certificate. In Tamil Nadu 19 Government Medical college hospitals, 139 Private hospitals are registered under this Act for performing renal, heart, liver, lungs, heart valves and bonemarrow transplantations.

Transplant performing hospitals in the State are divided into three zones as follows and organ donations from cadaver arising in a zone are allocated first within that zone.

North Zone - Chennai and neighborhood, Vellore

South Zone - Tiruchirappalli, Madurai, Tirunelveli, Nagercoil

West Zone - Coimbatore, Erode, Salem

Tamil Nadu has been continuously awarded the best performer in the country for the past four years in the implementation of the Deceased Organ Transplant Programme. The details of Donors and Organs donated in Tamil Nadu are given below:

| | From October 2008 to Dec 2019 |
|--------|--------------------------------------|
| Donors | 1,324 |
| | |
| Heart | 553 |
| Lung | 490 |
| Liver | 1,225 |
| Kidney | 2,395 |

| | |
|-----------------------------|--------------|
| Pancreas | 27 |
| Small Bowel | 3 |
| Hands | 2 |
| Multi Visceral | 1 |
| Total Major Organs | 4,696 |
| Skin | 135 |
| Corneas | 2,013 |
| Heart Valves | 842 |
| Blood Vessels | 2 |
| Bone | 77 |
| Spine Bone & Disc Tissue | 21 |
| Abdominal Flap | 1 |
| TOTAL | 7,787 |

24.4 Tamil Nadu Public Health Act, 1939

Tamil Nadu is the first State in the country to enact a law for public health namely Tamil Nadu Public Health Act, 1939. The Act has been amended in 1941, 1944 and 1958 and the Act was modified in 1970. The main focus of the Public Health Act, 1939 is on environmental health, communicable disease control, food hygiene and maternity and child health measures. Since newer challenges such as emerging and re-emerging diseases, increasing

industries in food production, emerging social issues like Gender issues, adolescents, geriatric issues, increasing environmental hazards – Ozone layer depletion, weaning greenery, radiation, bio-degradation, environmental pollution due to change in life style have emerged, the Public Health Act needs a relook and the Government is taking action to amend the Act. Tamil Nadu, to its credit also had the first Act in the country for food adulteration i.e. the Tamil Nadu Prevention of Food Adulteration Act, 1918, till the Act was repealed by the Central Act, 1954. It has since been enacted as the Food Safety and Standards Act, 2006 and Rules, 2011 and has replaced the Prevention of Food Adulteration Act, 1954.

24.5 Civil Registration System

Births and deaths are the two most important vital events that define the life of an individual. It describes the legal existence of an individual. The registration of these events is a basic source of population. The civil registration is continuous, permanent and compulsory recording of the occurrence of the

vital events such as births, deaths and still births.

The registration of births, deaths and still births is mandatory as per the Registration of Birth and Death Act, 1969 and is governed by the Tamil Nadu Registration of Birth and Death Rules, 2000. The Director of Public Health and Preventive Medicine is the Chief Registrar of Births and Deaths in Tamil Nadu and implementing authority of the Registration of Birth and Death Act 1969 in the State.

All births and deaths have to be reported compulsorily for registration at the place of occurrence within 21 days of their occurrence and beyond the above said time limit the registration of births and deaths can be carried out as per the prescribed procedures in the Tamil Nadu Registration of Birth and Death Rules, 2000. There are about 16,498 registration units existing in the State and the registration activity is carried out by birth and death registrars of various departments viz., Health, Revenue, Municipality, Town Panchayats and Corporation in 37 Revenue Districts. The registered vital events were

entered in different softwares by the line departments. To have uniformity, the Government have ordered for the implementation of the CRS common software developed by the Public Health department from 01.01.2018. A total of 9,38,344 of births and a total of 6,29,441 deaths have been registered in the CRS common software during the year 2019.

Facilities introduced:

- Public domain facility has been introduced to download the birth/death certificate at free of cost from 01.01.2018 from the CRS web portal (crstn.org) for all the events registered in CRS software.
- Multi Purpose Health Supervisors (Male) are appointed as Birth and Death Registrars for all Government District Head Quarters Hospital, Taluk/Non-Taluk Hospital, Government Medical College Hospital, ESI and Women and Children Hospitals situated in Village Panchayats, Town Panchayats, Municipalities and Corporations to issue free birth certificate to the mother before discharge from the Government Medical Institution.

- e-signed birth and death certificates have been introduced in Primary Health Centres, Town Panchayats, Municipalities and Corporations.
- The death registered details under common CRS software are shared to Election Commission towards deleting deceased from the Electoral Roll.

Vital rates as per Sample Registration System 2017

Birth Rate 14.9, Death Rate 6.7 Infant Mortality Rate 16.0

24.6 Cigarettes and Other Tobacco Products Act (COTPA), 2003

In order to discourage tobacco use and protect the youth and masses from the harmful effects of tobacco usage and Second Hand Smoke (SHS), Government of India enacted "Cigarettes and other Tobacco Products (Prohibition of Advertisement and Regulation of Trade and Commerce, Production, Supply and Distribution) Act, (COTPA) in 2003". The Act imposes progressive restriction on all tobacco products to reduce their demand and supply.

The law is applicable to all tobacco products and extends to whole of India. The specific provisions of the COTPA include:

Section 4: Prohibition of smoking in public places

Section 5: Prohibition of direct and indirect advertisement, promotion and sponsorship of cigarette and other tobacco products.

Section 6(a): Prohibition of sale of cigarette and other tobacco products to a person below the age of eighteen years.

Section 6(b): Prohibition of sale of tobacco products within a radius of 100 yards of educational institutions.

Section 7: Mandatory depiction of Statutory warnings (including pictorial warnings on tobacco packs).

Section 7(5): Display of tar and nicotine contents on tobacco packs.

CHAPTER 25

RESEARCH AND TRAINING

25.1 Public Health

Tamil Nadu is currently undertaking many innovative initiatives through State, National and International collaborations.

i) An innovative project with the funding support of the State Planning Commission under TANII, has been launched for Surveillance of Acute Encephalitis Syndromes in District Public Health Laboratories, Medical College Hospitals and King Institute of Preventive Medicine, Guindy.

ii) Centre for Disease Control (CDC) – India Funding Projects.

- Tiruvallur District has been taken as model district for disease control in collaboration with National Institute of Epidemiology (NIE) with funding support of CDC, India.

- Anti-Microbial Resistance (AMR) Programme through Global Health Security Agenda (GHSA) in two districts (Kancheepuram and Tirunelveli) with

funding support from CDC, India.

- Acute Febrile Illness pilot Project in Krishnagiri and The Nilgiris district with funding support from CDC, India.
- Global Food Borne Diseases Prevention Network scheme in two districts viz. Kancheepuram and Cuddalore through funding from NCDC.

These Programmes are continuing.

- The Tamil Nadu Dr.M.G.R. Medical University and the Government Medical Colleges also serve as base where the teaching staff also engage in publishing research papers which are topical in Nature and useful for furthering the cause of Medicine.

25.2 Training and Continuing Education Programme

Continuing education, In-service training and Pre-service training programmes are organized for the Health Officers, Medical Officers, Nurses and other paramedical staff through eight Regional Training Institutes (RTI) namely Institute of Public Health, Poonamallee, Health and Family Welfare Training Centres

(HFWTC) at Egmore, Madurai, Health Manpower Development Institutes at Villupuram and Salem, Institute of Vector Control and Zoonoses, Hosur and Regional Institute of Public Health, Thiruvarankulam, Pudukottai and HFWTC, Gandhigram, Dindigul. The Institute of Public Health Poonamallee is recognised as a national collaborative training centre with National Institute of Health and Family Welfare, New Delhi. During the year 2019-2020, 17,072 Medical, Para Medical Staff and other Staff were trained in these Institutions.

25.3 The Training programmes organised by the National Health Mission, Capacity building trainings in Skilled Birth Attendance (SBA), Emergency Obstetric Care (EmOnC, six months training), Life Saving Anaesthesia Skills (LSAS, six months training), Skill lab programmes, Integrated Management of Neonatal and Childhood Illness, Immunization, Integrated Disease Surveillance and Control Programme (IDSP), Computer Training and other NHM training programmes are organized in these training institutes. Ultra sonogram training is given to Primary Health Centres doctors for detection of congenital deformities during pregnancy in Public Private Partnership

mode. Presently there are 11 Auxiliary Nurse and Midwifery (ANM) Training Schools functioning in the State and they have been permitted by the Government to train 60 candidates each from 2018 onwards. These schools conduct two year ANM course. The Anganwadi workers from ICDS department and candidates from Government Service Homes are being selected for this course. During the year 2019-2020, 660 candidates are undergoing Training courses in these Institutions.

The Government have permitted the Director of Public Health and Preventive Medicine, as Chairman, Board of Examination for ANM Training Course run by Private Institutions. Accordingly, 47 Private Trusts/ Institutions were permitted to start ANM Training Schools for the academic years 2017-18, 2018-19 and 2019-2020. The Government have permitted the Director of Public Health and Preventive Medicine, as Chairman, Board of Examination for Multi Purpose Health Worker (Male)/H.I./S.I. Training Course run by Private Institutions. Accordingly, 55 Private Trusts/ Institutions were permitted to start MPH(M)/ H.I./S.I. Course

Training Institutes for the academic year 2017-18, 2018-19 and 2019-20.

25.4 Multipurpose Health Worker Training Course

One month in service training was given to 296 Multi Purpose Health Worker (Male) working in this department in a phased manner at the Regional Training Institutes at Madurai and Hosur. Further, 40 Laboratory Technicians Grade-III were given Multi Purpose Health Worker training at the Regional Training Institute at Hosur. They will be promoted as Multi Purpose Health Supervisor in this department. Besides this, one year Multi Purpose Health Worker (Male) Training was given to 6 candidates from National Leprosy Eradication Programme. Apart from this 10 Sanitary Supervisors from Municipal Administration Department are undergoing one year Sanitary Inspector Training course at Institute of Public Health, Poonamallee.

Over the years, there has been a steady increase in the Government spending towards provision of healthcare through public facilities in Tamil Nadu. This shows the commitment of the Government towards achieving the Universal Health Care for all its citizens. Tamil Nadu is implementing several landmark initiatives to ensure quality medical care to all people. It has been a forerunner in implementing maternal, child care and family welfare services. The Health and Family Welfare programmes under the State Schemes and the schemes of Government of India will continue to be implemented with greater dedication and satisfaction to the public with intent to achieve the health standard on par with the developed nations.

Dr.C.VIJAYABASKAR

Minister for Health and Family Welfare