

INTRODUCTION

The Indian System of Medicine is of great antiquity. It is the culmination of Indian thought of medicine which represents a way of healthy living valued with a long and unique cultural history, as also amalgamating the best of influences that came in from contact with other civilizations be it Greece (resulting in Unani Medicine) or Germany (Homeopathy) or our scriptures/sages which gave us the science of Ayurveda, Siddha as also Yoga & Naturopathy. Like the multifaceted culture in our country, traditional medicines have evolved over centuries blessed with a plethora of traditional medicines and practices.

A separate Department of Indian Systems of Medicine and Homoeopathy (ISM&H) was set up in 1995 to ensure the optimal development and propagation of AYUSH systems of health care. The Department of ISM&H was re-named as the Department of AYUSH (an acronym for - Ayurveda, Yoga and Naturopathy, Unani, Siddha, Homoeopathy) in November 2003. With an increase in lifestyle-related disorders there is a worldwide resurgence of interest in holistic systems of health care, particularly with respect to the prevention and management of chronic, non-communicable and systemic diseases. It is increasingly understood that no single health care system can provide satisfactory answers to all the health needs of modern society. Evidently there is a need for a new inclusive and integrated health care regime that should guide health policies and programmes in future. India has an advantage in this global resurgence of interest in holistic therapies as it has a rich heritage of indigenous medical knowledge coupled with strong infrastructure and skilled manpower in modern medicine. Medical pluralism is here to stay and the AYUSH sector has a critical role to play in the new and emerging situation.

The Ministry of AYUSH promotes and propagates Indian systems of Medicine and Homoeopathy, and is committed to infuse the wisdom of traditional medicine with the methodologies of modern science, scientifically validating the systems and presenting them in the scientific idiom, relating their efficacy to modern life styles. The Department has, over the years, developed a broad institutional framework to carry out its activities. The National Medicinal Plants Board (NMPB) functions under the Department to coordinate activities relating to conservation, cultivation, marketing, export and policy making for the development of the medicinal plants sector. There are two statutory regulatory bodies, namely Central Council of Indian Medicine (CCIM) and Central Council of Homoeopathy (CCH) for laying down minimum standards of education,

recommending recognition of medical qualifications, registering the practitioners and laying down of ethical codes. Five research councils, for Ayurveda (CCRAS), Siddha (CCRS), Unani (CCRUM), Yoga and Naturopathy (CCRYN) and Homeopathy (CCRH) are responsible for the officially sponsored research activities. So far, eight National Institutes are existing at national level for teaching, research and clinical practices.

For Standardisation and testing of Drugs, various agencies have been put in plan by the Government of India. Four different Pharmacopoeia Committees are working for preparing official formularies / pharmacopoeias to evolve uniform standards in preparation of drugs of Ayurveda, Siddha, Unani and Homeopathy and to prescribe working standards for single drugs as well as compound formulations. A Drug Quality Control Cell is working in the Department to deal with the matters pertaining to licensing, regulation and control of drugs and the spurious manufacture of Ayurvedic, Unani and Siddha Drugs and other matters. Two apex Laboratories, namely, Pharmacopoeial Laboratory for Indian Medicine (PLIM) and Homoeopathic Pharmacopoeial Laboratory (HPL) are functioning as Standard Setting-Cum-Drug-testing Laboratories for Indian Medicines and Homoeopathy respectively. Indian Medicines Pharmaceutical Corporation Ltd. (IMPCL), a Public Sector Undertaking, manufactures classical Ayurveda and Unani drugs. The Ministry also manages the CGHS Ayurveda Hospital at Lodhi Road, New Delhi.

Bringing AYUSH into the mainstream health care delivery system of the country has long been a major policy objective of the Ministry. Under the NRHM, AYUSH facilities are being set up in PHCs and CHCs and are being manned by qualified AYUSH physicians appointed on contract basis.

Since the creation of a separate Ministry, there has been a substantial increase in the infrastructural facilities under AYUSH systems in the country. **Presently, there are 3605 hospitals with about 57858 beds, 26130 dispensaries, 7,36,538 doctors, 519 educational institutions with admission capacity of about 29101 UG student and 3604 PG students and 9044 drug-manufacturing units under AYUSH systems. Under NRHM, AYUSH facilities have been co-located with 331 District hospitals, 1885 CHCs and 8461 PHCs.**

A. AYUSH SYSTEMS

(i) Ayurveda:

The word 'Ayurveda' has derived out of fusion of two separate words- 'Ayu' i.e. life and 'veda' i.e.

knowledge. Thus in literal meaning Ayurveda is the science of life. Ayurveda is a classical system of preventive, promotive and curative healthcare originating from the Vedas documented around 5000 years ago and currently recognized and practiced in India and many countries in the world. It is one of the most ancient healthcare systems having equal scientific relevance in the modern world, that take a holistic view of the physical, mental, spiritual and social aspects of human life, health and disease.

It is believed that Ayurveda is originated out of Vedas (particularly *Rigveda* and *Atharvaveda*). Numerous references of health, diseases, their treatment as well as use of non-materialistic things such as sun rays, fasting, mantra etc; are available in these Vedas. The knowledge of Ayurveda was first comprehensively documented in the compendia like 'Brahma Samhita', Ágnivesha tantra', 'Bhela Samhita' etc. Out of these, only some part of Bhela Samhita is available today. The Agnivesha Tantra was edited by Charak around 5000 years back called *Charak Samhita* and thereafter re-edited by Dridhbala, which is one of the main text of Ayurveda available in complete form today. This is the most translated treaty of Ayurveda, which got translated in to many foreign languages like Tibetan, Arabic, Unan and Greek even in ancient time. In recent past many scholars have translated Charak *Samhita* in to English, German, and Japanese languages. Likewise another full available ancient text mainly dealing with surgical aspect of diseases is *Sushruta Samhita*, which has also undergone 3-4 editions in past 5000 years.

According to Ayurveda, health is considered as a basic pre-requisite for achieving the goals of life - *Dharma* (duties), *Arth* (finance), *Kama* (materialistic desires) and *Moksha* (salvation). As per the fundamental basis of Ayurveda, all objects and living bodies are composed of five basic elements, called the *Pancha Mahabhootas*, namely: *Prithvi* (earth), *Jal* (water), *Agni* (fire), *Vayu* (air) and *Akash* (ether). The philosophy of Ayurveda is based on the fundamental correlation between the universe and the man. Hence Ayurveda has also stressed on environmental aspects and has advised various measures for conservation of nature as well as to avoid the pollution of Air, water and Soil. Ayurveda imbibes the humeral theory of *Tridosha*- the *Vata* (ether + air), *Pitta* (fire) and *Kapha* (earth + water), which are considered as the three physiological entities in living beings responsible for all metabolic functions. The mental characters of human beings are attributable to *Satva*, *Rajas* and *Tamas*, which are the psychological properties of life collectively terms as '*Triguna*'. Ayurveda aims to keep structural and functional entities in a state of equilibrium, which signifies good health (*Swasthya*). Any imbalance due to internal or

external factors leads to disease and the treatment consists of restoring the equilibrium through various procedures, regimen, diet, medicines and behavior change. Ayurveda, being an applied Science and considering the limitations for printing in ancient time, all the ancient texts have concentrated mainly on applied aspects. Understanding of 'Functional Anatomy' i.e. Sharir is the unique contribution of Ayurveda to the modern science which has great potential for new discoveries in System Biology.

The treatment approach in the Ayurveda system is holistic and individualized having preventive, curative, mitigative, recuperative and rehabilitative aspects. The preventive aspect of Ayurveda is called *Svasth-Vritta* and includes personal hygiene, daily and seasonal regimens, appropriate social behavior and use of materials & practices for healthy aging and prevention of premature loss of health attribute. The curative treatment consists of *Aushadhi* (drugs), *Ahara* (diet) and *Vihara* (life style). Ayurveda largely uses plants as raw materials for the manufacture of drugs, though materials of animal and marine origin, metals and minerals are also used. Ayurvedic medicines are generally safe and have little or no known adverse side-effects, if manufactured properly and consumed judiciously following necessary dos and don'ts. The mitigative and recuperative treatment is again a specialty of Ayurveda which is known as *Rasayana*, in which various drugs and therapies have immunomodulatory effects are used. Ayurveda has also described about genetic predisposition for health as well as development of a disease and has described various treatments so as to restrict the transfer of genetic linked diseases to next generation. This specialty of Ayurveda is known as '*Vrishya*'.

Initially, clinical medicine of Ayurveda was developed into eight distinct specialties, i.e. *Kayachikitsa* (Internal Medicine), *Shalya Tantra* (Surgery), *Shalakya* (Eye and ENT), *Kaumar Bhritya* (Pediatrics), *Graha Chikitsa* (Psychiatry), *Agad Tantra* (Toxicology), *Rasayana* (Gerontology) and *Vajikarana* (Science of virility), on the basis of which it is called '*Astang Ayurveda*'. During the last 60 years of its development after India became independent, Ayurveda has come up to provide 22 specialized courses of study at post-graduation level. These specialties are -- *Ayurveda Sidhanta* (Fundamental Principles of Ayurveda), *Ayurveda Samhita* (Classical Texts of Ayurveda), *Rachna Sharira* (Anatomy), *Kriya Sharira* (Physiology), *Dravya Guna Vigyan* (Materia medica and Pharmacology), *Rasa-Shastra* (Pharmaceuticals using minerals and metals), *Bhaishajya Kalpana* (Pharmaceuticals), *Kaumar Bhritya* or - *Bala Roga* (Pediatrics), *Prasuti Tantra avum Stri Roga* (Obstetrics and Gynecology),

Swasth-Vritta (Social and Preventive Medicine), *Kayachikitsa* (Internal Medicine), *Rog Nidan avum Vikriti Vigyan* (Diagnostics & Pathology), *Shalya Tantra-Samanya* (Surgery), *Shalya Tantra - Kshar Karma avum Anushastra Karma* (Para-surgical interventions & procedures), *Shalakyata Tantra -Netra Roga* (Ophthalmology), *Shalakyata Tantra - Shiro-Nasa-Karna Avum Kantha Roga* (Treatment of diseases of Head and ENT), *Shalakyata Tantra - Danta Avum Mukha Roga* (Dentistry), *Manovigyana avum Manas Roga* (Psychology & Psychiatry), *Panchakarma* (Bio-purification), *Agad Tantra avum Vidhi Vaidyaka* (Toxicology and Medical Jurisprudence), *Sangyahanana* (Anesthesiology) and *Chhaya avum Vikiran Vigyan* (Radiology).

Ayurveda holds the strength to treat diseases from holistic angle in accordance with the body-mind constitution and other physico-psychological attributes of the patients and as such is proven to be effective in the treatment of chronic, metabolic and life style diseases for which satisfactory solutions are not available in conventional allopathy medicine. Over the years, *Kshar Sutra* and *Panchakarma* therapies of Ayurveda have become very popular among the public. *Panchakarma* is a unique therapeutic procedure for the radical elimination of disease-causing factors and to maintain the equilibrium of tridosha. The *Panchakarma* therapy minimizes the chances of recurrence of the diseases and promotes positive health by rejuvenating body tissues and bio-purification. *Kshar Sutra* is a para-surgical intervention using an alkaline thread for cauterization, which is scientifically validated to be effective in the treatment of fistula-in-ano and such surgical conditions as require excision of overgrown soft tissue like polyps, warts, non-healing chronic ulcers, sinuses and papillae.

(ii) Unani:

The Unani System of Medicine originated in Greece and passed through many countries before establishing itself in India during the medieval period. This system is based on the teachings of Hippocrates and Gallen, developed into an elaborate Medical System by Arabs. It is based on well established knowledge and practices relating to the promotion of positive health and prevention of diseases. The Unani system became enriched by imbibing what was best in the contemporary systems of traditional medicines in Egypt, Syria, Iraq, Persia, India, China and other Middle East countries.

The system of medicine was documented in *Al-Qanoon*, a medical bible, by Sheikh Bu-Ali Sina (Avicenna, 980-1037 AD), and in *Al-Hawi* by Razi (Rhazes, 850-923 AD) and in many other books written by the Unani physicians. The literature of the

Unani system is mostly found in Arabic, Persian and Urdu languages.

The Unani system is based on the Humoral theory i.e. the presence of blood, phlegm, yellow bile and black bile in a person. The temperament of a person can accordingly be sanguine, phlegmatic, choleric and melancholic depending on the presence and combination of humors. According to Unani theory, the humors and medicinal plants themselves are assigned temperaments. Any change in quantity and quality of the humors, brings about a change in the status of health of the human body. A proper balance of humors is required for the maintenance of health.

The system is holistic in nature and offers preventive, promotive, curative and rehabilitative healthcare. The thrust areas of Unani medicine are: Chronic Disorders, Psychotic Disorders, Non Communicable & Metabolic Diseases and Immune-Modulation etc. like Rheumatoid Arthritis, Jaundice, Nervous Debility, Skin Diseases like Vitiligo & Eczema, Sinusitis and Bronchial Asthma. For the prevention of disease and promotion of health, the Unani system emphasizes six essentials (Asbab-e-Sitta Zarooria):- (a) Pure Air, (b) Food and Drinking Water (c) Physical Movement and Rest (d) Psychic Movement and Rest (e) Sleep and Wakefulness and (f) Retention of Useful Materials and Evacuation of Waste Materials from the body. There are four forms of treatment in Unani medicine-*Ilaj bid Dawa* (Pharmacotherapy), *Ilaj bil' Ghiza* (Dietotherapy), *Ilaj bid Tadbir* (Regimental Therapy) and *Ilaj bil Jarahat* (Surgery). Regimental therapy (*Ilaj bid Tadbir*) is a special technique/ physical method of treatment to improve the constitution of body by removing waste materials and improving the defense mechanism of the body and protect health. Some of the special techniques are *Fasd* (Blood-letting), *Hijama* (Cupping), *Dalk* (Massage), *Taleeq-e-Alaq* (Leeching), *Hammam-e-Har* (Turkish Bath), *Riyazat* (Exercise), *Amal-e-Kai* (Cauterization). The Unani system of medicine offers various methods of treatment which are used for specific and complicated diseases. It emphasizes the use of naturally occurring, mostly herbal medicines and also uses some medicines of animal, marine and mineral origin.

This system over the centuries has assimilated so well in the Indian civilization that today it is recognized by Government of India as one of the Indian systems of medicine, and forms an integral part of our national healthcare delivery structure. The Government has been providing increasing funds and support for its multi-faceted development. As a result, today the country has the widest network of educational, research, healthcare and pharmaceutical institutions of Unani Medicine, and enjoys the position

of world leader in this area. In the country, there are 42 teaching institutions offering degree level education and training in Unani Medicine; eight of them offering postgraduate courses in nine disciplines of Unani medicine. The National Institute of Unani Medicine, Bangalore, set up by Central Government, conducts postgraduate education in eight subjects with Ph.d. in Maolijat and research programmes. The education and practice of Unani System of Medicine is under the regulatory control of Central Council of Indian Medicine (CCIM), which is a statutory body established through an Act of Parliament-the Indian Medicine Central Council (IMCC) Act, 1970. In the area of public healthcare, a large network of Unani hospitals and dispensaries is functioning across the country; predominantly through Central and State Government initiatives.

Research and development in Unani Medicine is by and large in the hands of Central Council for Research in Unani Medicine (CCRUM). The Council has, over the past three and a half decades, emerged as the leading organization to bring out significant scientific outcomes and documents for reference and use in this field. The CCRUM has its headquarters in New Delhi with 23 centers functioning in different parts of the country. Major areas of research of CCRUM are: Clinical Research including Safety & Efficacy studies of Unani drugs, Fundamental Research-Validation of Basic Principles, Drug Standardization and Quality Control, Survey and Cultivation of Medicinal Plants and Literary Research. Council has been granted 8 patents from the Indian Patent Office for Drug Development and 30 applications for grant of patent is pending in Indian Patent Office.

There are a good number of licensed manufacturing units for Unani drugs in private sector of the country. The pharmacopoeial laboratory for Indian medicine (PLIM) is functioning since 1970 as an appellate laboratory for testing of traditional medicines including Unani drugs and development of pharmacopoeial standards under the purview of pharmacopoeial commission for Indian medicine (PCIM). Propagation of Unani system of Medicine beyond the Indian boundaries has been boosted with the globalization process and efforts of international cooperation. These steps have led to setting up of a Unani Medicine Chair at the University of Western Cape, South Africa.

(iii) Siddha:

The Siddha System of medicine is one of the ancient systems of medicine in India having its close bedd with Dravidian culture. The term Siddha means achievements and Siddhars are those who have achieved perfection in medicine. Eighteen Siddhars

are said to have contributed towards the systematic development of this system and recorded their experiences in Tamil language.

The Siddha system of Medicine emphasizes on the patient, environment, age, sex, race, habits, mental frame work, habitat, diet, appetite, physical condition, physiological constitution of the diseases for its treatment which is individualistic in nature. Diagnosis of diseases are done through examination of pulse, urine, eyes, study of voice, colour of body, tongue and status of the digestion of individual patients. System has unique treasure for the conversion of metals and minerals as drugs and many infective diseases are treated with the medicines containing specially processed mercury, silver, arsenic, lead and sulphur without any side effects. The strength of the Siddha system lies in providing very effective therapy in the case of Psoriasis, Rheumatic disorders, Chronic liver disorders, Benign prostate hypertrophy, bleeding piles, peptic ulcer including various kinds of Dermatological disorders of non psoriatic nature.

During the last six decades, there has been continuous development in Siddha medical education and this has led to the establishment of the National Institute of Siddha at Chennai as apex Institute having six specialties in post-graduate teaching leading to the award of M.D(S) Degree. These are Maruthuvam (General Medicine), Sirappu Maruthuvam (Special Medicine), Kuzhanthai Maruthuvam (Paediatrics), Gunapadam (Pharmacology), Noi Nadal (Pathology) and Nanju Nool & Maruthuva Neethinool (Toxicology).

For development of focused research in Siddha System of medicine Govt. has constituted Central Council for Research in Siddha (CCRS), an autonomous body by bifurcating Central Council for Research in Ayurveda and Siddha (CCRAS).

(iv) Yoga:

The word "Yoga" comes from the Sanskrit word "yuj" which means "to unite or integrate." Yoga is about the union of a person's own consciousness and the universal consciousness. It is primarily a way of life, first propounded by Maharshi Patanjali in systematic form Yogsutra. The discipline of Yoga consists of eight components namely, restraint (Yama), observance of austerity (Niyama), physical postures (Asana), breathing control (Pranayam), restraining of sense organs (Pratyahar), contemplation (Dharna), meditation (Dhyan) and Deep meditation (Samadhi). These steps in the practice of Yoga have the potential to elevate social and personal behavior and to promote physical health by better circulation of oxygenated blood in the body,

restraining the sense organs and thereby inducing tranquility and serenity of mind and spirit. The practice of Yoga has also been found to be useful in the prevention of certain psychosomatic diseases and improves individual resistance and ability to endure stressful situations. Yoga is a promotive, preventive rehabilitative and curative intervention for overall enhancement of health status. A number of postures are described in Yoga literature to improve health, to prevent diseases and to cure illness. The physical postures are required to be chosen judiciously and have to be practiced in the correct way so that the benefits of prevention of disease, promotion of health and therapeutic use can be derived from them.

Studies have revealed that Yogic practice improves intelligence and memory and help in developing resistance to situations of stress and also help individuals to develop an integrated personality. Meditation can stabilize emotional changes and prevent abnormal functions of the vital organs of the body. Studies have shown that meditation not only regulates the functions of the sense organs but also strengthens the nervous system. Yoga today is no longer restricted to hermits, saints, sages but has gone to every home for the global health promotion. Yoga as a part of peoples' lifestyle has aroused a world-wide awakening and acceptance.

(v) Naturopathy:

Naturopathy is rooted in the healing wisdom of many cultures and times based on principal of natural healing. The principles and practices of Naturopathy are integrated in the life style, if the people observe living close to nature.

Naturopathy is a cost effective drugless, non-invasive therapy involving the use of natural materials for health care and healthy living. It is based on the theories of vitality, boosting the self-healing capacity of the body and the principles of healthy living. Naturopathy is a system of natural treatment and also a way of life widely practiced, globally accepted and recognized for health preservation and management of illnesses without medicines. Naturopathy advocates living in harmony with constructive principles of Nature on the physical, mental, social and spiritual planes. It has great promotive, preventive, curative as well as restorative potentials.

Naturopathy promotes healing by stimulating the body's inherent power to regain health with the help of five elements of nature - Earth, Water, Air, Fire and Ether. It is a call to "Return to Nature" and to resort to a simple way of living in harmony with the self, society and environment. Naturopathy

advocates 'Better Health without Medicines'. It is reported to be effective in chronic, allergic autoimmune and stress related disorders. The theory and practice of Naturopathy are based on a holistic view point with particular attention to simple eating and living habits, adoption of purificatory measures, use of hydrotherapy, cold packs, mud packs, baths, massages, fasting etc.

(vi) Homoeopathy:

Homoeopathy is recognized through the **Homoeopathy Central Council Act, 1973** in India. It was formally propounded and systematized as a distinct new medical system by the German physician, **Dr. Christian Friedrich Samuel Hahnemann** and is based on the principle '*similia similibus curentur*', which means 'let likes be treated by likes'. This imply that disease-producing powers of a substance can be used to treat natural diseases that exhibit similar phenomenon. The core principle of Homoeopathy is *Similia Similibus Curentur*, while the other principles are *Doctrine of Drug-proving*, *Doctrine of drug- dynamisation* , *Theory of chronic diseases*, *Totality of symptoms*, *Direction of cure* and the supporting principles are *Vital force / dynamism*, *Single remedy*, and *Susceptibility / individualization*. Dr. Christian Friedrich Samuel Hahnemann (10th April, 1755 - 2nd July, 1843), was an expert in eight languages and was a studious medical observer. After graduating MD from the University of Erlangen in 1779, he practiced medicine till 1784, but disenchanted with the imperfections of medical practice of that time and left his clinical practice. He had great interest in chemistry and was an acclaimed chemist of that time. He used the talents in languages and chemistry in two main ways to satisfy his great inquisitiveness about the world, other people and their cultures and opened a unique window in to the medical system and traditions of other cultures. He could accomplish translations of great medical works of other cultures and also gain exceptionally wide knowledge of drugs and their uses. In 1790, Hahnemann took to translating *Cullen's Materia Medica*, wherein he came across the medicinal effects of *Peruvian bark*. He was not convinced with the explanation given by Cullen on the fever curing property of Peruvian bark and conducted experiments. Based on the experimental evidences, Hahnemann codified a new paradigm in medical practices and published *the Organon of the Healing Art (Organon der rationellen Heilkunde)* in 1810, wherein he laid the foundation of the theory and method of Homeopathy. **Thus Homoeopathy was born.**

The origin of the word 'Homoeopathy' is from Greek words *hómoios* (similar) and *páthos* (suffering), i.e. 'Similar sufferings'. Major works of Dr. Samuel Hahnemann on homoeopathy are (i) Organon of Medicine (6 editions), (ii) Materia Medica Pura (2 Volumes),(iii) Chronic Diseases and (iv) Collection of his writings known as Lesser Writings.

CONCEPTS AND PRINCIPLES

The Law of Similars - This law demonstrates that the selected remedy is able to produce a range of symptoms in a healthy person similar to that observed in the patient, thus leading to the principle of *Similia Similibus Curentur i.e. let likes be treated by likes*.

The Concept of Single Remedy - This concept directs to choose and administer such a single remedy, which is most similar to the symptoms of the sick person at a time.

The Law of Minimum Dose - The similar remedy selected for a sick should be prescribed in minimum dose, so that when administered there is no adverse effects on the body. It just acts as a triggering and catalytic agent to stimulate and strengthen the existing defense mechanism of the body. It does not need to be repeated frequently.

Holistic as well as Individualistic approach: Homoeopathy teaches that the physicians' interest is not only to alleviate the patients' present symptoms but also his long-term well being. Homoeopathy does not treat disease per se, but focus on mental, emotional and physical aspects of the person who is afflicted with a diseases state. Homoeopathy regards each patient as a unique individual and aimed at the individual's totality of symptoms.

Concept of Vital Force - Homoeopathy believes that the human body is endowed with a life force that reacts against the inimical agents, which produce disease. This life force gets deranged during illness and well selected individualistic remedies stimulate the deranged vital force to health".

Concept of Miasm - *Psora, Syphilis and Sycosis* are the three fundamental causes of all chronic diseases that afflict the human race. Dr. Hahnemann called them as miasms.

Principle of Drug Proving - Proving of the drug is the method adopted to know the curative properties of a substance used as remedies in Homoeopathy. The effect of substances is studied on healthy human beings on a systematic manner, before being applied to the patients. The symptoms thus known are the true record of the curative properties of a drug or the

pathogenesis of a drug. The proving of the drug is the most important method employed to know these powers.

Drug dynamisation or Potentisation - Drugs are prepared in such a way that they retain maximum medicinal powers without producing any toxic action on the body.

DEVELOPMENT IN INDIA

The history of Homoeopathy in India can be traced to the early 19th century, to German missionaries treating people on the shores of Bengal. The first account of treatment, however, is mentioned in the travelogue of John Martin Hongberger, (Late Physician to the Court of Lahore) titled '*35 Years In The East, Adventures, Discoveries etc.*' He treated the legendary Maharaja Ranjit Singh of Punjab in 1839 with Homoeopathic remedies.

The initial success of Homoeopathy in cholera and other epidemics in Bengal in the 19th century made it a known therapeutic system to the common man. Homoeopathic charitable dispensaries and hospitals were opened, and private practitioners, either disciple of experienced homoeopaths or from self-learning started practicing. The system received a further impetus with the establishment of educational institutions and pharmacies²⁵.

The system owes recognition to the concerted efforts of some eminent allopathic practitioners of the time, who opted for Homoeopathy and used it with remarkable success. The efforts of a few institutionally trained homoeopathic physicians also paved the way for the then Bengal Provincial Government to establish the General Council and State Faculty of Homoeopathic Medicine in 1943.

In post independence, the legislatures of Indian States began enacting laws to regulate teaching, practice and research such as the Madras Registration of Practitioners of Integrated Medical Act of 1956 and the Mysore Homoeopathic Practitioners Act of 1961. The Homoeopathic Research Committee constituted in 1963 initiated the process of organized homoeopathic research and identified priority research areas. A combined Research Council to conduct research in Indian Systems of Medicine and Homoeopathy was formed initially (1969), and subsequently, the Central Council for Research in Homoeopathy (CCRH) was formed (1978). The Council identified broad areas of research and evolved protocols over the years to develop Homoeopathy in the country.

The Homoeopathy Central Council Act, 1973 enacted by the Indian Parliament established the legislative mechanism to regulate homoeopathic practice and education in the country. This ensured that physicians are trained as per certain norms and their practice is regulated. The National Institute of Homoeopathy was established at Kolkata (1975) as a model institute for undergraduate & postgraduate education and research. The Homoeopathic Pharmacopoeia Laboratory was also founded in 1975 to lay down principles and standards of preparation of homoeopathic drugs. Due to sustained efforts of the government, an institutional framework of Homoeopathy has been established at the Centre as well as in all the states.

(vii) Sowa-Rig-pa (Amchi Medicine):

“*Sowa-Rig-pa*”, commonly known as Amchi medicine, is the traditional medicine of many parts of the Himalayan region used mainly by the Tribal and bhot people. *Sowa-Rig-pa* (Bodh-Kyi) means ‘science of healing’ and the practitioners of this medicine are known as *Amchi*. *Sowa-Rigpa* is originated out of Ayurveda and is based mainly on the *Ástanga Hridaya*’ treaty which one of the three main Compendia of Ayurveda, was translated in to Tibetan language in 4th century.

In India, this system of medicine has been popularly practiced in Ladakh and Paddar-Pangay regions of Jammu and Kashmir, Lahul-spiti, Pangi, Dhramshala and Kinnar region of Himachal Pradesh, Uttrakhand, Arunachal Pradesh, Sikkim, Darjeeling-Kalingpong (West Bengal).

Sowa-Rig-pa is a science, art and philosophy that provide a holistic approach to health care on the basis of harmony and understanding of human being and universe i.e. the environment. It uses diagnostic techniques for examples pulse and urine examination (eight fold examination) and it embraces the key Buddhist principles of altruism, karma and ethics. According to the Amchi system, proper alignment of the three Dosha, seven body Tissue (seven Dhatus) and three excretory products (Malas) in the state of equilibrium constitutes a healthy body. Any disequilibrium in any of these energies leads to disease or ill-health. Amachi medical theory states that everything in the universe is made up of the five basic elements, namely, sa (Earth), chu (Water), me (Fire), rLung (Wind), Nam-mkha (Space). Amchi system is based on the following three Principle Energies -

(1) *rLung* (wind) manifests the nature of Air element. It is characterized as rough, light, cold, subtle, hard and mobile. It is responsible for the physical and mental activities, respiration, expulsion of urine, faces, foetus, menstruation, spitting, burping, speech, gives clarity to sense organs, sustains life by means of

acting as a medium between mind and body. This is similar to Vata-dosha of Ayurveda.

(2) *mKhris-pa* (Bile) basically has the nature of fire. It is characterized as oily, sharp, hot, light, fetid, purgative and fluidity. *mKhris-pa* is responsible for hunger, thirst, digestion and assimilation, maintains body heat, gives lustre to body complexion and provides courage and determination. This is similar to Pitt-dosha of Ayurveda.

(3) *Bad-kan* (Phlegm) is cold in nature and is characterized as oily, cool, heavy, blunt, smooth, firm and sticky. *Bad-kan* is responsible for firmness of the body, stability of mind, induces sleep, connects joints, generates tolerance and lubricates the body. This is similar to Kapha-dosha of Ayurveda.

The diagnostic techniques in Sowa-Rigpa include visual observation, touch and interrogation. For treatment of health problems, the system makes use of herbs, minerals, animal products, spring and mineral water, moxibustion mysticism and spiritual power. The medicines are used usually in the form of decoctions, powders, pills and syrups etc. Mantra and tantra components are also very important of Sowa-rig-pa.

B. MISSION, VISION AND OBJECTIVES OF MINISTRY OF AYUSH:

The Mission, Vision and objectives of the Ministry of AYUSH are given below:

(i) Mission and Vision:

The vision statement of Ministry of AYUSH is “to position AYUSH systems as the preferred systems of living and practice for attaining a healthy India.”

The mission statement of Ministry of AYUSH is as follows:

To mainstream AYUSH at all levels in the Health Care System.

To improve access to and quality of Public Health delivery through AYUSH System.

To focus on Promotion of health and prevention of diseases by propagating AYUSH practices.

Proper enforcement of provisions of Drugs & Cosmetic Act 1940 and Rules framed thereunder relating to the ASU drugs throughout the country.

(ii) Objectives:

The Ministry of AYUSH has the following objectives:-

Delivery of AYUSH Services
Human Resource Development in AYUSH
Promotion and Propagation of AYUSH Systems
Research in AYUSH
Conservation and cultivation of medicinal plants
Effective AYUSH Drug Administration

C. NATIONAL MEDICINAL PLANTS BOARD (NMPB):

The resource base of AYUSH medicines is largely plants. Increasing global interest in natural remedies has increased the demand for medicinal plants which are mainly sourced from the wild areas. This has led to the emergence of a number of issues like sustainability, conservation, cultivation, quality assurance, protection of Traditional Knowledge, issues related of access and benefit sharing etc. To coordinate all these matters relating to medicinal plants, Government of India has established the **National Medicinal Plants Board (NMPB)** under the Ministry of AYUSH, NMPB is the apex national body which coordinates all matters relating to medicinal plants in the country. The Board was established in November, 2000 and acts as advisory body to the concerned Ministries, Departments and Agencies in strategic planning for medicinal plants related initiatives and to take measures to provide financial support to programmes relating to conservation, cultivation and the all-round development of the medicinal plants sector. The Union Minister of Health & Family Welfare is the Chairperson and the Union Minister of State for Health & Family Welfare is the Vice-Chairperson of the Board.

Functions of the NMPB

- I. Assessment of demand/supply of medicinal plants both within the country & abroad.
- II. Advise concerned Ministries/ Depts./ Organisation / State/ UT Governments on policy matters relating to schemes and programmes for development of medicinal plants.
- III. Provide guidance in the formulation of proposals, schemes and programmes etc. to be taken-up by agencies having access to land for cultivation and infrastructure for collection, storage and transportation of medicinal plants.
- IV. Identification, inventory and quantification of medicinal plants.
- V. Promotion of *ex-situ/in-situ* cultivation and conservation of medicinal plants.

- VI. Promotion of co-operative efforts among collectors and growers and assisting them to store, transport and market their produce effectively.
- VII. Setting up of data-base system for inventory, dissemination of information and facilitating prevention of patents on medicinal use of plants, information on which is already in the public domain.
- VIII. Matters relating to import/export of raw material, as well as value added products either as medicine, food supplements or as herbal cosmetics including adoption of better techniques for marketing of produce to increase their reputation for quality and reliability within the country and abroad.
- IX. Undertaking and awarding of studies leading to scientific, technological research and promoting cost-effective practices for the development of medicinal plants.
- X. Development of protocols for cultivation and quality control.
- XI. Encouraging protection of Patent Rights and IPR.

Schemes of NMPB

- Currently, NMPB is implementing two schemes a Central Sector Scheme for Conservation, Development and Sustainable Management of Medicinal Plants and a Centrally Sponsored Scheme of National Mission on Medicinal plants.

(a) Central Sector Scheme for Conservation, Development and Sustainable Management of Medicinal Plants:

This scheme was approved by the Cabinet Committee on Economic Affairs in its meeting on 26th June, 2008 with a total outlay of Rs. 321.30 crores during the 11th plan.

Objectives of the Scheme

- To promote *in-situ / ex-situ* conservation of medicinal plants which are critical components of the AYUSH and Folk systems of medicine by supporting such programmes in forest/ public/ non-public/ institutional lands.
- To promote R&D for domestication of wild medicinal plants, development of agro-techniques and post-harvest management storage and processing.
- To promote quality assurance and standardization through development of Good Agriculture Practices (GAP), Good Collection

- Practices (GCP), and Good Storage Practices (GSP) and through development of monographs of medicinal plants.
- To develop, implement and support certification mechanism for quality standards, Good Agriculture Practices (GAP), Good Collection Practices (GCP), and Good Storage Practices (GSP).
- To promote sustainable harvesting protocols of medicinal plants from forest areas and certification thereof.
- To support Survey, inventory and documentation of endangered medicinal plants through periodic surveys and inventory.
- Creating Gene banks/ Seed orchards to create an authentic source of seed and germ plasm for future.
- Promote capacity building and human resource development at all levels.
- Adopt a coordinated approach and promotion of partnership, convergence and synergy among R&D; processing and marketing in public as well as private sector at national, regional, state and sub state levels.
- To provide Information, Education and Communication through organization of seminars, trainings and exposure visits within the country and abroad.
- Function as clearinghouse of information on medicinal plants including their occurrence, usage, ethno-botanical uses, cultivation practices and post-harvest practices, markets etc. and dissemination thereof through print and electronic media, printing of brochures, posters and other publicity material.

Important Achievements under the Central Sector Scheme for Conservation, Development and Sustainable Management of Medicinal Plants during 2013-14

- Re-afforestation/conservation of Medicinal Plants in **9087.44** hectares in Forest Areas:
 - 5887.44** hectares under Resource Augmentation
 - 3200** hectares under Medicinal Plants Conservation Areas (MPCAs)
- Set up a network of ex-situ conservation through establishing:-
- No JFMCs supported - **491**
- Supported project for setting up of Herbal Garden, School Herbal Gardens and Home Herbal Gardens.

- Supported Research Studies on:
 - Bioactivity guided fractionation studies
 - Sustainable harvesting
 - Inter-cropping
 - Chemical and Molecular Profiling
 - Production of Quality Planting Material
 - Germplasm and Genotype Identification and Conservation
 - Agronomics & Market dynamics
 - Insect / pest management through bio-control
 - Authentication, multiplication and substitution of Rare, Endangered and Threatened (RET) plants
 - Quality assessment and evaluation of pesticides and heavy metals and
 - Value added products.
- Finalized Volume-II of Agro-Techniques for 32 selected medicinal plants for publication.

(b) Centrally Sponsored Scheme of National Mission on Medicinal Plants

The scheme was approved by Cabinet Committee on Economic Affairs (CCEA), New Delhi in its meeting held on 24th July, 2008 with a total outlay of Rs.630.00 Crores for implementation during the 11th plan. The Scheme is primarily aimed at supporting market driven medicinal plants cultivation on agricultural land with backward linkages for establishment of nurseries, for supply of quality planting material and forward linkages for post-harvest management, marketing infrastructure, certification and crop-insurance in a Mission mode.

Objectives of the Scheme

- To support cultivation of identified medicinal plants through their integration in the farming system and offer an option for crop diversification and enhance income of farmers.
- To support cultivation of medicinal plants following Good Agricultural and Collection Practices (GACPs) for increasing availability of quality raw material
- To support setting up of processing zones/clusters through convergence of cultivation, warehousing, value addition and marketing and development of infrastructure for entrepreneurs to set up units in such zones/clusters.
- To support cultivation mechanism for quality standards, Good Agriculture Practices

(GAPs), Good Collection Practices (GCPs), and Good Storage Practices (GSPs).

- To adopt a Mission approach and promote partnership, convergence and synergy among stake holders involved in R&D, processing and marketing in public as well as private sector at national, regional, state and sub state level.

Mission Strategy

- The Mission aims at adopting an end-to-end approach covering production, post-harvest management, processing and marketing. This is sought to be achieved by promoting cultivation of medicinal plants in identified clusters/zones within selected districts of states having potential for medicinal plants cultivation and to promote such cultivation following Good Agriculture and Collection Practices (GACPs) through synergistic linkage with production and supply of quality planting material, processing, quality testing, certification, warehousing and marketing for meeting the demands of the AYUSH industry and for exports of value added items.

- The Mission also seeks to promote medicinal plants as an alternative crop to the farmers through increased coverage of medicinal plants and with linkages for processing, marketing and testing, offer remunerative prices to the growers/farmers. This will also reduce pressure on forests on account of wild collection.

- Mission seeks to adopt communication through print and electronic media as a strong component of its strategy to promote integration of medicinal plants farming in the agriculture/horticulture systems with emphasis on quality and standardization through appropriate pre and post-harvest linkages.

- Promote and support collective efforts at cultivation and processing in clusters through Self Help Groups, growers cooperatives/associations, producer companies and such other organizations with strong linkages to manufacturers/traders and R&D institutions.

Mission Structure

- The Mission has a two tier structure one at the National and the other at the State Level. The National Medicinal Plants Board (NMPB) in the Ministry of AYUSH is the Nodal Organization at the National Level for implementation of the Mission Scheme.

Technical Standing Committee (TSC)

- A Technical Screening Committee has been constituted under the scheme with the approval of Secretary (AYUSH). The Committee comprises of domain experts from different fields and has representations from the following organizations/ Ministries:

- I. National Horticulture Board
- II. ICAR
- III. CSIR
- IV. Ministry of AYUSH
- V. North Eastern Council, Shillong
- VI. Domain experts nominated by Secretary (AYUSH)- Two
- VII. National Medicinal Plants Body- Member Secretary

The committee examines and recommends action plans submitted by different states.

Standing Finance Committee (SFC)

The Board has a Standing Finance Committee (SFC), which is headed by Secretary (AYUSH). This committee acts as the Executive Committee of the Mission. The committee is the final authority for approval of state action plans recommended by the TSC.

- **State Level Steering Committee for the Mission**

The State level Steering Committee is headed by Addl. Chief Secretary/ Agriculture Production Commissioner/ Development Commissioner at the State level to provide directions and guidance for implementation of the Scheme as well as approve the action plans of the respective states.

Implementing Agencies

The scheme is being implemented in states through State Horticulture Missions designated as Mission Directors who are also the Member Secretaries of the State Level Steering Committees. In some cases, State Govt. has also nominated State Medicinal Plants Boards as Implementing Agencies. Out of 27 States, where the scheme is being implemented presently, 19 Mission Directors are the Directors of Horticulture and remaining 8 are CEOs of SMPBs and other Herbal Boards.

- **Prioritized species of Medicinal Plants**

Board has also prioritized 116 important species of medicinal plants (**Annexure-IV**), which have a potential for cultivation, marketing, trade

and are raw materials for herbal medicines. The commercial cultivation of medicinal plants offers opportunities for crop diversification and income generation to the farmers. However, development of sound agro- techniques for the plants that have traditionally been collected from forests has been a major challenge in promoting cultivation. In this background agro-techniques for some of the important medicinal plants by involving the R&D institutions and universities in the country have been developed.

Achievements of the Mission Scheme during 2013-14

- Established 83 model and small nurseries for production of quality planting material of medicinal plant species.
- Supported cultivation over an area of 33515.60 ha.
- Supported for establishment of 38 numbers of Drying sheds and 40 numbers of Storage Godowns.
- Other infrastructure facilities include setting up of 2 testing laboratories, 17 buy-back intervention and 5 Market promotion.

OTHER IMPORTANT ACTIVITIES

i. Strengthening of State Medicinal Plants Boards :

Financial assistance is being provided to State Medicinal Plants Boards for their day-to-day activities including the monitoring of sanction of sanctioned projects. Through sustained efforts with the UNDP, the latter has funded supply of computers & peripherals to 29 SMPBs in the county. At present 35 State Medicinal Plants Board (**Annexure-V**) are working in different states to implement the schemes of NMPB.

ii. Involvement of Agricultural Finance Corporation Ltd. For 100% 3rd party Monitoring and Evaluation of project sanctioned by NMPB:

NMPB has initiated 100% monitoring of all projects under the Central Sector Scheme for Conservation, Development and Sustainable Management of Medicinal Plants (except R&D) through Agricultural Finance Corporation. This has enabled better utilization of resources as funds are released only to well performing projects.

iii. Setting up Facilitation Centre (FCs) for Extension and Support Services on medicinal plants :

Since SMPBs in States / UTs are not adequately equipped with staff and infrastructure support, NMPB has set up Facilitation Centers in State Agriculture University and R & D Institutions. These centres act as one stop shops for growers and other stake holders and would work in close coordination with SMPBs. Initially, 23 Facilitation Centres were sanctioned out of which 16 remained functional. At present only 8 facilitation centres are working in different parts of the country, which are sanctioned recently.

iv. Good Agriculture Practices and Good Field Collection Practices and Certification

The quality of AYUSH products is critically dependent upon the quality of raw material used for their manufacture. The quality of raw material used, is generally assessed with reference to the adoption of Good Agricultural & Collection Practices. The NMPB has already evolved guidelines on Good Agricultural and Collection Practices (GACPs) based on WHO guidelines.

The National Medicinal Plants Board has developed the Certification Standards and procedures and Scheme of Certification through Quality council of India (QCI). Under the Scheme, any producer / collector / group of producers or collectors can obtain a certificate from a designated Certification Body (CB) and will be under regular surveillance OF THE certification body. The Certification process in general would cover following steps viz. Registration of Application, Evaluation (s),

Grant of Certificate, Market sampling and Renewal of certificate.

The Voluntary Certification in the field of Medicinal Plants Sector would go a long way in improving the quality of raw material to Ayurveda, Siddha and Unani industry and other sister industries.

v. Research & Publications:

Through the research work supported by NMPB, a book on **Agro-techniques for 32 important species of selected Medicinal Plants** was published during the year. Also, seven peer reviewed research papers were published. Five research papers emanating from NMPB supported project were accepted for presentation in an international Scientific Conference held at Boston, USA during March 2014, helping in international acceptability of AYUSH Systems.

vi. Fund Release:

The special campaign for U.C. liquidation has enabled the release of a cumulative amount of Rs. 114.87 crores during 2013-14 under the NMPB schemes (Rs. 61.87 crores under Central Sector Scheme for Conservation, Development and

Sustainable Management of Medicinal Plants and Rs. 53.00 crores under Centrally Sponsored Schemes of National Mission on Medicinal Plants), which is the **highest ever** annual financial achievement by NMPB since inception.

vii. Livelihood Support initiatives:

As an important strategic livelihood initiative during the year 2013-14, NMPB has been able to bring greater focus on **income augmentation** of grass-root communities through value addition / marketing of Medicinal Plants, **especially for States facing the challenge of Left Extremism. As against 142 JFMCs supported between years 2008-09 to 2012-13, for livelihood, four hundred and ninety one JFMCs were supported during 2013-14 (out of which, 435 JFMCs are located in left-extremism effected States).**

viii. Inter Sectoral Issues :

A number of cross sectoral issues related to medicinal plants biodiversity were proactively addressed by systematically contributing to inter-ministerial discussions on Convention of Biodiversity, Nagoya Protocol etc. Our inputs to the National Biodiversity Authority (NBA) in discussions on Access to Genetic Resources and Benefit Sharing have led to a substantial change in the guidelines being drawn up by the NBA on the subject.

ix. EFC Memos :

For restructuring of the Schemes, NMPB has proactively engaged in preparation and meetings related to the Medicinal plant component in the new National AYUSH Mission. EFC Memo for the Central Sector Scheme has also been prepared and circulated to various Departments for comments.

x. RFD Targets & Achievements:

With respect to RFD targets of NMPB, the achievement in almost all cases was significantly higher as compared to the target assigned.

D. RESEARCH COUNCILS:

The Central Council for Research in Indian Medicine and Homoeopathy (CCRIMH) was established in 1969 to carry out research in Ayurveda, Siddha, Unani, Yoga and Homoeopathy under the Ministry of Health and Family Welfare. Later, in 1978, this composite Council was dissolved to pave the way for the formation of four independent Research Councils, one each for Ayurveda and Siddha, Unani, Homoeopathy and Yoga and Naturopathy. The four successor Research Councils were established as autonomous organizations registered under Societies

Act, to initiate, guide, develop and coordinate scientific research, both fundamental and applied, in different aspects of their respective systems. The Research Councils, which are fully financed by the Government of India, are the apex bodies for scientific research in the concerned systems of medicine. The research activities of the Research Councils are monitored and reviewed periodically in order to ensure that the research is focused and that it is undertaken in a time bound manner. The outputs of the research studies are disseminated among educationists, researchers, physicians, manufacturers and the common man.

(i) Central Council for Research in Ayurveda Sciences (CCRAS):

The Central Council for Research in Ayurvedic sciences (CCRAS), Ministry of AYUSH, Govt. of India an autonomous body for undertaking, coordinating, formulating, developing and promoting research in Ayurveda on scientific lines. The activities are carried out through its 30 Institutes/Centres/Units located at different states across the Country and also in collaboration with reputed academic and research organizations. The Broad areas of research comprise Medicinal Plant Research (Medico-ethno Botanical Survey, Pharmacognosy and Tissue Culture), Drug Standardization Research & Phyto-Chemistry, Pharmacological Research (Pre-Clinical, Safety/Toxicity and Bio-logical Activity Studies), Clinical Research, Literary Research & Documentation. The extension activities include Tribal Health Care Research, Health Care Services, Information, Education and Communication (IEC) etc.

The Council's Institutional network includes 8 Institutes in Category 'A' at Gwalior, Cheruthuruthy, Kolkata, Chennai, Bhubaneswar, Hyderabad, Pune & Patiala; 6 in Category 'B' at Guwahati, Jhansi, Lucknow, Bangalore, Vijayawada & Leh; 6 in Category 'C' at New Delhi, Ahmadabad, Thiruvananthapuram, Bangalore, Mumbai & Nagpur; 10 in Category 'D' at Jaipur, Tarikhet, ALRCA Chennai, Gangtok, Mandi, Jammu, Patna, Itanagar, Port Blair and Nagaland.

The main objectives comprise:

1. The formulation of aims and patterns of research on scientific lines in Ayurvedic sciences.
2. To undertake any research or other programmes in Ayurvedic sciences.
3. The prosecution of and assistance in research, the propagation of knowledge and experimental measures generally in connection with the causation, mode of spread and prevention of diseases.

4. To initiate, aid, develop and co-ordinate scientific research in different aspects, fundamental and applied of Ayurvedic sciences and to promote and assist institutions of research for the study of diseases, their prevention, causation and remedy.
5. To finance enquiries and researches for the furtherance of objects of the Central Council.
6. To exchange information with other institutions, associations and societies interested in the objects similar to those of the Central Council and specially in observation and study of diseases in East and in India in particular.
7. To prepare, print, publish and exhibit any papers, posters, pamphlets, periodicals and books for furtherance of the objects of the Central Council and contribute to such literature.
8. To undertake R & D Consultancy projects and transfer of patents on drugs and process to industry.
9. To undertake R & D projects sponsored by industries in public/private sector.
10. To undertake international and interagency collaboration.
For Further details, visit CCRAS Website: www.ccras.nic.in

(ii) Central Council for Research in Siddha (CCRS):

Siddha System of Medicine is an ancient system of Medicine for prevention and cure of diseases and healthy living of human beings. Siddha system of Medicine is based on mukkutram namely Vali (Vatham), Azhal (Pitham) and Iyam (Kabam).

The doctrine of Siddha Medicine is "Food is Medicine and Medicine is Food". According to Siddha System one should always consume food only after complete digestion of food previously taken and shall never be taken in full stomach. One fourth of the stomach is left empty to enhance proper digestion.

The term Siddha means achievement and Siddhars are those who have achieved perfection in medicine. Eighteen Siddhars are said to have contributed to the systematic development of this system and recorded their experiences in Tamil language.

The Siddha system of Medicine emphasizes on the patient, environment, age, sex, race, habits, mental frame work, habitat, diet, appetite, physical condition, physiological constitution of the diseases for its treatment which is individualistic in nature. Diagnosis of diseases are done through examination of tongue, colour, study of voice, eyes, touch, motion, urine, pulse of body and status of the digestion of individual patients. System has unique treasure for

the conversion of metals and minerals as drugs and many infective diseases are treated with the medicines containing specially processed mercury, silver, arsenic, lead and sulphur without any side effects. The strength of the Siddha system lies in providing very effective therapy in the case of Psoriasis, Neuromuscular and Neuro skeletal disorders, Joint disorders, Chronic liver disorders, Benign prostate hypertrophy, bleeding piles, peptic ulcer and various kinds of Dermatological disorders.

Other areas of strength are Varmam, Thokkanam and Kayakalpam procedures. Varmam (Pressure manipulation therapy) is special kind of treatment in Siddha System and specific points being manipulated by pressure with the figure and the pain is relieved and the restricted movement becomes free and active. Thokkanam is another type of treatment which includes applying Oil on the area of swelling and pain and doing massage so that the neuromuscular and musculoskeletal pain and swelling is relieved. Kayakalpam is a special medicine for longevity to keep one always young and energetic by taking simple Herbs like Ginger with honey. Kayakalpam has many types like General kalpam, Special Karpam and Mooligai, Thathu, Jeeva Kalpam mentioned by Siddhars to keep the human beings always healthy and active.

During the last six decades, there has been continuous development in Siddha medical education and this has led to the establishment of the National Institute of Siddha in Chennai. It is an apex Institute having six specialties in post-graduate teaching leading to the award of M.D(s) Degree. The courses are Maruthuvam (General Medicine, Gunapadam (Pharmacology), Sirappu Maruthuvam (Special Medicine), Kuzhanthai Maruthuvam (Paediatrics), Noi Nadal (Pathology) and Nanju Nool & Maruthuva Neethinool (Toxicology). For development of more focused research in Siddha System of Medicine Govt. of India has established Central Council for Research in Siddha (CCRS), an autonomous body by bifurcating Central Council for Research in Ayurveda and Siddha (CCRAS).

The Central Council for Research in Siddha (CCRS) Website: <http://www.siddhacouncil.com>, <http://siddharesearchcouncil.org> is an apex body for the formulation, Co-ordination and scientific validation of Siddha System of Medicine and was established as a separate Research Council w.e.f. September 2010. The research activities of CCRS are carried out through 5 peripheral Institutes / Units in the State of Tamilnadu, Kerala and the U.T. of Puducherry. These units include 1 Central Research Institute at Chennai, 2 Regional Research Institutes at Puducherry and Thiruvananthapuram, 1 Clinical Research Unit at Palayamkottai, 1 Medicinal Plants Garden at Mettur.

This is inclusive of 2 attached hospitals at Chennai and Puducherry; 2 attached dispensaries at Palayamkottai and Thiruvananthapuram. The council concentrates on finding effective and low cost remedies for various disease conditions through systematic research. The research activities of the council include clinical research, fundamental research, drug research and literary research. The main objectives of the CCRS are as follows:

- The formulation of aims and patterns of research on scientific lines in Siddha.
- To undertake any research or other related programmes in Siddha.
- The prosecution of and assistance in research, the propagation of knowledge and experimental measures generally in connection with the causation, mode of spread and prevention of diseases.
- To initiate, aid, develop and coordinate scientific research in different aspects-fundamental and applied aspects of Siddha and to promote and assist institutions of research for the study of diseases, their prevention, causation and remedy.
- To finance suitable researches for the furtherance of objects of the Central Council.
- To exchange information with other institutions, associations and societies interested in the objects similar to those of the Central council and specially in observation and study of diseases in India in particular.
- To prepare, print, publish and exhibit any papers, posters, pamphlets, periodicals and books for furtherance of the objects of the Central Council and contribute to such literature.
- To create Administrative, Technical and Ministerial and other posts under the Society and to make appointments thereto in accordance with the rules and regulations of the Society.
- To undertake R & D Consultancy projects and transfer of patents on drugs and process to industry.
- To undertake R & D projects sponsored by industries in Public / Private Sector.

(iii) Central Council for Research in Unani Medicine (CCRUM):

The Central Council for Research in Unani Medicine (CCRUM) is an autonomous organization under Ministry of AYUSH, Government of India. The Council was established on 30 March 1978 under Societies Registration Act, 1860. However, it started

functioning independently from 10 January 1979. The main objectives of the Council are as follows;

- Formulation of aims and patterns of research on scientific lines in Unani medicine
- To undertake research or any other programmes in Unani Medicine.
- Prosecution of and assistance in research and propagation of knowledge and experimental measures generally in connection with the causation, mode of spread and prevention of diseases.
- To initiate, aid, develop and coordinate scientific research on different aspects, fundamental and applied, of Unani Medicine, and to promote and assist institutions of research for the study of diseases, their prevention, causation and remedy.
- To finance enquiries and researches for the furtherance of objectives of the Council.
- To exchange information with other institutions, associations and societies interested in the objectives similar to those of the Council especially in the observation and study of diseases in the East in general, and in India in particular.
- To prepare, print, publish and exhibit any articles, posters, pamphlets, periodicals and books for furtherance of the objectives of the Council and to contribute to such literature.

The Council's research programmes comprise of clinical research, drug research, literary research and survey and cultivation of medicinal plants. Besides, extension health services and Information, Education & Communication (IEC) activities are also part of the Council's programme. The Council's research activities are being carried out through a network of 23 Institutes/Units functioning in different parts of the country. These include the following:

Central Institute of Unani Medicine (CRIUM)	02	Hyderabad and Lucknow
Regional Institutes of Unani Medicine (RRIUM)	08	Chennai, Bhadrak, Patna, Aligarh, Mumbai, Srinagar, Kolkata and New Delhi
Regional Centres of Unani Medicine,(RRCUM)	02	Allahabad and Silchar (Assam)

Clinical Research Units (CRUs)	06	Bangalore, Meerut, Bhopal, Burhanpur, Kurnool and Edathala
Clinical Research Pilot Project	01	Imphal (Manipur)
Drug Standardisation Research Institute (DSRI)	01	Ghaziabad
Drug Standardisation Research Unit (DSRU)	01	New Delhi
Chemical Research Unit (CRU)	01	Aligarh
Literary Research Institute of Unani Medicine (LRIUM)	01	New Delhi
Total	23	

Besides, five extension centres are also functioning as a part of the above clinical centres with a view to provide treatment facilities to the patients seeking Unani treatment for their ailments. These include two Unani speciality centres at allopathic hospitals in New Delhi, an extension centre of RRC, Silchar at Karimganj (Assam), a Satellite centre of CRU, Edhathala at Kumbalngi (Kerala), an extension centre of CRU, Meerut at Meerut Cantt. Hospital. The Headquarters of the Council is in New Delhi.

The Council is engaged in multifaceted research activities. In the area of clinical research, pre-clinical safety evaluation studies, multicentric randomised controlled trials and comparative controlled trials are being conducted in some common and chronic diseases with main emphasis on diseases of national health priority. Besides, validation studies of Pharmacopoeial/classical formulations in different common and chronic ailments are also continued with a view to establish their safety and efficacy. The Council is also busy in validating the efficacy of some fast acting Unani drugs in different disease conditions. Research studies on different Pathological, Bio-chemical, Physiological aspects are also continued in different disease conditions. Collaborative clinical studies with reputed scientific organization and medical institutions/ Universities are also being undertaken.

Projects on fundamental research correlating the concept of humour and temperaments with physiological, bio-chemical, molecular and genetical aspect in the healthy subjects and in causation of the disease are also continued. Besides, experimental validation of Unani regimetal therapies in Hajamat (Cupping) and Taleeq (Leeching) is also being undertaken in different chronic conditions.

In the area of drug research, work on development of Standard Operating Procedures (SOPs) for method of manufacture of compound formulations followed by their Pharmacopoeial standard is continued. Besides standardization of single drugs is also being done. The monographs of the drugs finalized for SOPs are being incorporated in the Unani Pharmacopoeia of India after the approval of UPC/PCIM. Shelf life studies on compound formulations and re-designing of Unani formulations have also been initiated.

In the literary research programme, collation, editing and translation of classical Unani books is being done. Besides, reprinting of out of print classical books also continued. Disease-wise data base of information available in the Unani classics is also being developed. Work on compilation of standard treatment guidelines of Unani medicine is continued.

In the area of survey & cultivation of medicinal plants, the Council is busy undertaking ethnobotanical explorations of different forest areas collecting information on available medicinal florabesides collecting information on medicinal folk claims from different tribes in the region so as to develop a database of information for further studies. Experimental cultivation of some important medicinal plants is also being undertaken at the Council's herb gardens. Work on digitization of herbarium sheets has also been initiated.

With a view to propagate the Unani system among the masses and to provide treatment facilities to the patients seeking Unani treatment, the Council clinical centres conduct General OPD. This also helps in getting the research feedbacks. These facilities are available at 19 clinical centres of the Council. Besides 10 mobile clinics attached to different institutes / units are also conducting mobile OPD in different adopted mobile pockets in rural areas, urban slums and SC/ST pockets. Health awareness is also created in the population through health lectures, group meeting and school health programme.

Under information, Education and Communication (IEC) activities, the Council organizes conferences, seminars, workshops with a view to disseminate the research outcomes to the practitioners, scholars, students and faculty members of Unani colleges. Besides, the Council also participate in health exhibitions, health camps and AROGYAs with a view to propagate the system among the masses in the country and abroad.

(iv) Central Council for Research in Yoga & Naturopathy (CCRYN):

Central Council for Research in Yoga & Naturopathy (CCRYN) was established in 1978 under the Societies Registration Act, 1860. As per the Memorandum of Association of the Council, the objectives of the Council are as under:

- i. Formulation of aims and patterns of research on scientific lines in Yoga & Naturopathy.
- ii. "To undertake any education, training, research and other programmes in Yoga & Naturopathy.
- iii. The prosecution of and assistance in research, the propagation of knowledge and experimental measures generally in connection with the causation, mode of spread and prevention of diseases.
- iv. To initiate, aid, develop and coordinate scientific research in different aspects, fundamental and applied of Yoga and Naturopathy and to promote and assist institutions of research for the study of diseases, their prevention, causation and remedy.
- v. To finance enquiries and researches for the furtherance of objects of the Central Council.
- vi. To exchange information with other Institutions, associations and societies interested in the objects similar to those of the Central Council and specially in observation and study of diseases in East and in India in particular.
- vii. To prepare, print, publish and exhibit any papers, posters, pamphlets, periodicals and books for furtherance of the objects of the Council and to contribute to such literature.
- viii. To offer prizes and grant of scholarships, including travelling scholarships in furtherance of the objects of the Central Council.

Research Activities:

The Council is involved in carrying out research studies on various aspects of Yoga and Naturopathy with the help of various leading Medical as well as Yoga and Naturopathy institutions. Council has completed 39 research studies, published 12 research monographs and so far 44 research papers have been published by the Council and Principal Investigators.

The Council is now initiating for Intra Mural Research projects to establish efficacy of Yoga and Naturopathy treatment modalities in prevention and management of various lifestyle related disorders/ disease conditions.

Research publication:

S. No.	Title of Monograph
1	Coronary Atherosclerosis Reversal Potential of Yoga Life Style Intervention
2	Clinical Research Profile
3	Yoga and Biofeedback for the treatment of Irritable Bowel Syndrome
4	Research Methodology in Naturopathy & Yoga
5	Yoga For Computer Related Health Problems
6	Yogic Relaxation in the management of Ulcerative Colitis
7	Uni-Nostril Yoga Breathing and Obesity- A study of Efficacy and Mechanisms
8	Effects of Asans and pranayams on Neurological, Neuromuscular & Cardio- Respiratory Functions in Healthy Human Volunteers
9	Autonomic Function Tests in Epilepsy- Effect of Hatha Yoga
10	Assessment of the efficacy of Vipassana Meditation on different age groups: A Polysomnographic & Endocrine Function Evaluation
11	A Randomised Controlled Trail on the efficacy of Yoga in the Management of Bronchial Asthma
12	Research Methodology in Yoga & Naturopathy - II

FELLOWSHIP FOR Ph.D. SCHOLARS

Fellowship @ Rs. 6,000/- p.m. to the scholars pursuing Ph.D. in Yoga and Naturopathy for 3 years under the Scheme of '*Fellowship for Ph.D. Scholars*' is provided.

PROPAGATIONAL ACTIVITIES

i) Participation in AROGYA/ Exhibition/ Health Mela

The Council actively participates in the Arogya exhibitions organized by the Dept. of AYUSH with following activities:-

1. Live Yoga demonstration.
2. Exhibition of Yoga & Naturopathy modalities through posters and transslides.
3. Free distribution of IEC material.
4. Sale of publications and CDs of the Council.
5. Free Consultation.
6. T.V. show of Yoga & Naturopathy modalities and treatments.

ii) Yoga Fitness Classes: The Council has extended its Health promotional activities by providing free Yoga Fitness Classes at Udyog Bhawan, New Delhi and at Integral Health Clinic, D/o Physiology, AIIMS, New Delhi.

iii) Yoga and Naturopathy OPDs: The Council is providing health care services through Yoga & Naturopathy OPDs in the premises of various Medical Colleges & Hospitals, Councils head quarters, CRI Rohini and at Vinoba Niketan, Trivandrum, Kerala.

Yoga & Naturopathy OPDs run by the Council:

1. CCRYN, Headquarters, New Delhi
2. CRIYN, Rohini, Delhi
3. Safdarjung Hospital, New Delhi
4. Dr. R.M.L. Hospital, New Delhi
5. Lady Harding Medical College & Associated Hospitals, New Delhi
6. University College of Medical Sciences, Dilshad Garden, Delhi
7. Pt. B. D. Sharma Post Graduate Institute of Medical Sciences, Rohtak, Haryana
8. Ch. Brahm Prakash Ayurveda Charak Sansthan, Khera Dabar, Delhi
9. Vinoba Niketan, Nedumangad, Trivandrum, Kerala.

(iv) Publications of the Council:

The Council has brought out number of IEC material for benefit of the common man which is very popular among public. The disease specific booklets of the Council viz, Motapa, Uchcha Raktachap, Obesity, Sprouts, High Blood Pressure, Anmol Bol etc. both in Hindi and English are in great demand during Arogya and other Health Melas.

CENTRAL RESEARCH INSTITUTE (CRI):

The Council is in the process of establishing following Central Research Institutes of Yoga and Naturopathy with 100 bedded Hospital facilities to generate sufficient data in support of the potential of Yoga & Naturopathy treatment modalities in the management of various lifestyle related disease conditions.

Various stages of construction of these CRIs are as under:

Central Research Institute (CRI), Nagmangala Karnataka - 1st Phase near completion.

Central Research Institute (CRI), Jhajjar, Bahadurgarh, Haryana - 1st Phase near completion.

Central Research Institute (CRI), Bhubaneswar, Odisha - Alienation of land is at final stage.

Central Research Institute for Yoga & Naturopathy (CRIYN), Delhi - OPD facilities are functional.

(V) Central Council for Research in Homoeopathy (CCRH):

The Central council for Research in Homoeopathy, an autonomous research organization under Ministry of AYUSH, Govt. of India came in to existence in 1978. Over the years, the Council has involve into a premier Research Organization with the objective of undertaking research in Homoeopathy in the fundamental and applied aspects on modern parameters. The council has been carrying out the scientific research through its network of 33 research institutes/units including 4 independent extension units nationwide and in collaboration with other institutes of excellence of allied sciences. Exchanging research information with institutions, organizations and societies with similar aims and propagating research finding through publication and seminars are among important activities carried out by the council.

OUR RESEARCH ACTIVITES

CCRH lays emphasis on multipronged approach to research with diverse research activities.

1. Laying down standards for quality homoeopathy medicine
 - Survey, Collection and Cultivation of Medicinal plants
 - Drug Standardisation
 - Drug Proving
 - Clinical Verification
2. Clinical Research
3. Fundamental and Basic Research
4. Literary Research

OTHER ACTIVITIES

- Documentation and Publication
- Health melas/exhibitions/Arogya melas

SURVEY, COLLECTION AND CULTIVATION OF MEDICINAL PLANTS

Survey of Medicinal Plants and Collection Unit (SMPCU) of CCRH located at Emerald, Nilgiri District Tamil Nadu conducts survey, collection and cultivation of medicinal plants used in Homoeopathy

and supplies raw drug samples to the Central Research Institute (H), Noida and Drug Standardization Unit (H), Hyderabad for standardization studies. Total seventy seven (77) medicinal plants, used in Homoeopathy (64 exotic and 13 indigenous) were cultivated in research garden during the year 2013-14, which is spread in 12.7 acres of land. SMPCU has supplied seven (07) raw drug plant materials to Central Research Institute (H), Noida and Drug Standardization Unit, Hyderabad for drug standardization studies. Seven (07) raw drug plant materials cultivated in the Research Garden, have been sold to various Homoeopathic Pharmacies for total amount of Rupees 86630/- during the period under report.

DRUG STANDARDIZATION

To lay down standards for quality homoeopathic medicines, the drug standardization programme in the Council was initiated in 1979. Drug Standardization ensures quality, safety and efficacy of a drug. It encompasses a number of parameters, which define the quality of homoeopathic drugs and pharmaceutical uniformity. At present, the studies are continued in the Central Research Institute (H), Noida and Drug Standardization Unit (H), Hyderabad for pharmacognostical and physico-chemical evaluation of homoeopathic drugs. Pharmacognostic studies of six drugs and Physico-chemical studies of eight drugs have been undertaken during the year under report.

DRUG PROVING

Drug Proving Programme or Homoeopathic Pathogenetic Trial (HPT), a process unique to Homoeopathy involves proving of Homoeopathic medicines on healthy human volunteers, to ascertain their pathogenetic effects. After proving, the drugs are put to clinical verification to determine their therapeutic usefulness. Council undertakes proving of new drugs as well as the re-proving of the drugs which have been partially proved.

The Drug Proving Protocol based on double blind technique has been prepared by the Council, taking positive leads from protocol being followed by different international homoeopathic organizations. Drug Proving is conducted seven centers of the Council. The proving of the five drugs in 6C & 30C potencies has been completed during the year 2013-14.

CLINICAL VERIFICATION

The symptomatic data obtained by the process of Drug proving needs to be clinically verified before it is included in the homoeopathic Materia

Medica. The Council had undertaken the Clinical Verification programme to clinically verify pathogenetic effects (symptoms) of 85 drugs, including those proved by the Council (23). Studies on these drugs have already been concluded and out of these 52 drugs have been published in the form of a Materia Medica in the name of 'Study of Homoeopathic Medicines through Clinical Verification - A new perspective' in two volumes. The preparation of a Materia Medica on remaining drugs is under progress.

CLINICAL RESEARCH

Under Clinical Research, the Council has traversed a path from long-term observational studies to evidence based observational studies presently Randomized Controlled Trials (RCT), as per the need of the hour.

Keeping in view the present era of evidence based research, Council has taken up studies based on RCT design which is the hallmark of scientific evidence and has focused its efforts to take up time bound studies with pre-defined outcome parameters based upon rigorously designed scientific protocols. The protocols are developed in consultation with the experts in respective fields from All India Institute of Medical Sciences (AIIMS), Indian Council of Medical Research (ICMR), National Institute of Communicable Diseases (NICD), National AIDS Control Organization (NACO) and eminent homeopathic educators and researchers.

Presently, there are 13 ongoing studies, 1 concluded and 1 more study has been proposed for the year under report.

FUNDAMENTAL AND BASIC RESEARCH

Collaborative studies

The Council collaborates with various institutes of excellence in order to conduct evidence-based, inter-disciplinary research studies and to validate the efficacy/concepts of Homoeopathy on scientific parameters. Council has collaborated with reputed institutes like All India Institute of Medical Sciences (AIIMS), School of Tropical Medicine (Kolkata), Central Institute of Psychiatry (Ranchi), Indian Institute of Technology, Defence Institute of Physiology & Allied Sciences (Delhi), Jamia Hamdard (Delhi), Bose Institute (Kolkata), High Security Animal Disease Laboratory (Bhopal), University of Madras (Chennai), Bhabha Atomic Research Centre (Trombay) etc. Some of the major research studies done by Council like presence of nano particles of

source substance in homoeopathic dilution, effect of homoeopathic medicine in heart rate variability, preventive effects of *Belladonna* of Japanese Encephalitis, mechanism of molecular pathway of action of homoeopathic on apoptosis in tumor cells, effect of homoeopathic preparations of *Syzygium jambolanum* and *Cephalandra indica* in management of mice induced with diabetes mellitus, effect of homoeopathic preparation of *Berberis vulgaris* in kidney stone in mice etc. have opened new avenues for future research.

Four studies have been concluded and nine are ongoing under collaborative research and seven publications pertaining to collaborative research.

Extra Mural Research

The Extra Mural Research scheme of Ministry of AYUSH, Government of India aims at providing grant-in-aid to organizations for conducting research in Homoeopathy.

DOCUMENTATION AND PUBLICATION

As a primary mandate, the Council disseminates the outcomes of the accomplished researches through effective documentation and publications. In its endeavor to reach out globally, the Council had already made its journal, Indian journal of Homoeopathic Research (IJRH) as an open access online journal. Continuing with the same venture further during the reporting period, the Council initiated the publication of e-books to make them easily accessible to the researchers and scholars. The purchasing of books from the Council publications has been made speedily available by integrating the payment gateway with Council's website. The important publications of the Council during 2013-14 are listed below:

1. Indian Journal for Research in Homoeopathy
 - Volume 7 No. 2 (April-June 2013)
 - Volume 7 No. 3 (July-September 2013)
 - Volume 7 No. 4 (October-December 2013)
 - Volume 8 No.1 (January-March 2014)
2. CCRH News; Issue No. 66, 67, 68, 69
3. Annual Report (2012-13)
4. Books: Research findings of the Council under Clinical Research, Drug Standardization, Drug Proving and Clinical Verification made available to the practitioners, researchers and students in the form of Books and Monographs- Drug & Disease Monographs. The following books were published during this period:

- Drug Monograph- Alfalfa
 - Homoeopathic Drug Proving: Vol.- 5
 - Vernacular names of Plant Drugs in Homoeopathic Pharmacopoeia of India
5. Handouts-To create awareness among masses about the current health related issues and scope of Homoeopathy as a treatment method. Handouts on 'Benign Prostatic Hyperplasia, Menopause' are published in this year.
 6. A non-priced publication of the Council 'CCRH -An overview: Activities and achievements of CCRH'

E. STATUTORY REGULATORY BODIES:

There is a need to initiate measures to improve the standards of Medical Education by revising curricula to contemporary relevance by creating medical institutions and Centre of Excellence and providing assistance for infrastructural growth. The Department is committed for the development and propagation of Ayurveda, Yoga, Naturopathy, Unani, Siddha and Homoeopathy systems and strives to maintain standards of education in the existing colleges. AYUSH teaching institutions are being provided financial assistance for creating infrastructural facilities as specified in the Minimum Standards Regulations and the regulations of Under-graduate, Post-graduate education and Post-graduate Diploma course issued by Central Council of Indian Medicine (CCIM) and Central Council of Homoeopathy (CCH). So far, total (519) i.e. 331 and 188 colleges/institutions have been permitted by CCIM and CCH respectively to undertake UG /PG courses and these colleges are affiliated with 76 recognized universities throughout the country including three exclusive Ayurveda universities and six Health Universities (**Annexure - VI**).

Regulation of Medical education and maintenance of Central Register of ISM &H are two main functions of these regulatory bodies. There are 48 State Boards of Indian System of Medicine and Homoeopathy (**Annexure -VII**) for registering AYUSH practitioners possessing recognized medical qualifications.

(i) Central Council of Indian Medicine (CCIM):

The Central Council of Indian Medicine is a statutory body constituted under the Indian Medicine Central Council Act, 1970 vide Gazette Notification Extraordinary Part- II Section 3 (ii) dated 10.8.1971. The Government of India vide issuing amendments in the said Gazette Notification has changed the members in 1984, 1995, 2006 and 2011. The main objects of the Central Council are as under:-

- To prescribe minimum standards of education in Indian Systems of Medicine viz. Ayurveda, Siddha and Unani Tib and Amchi System of Medicine.
- To advise Central Government in matters relating to the recognition (inclusion/withdrawal) of medical qualifications in/from Second Schedule to Indian Medicine Central Council Act, 1970.
- To maintain a Central Register of Indian Medicine and revise the Register from time to time.
- To Prescribe Standards of Professional Conduct, Etiquette and Code of Ethics to be observed by the practitioners.

To consider and furnish the recommendations to Government of India on the proposal received from various institutions through Government of India for establishment of new colleges of Indian Systems of Medicine, to increase intake capacity in Under-graduate course/Post-graduate course and to start new Post-graduate course or additional subjects.

Since its establishment in 1971, the Central Council has been framing on and implementing various regulation including the Curricula and Syllabii in Indian Systems of Medicine viz. Ayurved, Siddha and Unani Tib at Under-graduate level and Post-graduate level.

Now all the Colleges of Indian Systems of Medicine are affiliated to 46 Universities in the Country. These Colleges are following the minimum standards of education and Curricula and Syllabii, prescribed by Central Council.

The Central Council of Indian Medicine has prescribed Regulations for Under-graduate and Post-graduate courses of Ayurveda, Siddha and Unani Tib considering that after completion of education, they would become profound scholars having deep basis of Ayurved, Siddha and Unani with scientific knowledge in the fundamentals of respective systems. Through extensive practical training students become an efficient Teachers, Research scholars, Kayachikitsak (Physicians) and Shalya Chikitsak (Surgeons) who are fully competent to serve in the medical and health services of the Country. The Central Council has prescribed the following Regulations:-

Regulations framed by CCIM with the previous sanction of Government of India.

Central Council of Indian Medicine (Election of President and Vice-President) Regulations, 1971.

2.) Central Council of Indian medicine (General) Regulations, 1976 amended in 2012.

3.) Central Council of Indian Medicine (Inspectors and Visitors) Regulations, 1977.

4.) Central Council of Indian Medicine (Central Register of Indian Medicine) Regulations, 1979.

5) Practitioners of Indian Medicine (Standards of Professional Conduct, Etiquette and Code of Ethics) Regulations, 1982.

6.) Indian Medicine Central Council (Minimum Standards Requirements of Ayurveda Colleges and attached Hospitals) Regulations, 2012 thereafter Amendment in 2013.

7.) Indian Medicine Central Council (Minimum Standards of Education in Indian Medicine) (Amendment) Regulations, 1986 for Kamil-e-tib-o-jarahat (Bachelor of Unani Medicine & Surgery) Course, Amendment in 1995, thereafter 2013.

8.) Indian Medicine Central Council (Minimum Standards of Education in Indian Medicine) Amendment Regulations, 2006 for Siddha Maruthuva Arignar (Bachelor of Siddha Medicine and Surgery) BSMS Course amended in 2013.

9.) Indian Medicine Central Council (Post-graduate Ayurveda Education) Regulations, 2005 for Ayurveda Vachaspati MD (Ay.) and Ayurved Dhanwantari (MS-Ay.) amended in 2012.

10.) Indian Medicine Central Council (Post Graduate Unani Education) Regulations, 2007 for Mahir-e-Tib (Doctor of Medicine) & Mahir-e-Jarahat (Master of Surgery).

11.) Indian Medicine Central Council (Post-graduate Education) Regulations, 1986 and further added in 1994 for Siddha Maruthuva Perarignar, MD (Siddha) Course.

12.) Establishment of New Medical College opening of new or Higher Course of Study of Training and Increase of Admission Capacity by a Medical College Regulations, 2003.

13.) Indian Medicine Central Council (Permission to Existing Medical Colleges) Regulations, 2006.

14.) Indian Medicine Central Council (Post-Graduate Diploma Course) Regulations, 2010 and Amended in 2013.

15.) Indian Medicine Central Council (Minimum Standards of Education in Indian Medicine (Ayurved) Amendment Regulations, 2012 and subsequently, 2013.

16) Indian Medicine Central Council (Minimum Standard Requirements of Unani Colleges and attached Hospitals) Regulations, 2013.

17) India Medicine Central Council (Minimum Standards Requirement of Siddha Colleges and attached Hospitals) Regulation 2013.

Amendment in the Second Schedule

Second Schedule to the Indian Medicine Central Council Act, 1970 (48 of 1970) vide Gazette Notification No. S.O. 2366 (E) dated 06.08.2013.

Second Schedule to the Indian Medicine Central Council Act, 1970 (48 of 1970) vide Gazette Notification No. S.O. 2811 (E) dated 26.11.2012.

Second Schedule to the Indian Medicine Central Council Act, 1970 (48 of 1970) vide Gazette Notification No. S.O. 83 (E) dated 28.12.2012.

Status/Number of College

At present there are 260 Ayurved, 08 Siddha and 41 Unani Colleges, affiliated with various Universities of the Country. 78 colleges in Ayurved, 4 in Siddha and 9 in Unani imparting Post-Graduate Education in different specialties.

Central Council has prescribed following courses at Under-graduate and Post-graduate level. Minimum Standards of education and syllabi for different courses for Ayurveda, Siddha and Unani Tib have also been laid down by the Council.

Ayurveda

Ayurvedacharya (Bachelor of Ayurvedic Medicine & Surgery) - 5-1/2 Years
Ayurved Vachaspati (MD-Ayurved) - 3 Years
Ayurved Dhanwantari (MS-Ayurved)- 3 Years
Diploma in Ayurved - 2 years

Unani Tib

Kamil-e-Tib-o-Jarahat (Bachelor of Unani Medicine & Surgery) - 5-1/2 years
Mahir-e-Tib (MD-Unani) - 3 years
Mahir-e-jarahat (MS-Unani) - 3 years
Diploma in Unani - 2 Years

Siddha

Siddha Maruthuva Arignar (Bachelor of Siddha Medicine & Surgery) - 5-1/2 years
Siddha Maruthuva Perignar (MD-Unani) -3 years.

As per provision of Section 14(2) of IMCC Act, 1970 following qualifications have been included under 2nd Schedule to the IMCC Acts, 1970.

CENTRAL REGISTER OF INDIAN MEDICINE.

Preparation and maintenance of Central Register of Indian Medicine is one of the main objects of the Central Council. As per provisions of the IMCC Act, 1970, Central Council is maintaining a Central Register in the prescribed manner, which is containing, the names of persons who are enrolled on any State Register of Indian Medicine and who possess any of the recognized medical qualifications included in the Schedules to the Indian Medicine Central Council Act, 1970. The maintenance of Central Register of Indian Medicine and updating of the same is a continuous process.

(ii) Central Council of Homoeopathy (CCH):

The Central Council of Homoeopathy is a corporate body constituted by the Government of India under the provisions of Homoeopathy Central Council Act, 1973 (website: www.cchindia.com). This council is comprised of members elected from the States/U.T.s and from Faculties/Departments of Homoeopathy in Universities and of members nominated by the Central Government. Its main objectives are:

- Maintenance of a Central Register of Homoeopathic Practitioners in the country.
- Regulation of Medical education in Homoeopathy.
- Prescribing standards of professional conduct, etiquette and a code of ethics for the practitioners of Homoeopathy.
- Recommending recognition and / or withdrawal of recognition of medical qualification in Homeopathy awarded in India.
- Recommending recognition of medical qualification in Homoeopathy awarded outside India on reciprocal basis.
- Recommending for approval of a new college, or increase of seats of starting of new or higher courses in existing colleges.

(a) Regulation of Medical Education of Homoeopathy:

The Homoeopathy Central Council Act, 1973 was amended in 2002 (but amendments were enforced w.e.f. 28.1.2003) and the power to grant permission for starting new colleges, introducing new or higher courses of study and increasing the number

of seats in a college has been vested with the Central Government on the recommendation of Central Council.

The Regulations of HCC Act, 1973 prescribed for Under Graduate degree course 'Bachelor of Homoeopathic Medicine and Surgery (BHMS)' (5 ^{1/2} years), and a (bridge) graded degree course BHMS of 2 Years and at Post Graduate level M.D. (Hom) courses (3 years) in seven specialty subjects are continuing. Following are the relevant Regulations:-

- Homoeopathy (Degree Course) Regulations, 1983 further (amended in 2003 and 2005 respectively).
- Homoeopathy (Graded Degree Course) Regulation, 1983 (amended in 2001).
- Homoeopathy (Post Graduate Degree courses) Regulations, 1989, (amended in 1993, 2001 & 2012 respectively).

The Central Council of Homoeopathy enforced the Establishment of New Medical College (opening of New or Higher course of Study of Training and Increase of admission capacity by a Medical College) Regulations 2011 to deal with the matters of opening of new colleges or increase of seats or starting of new or higher courses in existing colleges.

In supersession of its earlier Regulations namely Homoeopathy (Minimum standards of Education Regulations), 1983, the Central Council notified Homoeopathy Central Council (Minimum Standards Requirements of Homoeopathic Colleges and attached Hospitals) Regulations, 2013 which are to be fulfilled by the existing colleges. The Central Council monitors the standards of education by way of inspections of Homoeopathic Medical Colleges and attached hospitals as well as of Examinations conducted by the Universities for above mentioned course.

(b) Central Register of Homoeopathy:

Under the provisions of Homoeopathy Central Council Act, 1973, The Council has the responsibility to maintain the Central Register of Homoeopathy in two parts (Part I and Part II), Part I contains the names of all the persons who possess any of the recognized medical qualification in any State Register of Homoeopathy and Part II contains the names of all persons other than those included in Part I who were enrolled on before the commencement of the provisions of the Homoeopathy Central Council Act, 1973 in different States / U.Ts. Direct registration is

also done by Central council as per its Registration Regulations, 1982. As reported by State Governments, there are about 2.50 lakh Homoeopathic doctors in the country.

(c) Code of Ethics:

The Central Council has also laid down Homoeopathic Practitioners (Professional) Conduct, Etiquette & Code of Ethics) Regulations, 1982 which have to be followed by Homoeopathic Practitioners.

F. NATIONAL INSTITUTES:

National Institutes in various AYUSH systems have been set up by the Central Government to set benchmarks for teaching, research and clinical practices. Upgrading these National institutes into Centres of Excellence has been a constant endeavour of the Department. There are three National Institute under Ayurveda system, whereas, one National Institute exists each in Unani, Siddha, Yoga, Naturopathy and Homoeopathy systems.

(i) National Institute of Ayurveda (NIA), Jaipur:

National Institute of Ayurveda, Jaipur established in 1976 by the Government of India, is an apex Institute of Ayurveda in the country to develop high standards of teaching, training and research in all aspects of the Ayurvedic System of Medicine with scientific approach (website: www.nia.nic.in). It is affiliated to the Rajasthan Ayurved University, Jodhpur. The Institute is conducting an Under-Graduate Course (BAMS) (92 Seats). The Institute is also conducting a three year Post-Graduate Course "Ayurveda Vachaspati" (M.D./M.S.Ayurveda) in 14 Subjects, viz. Dravya Guna Vigyana, Kayachikitsa, Kaumarbhritya, Panchakarma, Rasa Shastra and Bhaishajya Kalpana, Roga and Vikriti Vigyan, Maulik Siddhanta (Samhita), Shalya Tantra, Sharir Kriya, Sharir Rachana, Swastha Vritta, Shalakyta Tantra, Prasuti, Stri Roga and Agad Tantra with admission capacity of 104 students. The Institute also grants regular Fellowships leading to the award of Ph.D.(Ayurved) in 14 Subjects, viz. Kaya Chikitsa, Shalya Tantra, Maulik Siddhanta, Rog & Vikrati Vigyan, Dravya Guna, Sharir Kriya, Panchakarma, Rasa Shastra, Kaumar Bhritya, Prasuti Tantra-Stri Roga, Sharir Rachana, Agad Tantra, Shalakyta and Swasthritta. The Institute also conducts a Diploma Course in Ayurveda Nursing and Pharmacy of two and a half years duration with an intake capacity of 30 seats annually and 3 months Panchakarma Attendant Training Course in Classical and Keraliya Panchakarma Procedure with an intake capacity of 20 Seats (10 for SC and 10 for others). Besides, the Institute is involved in Clinical Research. The Institute has 2 Hospitals with a Bed Strength of 300. It also

has a separate fully equipped Panchakarma unit and also Speciality Clinics like Geriatrics & Dietetics, Nature Cure, Diabetic, Allergic, Child Mental Health and Centre of Excellence for Musculoskeletal Disorders and a Centre of Excellence for Eye Diseases in collaboration with Sreedhareeyam of Kerala. There is a Central Laboratory for various types of patient investigations including TMT, ECG etc. The Institute has a Satellite Clinic in a popular residential-cum-commercial area of Jaipur (Jawahar Nagar). NIA is also conducting Short Term Training Course for Foreign Medical and non-medical Professionals. More such collaboration projects with some foreign countries are also in the pipeline.

The Institute has entered into MOU with the University of Connecticut, School of Medicine and International Society for Ayurveda and Health Farmington USA, MOU with the Gerontology Science Coordination Center Nyiregyhaza Hungary, MOU with the West Indies University, for Collaboratin in Ayurveda Teaching, Training, Research, Treatment, Publication, exchange of experts, etc.

(ii) Rashtriya Ayurveda Vidyapeeth (RAV), New Delhi:

The Rashtriya Ayurveda Vidyapeeth, New Delhi, an autonomous organization, registered under Societies' Act, was established in 1988 (Website: www.ravdelhi.nic.in) The RAV imparts practical training to Ayurvedic graduates and post graduates through the Guru-Shishya Parampara i.e. the traditional method of transfer of knowledge. There are two types of courses i.e. MRAV & CRAV.

The Member of Rashtriya Ayurveda Vidyapeeth (MRAV) is two year course to facilitate literary research for acquisition of knowledge of Ayurvedic samhitas and commentaries thereon in order to enable the students (who have completed post graduation in Ayurveda) to become good teachers, research scholars and experts in Samhitas. The students, who have completed post graduation in Ayurveda are admitted for critical study on Samhita, related to their P.G. studies.

The Certificate course of RAV (CRAV) is a one-year course of Rashtriya Ayurveda Vidyapeeth run in three specialties viz 1) Ayurvedic clinical practices (Kayachikitsa, Asthi chikitsa, Shallya, Salakya, Streeroga) 2) aushadh nirman (Classical methods drug manufacturing/ pharmaceuticals) and 3) dravyaguna (Medicinal plants and Ayurvedic Clinical Pharmacology). The candidates possessing Ayurvedacharya (BAMS) or MD/MS (Ay) from the institution/ college and university included in 2nd schedule of IMCC Act-1970 are eligible for CRAV course. In this course the age limit for BAMS students is 27 year and for P.G. it is 30 years, they are trained

under eminent Vaidyas in Ayurvedic clinical and other practices to make them experts in clinical skills

The Vidyapeeth organizes Seminars to discuss the latest development and research in Ayurveda for the benefits of practitioners and researchers. The Vidyapeeth also conducts Interactive Workshops for the discussion of debatable topics of Ayurveda between students and teachers so as to provide clarity for further utilization in the fields of education, research and patient care. Besides that, the Vidyapeeth conducts training programmes for Ayurvedic teachers on Samhita based clinical diagnosis.

The Vidyapeeth is also assisting the Ministry of AYUSH in implementing Central Sector Scheme of Continuing Medical Education (CME) in AYUSH systems all over the country to update the teachers, doctors, paramedics and other personnel in advances made in AYUSH sectors facilitating them to render better services.

(III) Institute of Post Graduate Teaching and Research in Ayurveda (IPGT&RA), Jamnagar (GUJARAT):

After independence; this was the first central organization established by Govt. of India as Central Institute for Research in Indigenous System of Medicine (CIRISM) in 1953. In 1956 another Institute named as Post Graduate Training Centre in Ayurveda was established at Jamnagar by the Govt. of India and both were merged in 1962, called as institute for Ayurvedic Studies & Research (ISAR). This institute was handed over to Gujarat Ayurved University on lease in 1970 for administration after the establishment of Gujarat Ayurved University (website;www.ayurveduniversity.com). Post Graduate of this Institute are managing various premier Institutions of Ayurveda in India and abroad as well. Presently this institute is fully financed by Govt. of India under central finance scheme and governed by the acts and statute of Gujarat Ayurved University. Board of Post Graduate Teaching & Research in Ayurveda is the governing body for the Institute.

The Institute has been recently recognized as WHO Collaborating Centre for "Traditional Medicine (Ayurveda), first and only WHO - cc for Ayurveda all over the world. The Institute has conducted various projects under WHO collaboration. Under this scheme Institute has prepared Manual on simple Ayurvedic herbal formulations for common ailments, International Catalogue of Ayurvedic Publications, Standardization of Ayurvedic Clinical Terminology, Model Recruitment and promotion rules for AYUSH Personnel and Development of Pharmacovigilance

Programme for Ministry of AYUSH for which this institute has been recognized as National Pharmacovigilance Resource Centre for AYUSH.

At present, the institute is having 10 departments (offering post graduate degree in 13 specialties) and six well established laboratories with 50 admission capacity in P.G. course of Ayurveda. Institute also conducts M. Pharma (Ayurveda) and M.Sc. (Medicinal Plants) course as self financed.

AYU Journal: Institute is publishing quarterly peer reviewed journal 'AYU', Four issues of the journal have been published during the year. 'AYU' journal has been included in PubMed and is freely available on web www.ayujournal.org.

The students and faculty of the Institute publishes their work in different national & international journal in current reporting year; around 150 articles, 3 books have been published.

Institute is conducting researches at many levels. Other than MD, M. Pharma, M.Sc. and Ph.D. Projects, projects under ***Academia - Industry Partnership*** are also being conducted.

This institute is recognized as an International hub of Ayurveda. Every year more than 50 foreigners visit for various of short and long term courses. University has MoUs with more than 10 International organization for which I.P.G.T. & R.A. is the implementing agency.

This Institute has a well-managed Hospital with O.P.D. and I.P.D. and I.P.D. facilities. In 2007 OPD strength was around 1.35 Lac which is increased to more than 2 Lacs during this year. Daily average patient attendance has increased to 800 per day. The average bed occupancy of 180 bedded hospital was more than 68%. Departments like Panchakarma, Stree Roga & Prasooti Tantra, Kaumarbhritya and Shalya Tantra, Shalakyia Tantra provides specialized treatment facilities to the needful. Cases of Thalassemia, mental retardation, attention deficit hyperactivity etc. are being studied in kaumarbhritya.

The Institute is organizing various outreach activities for National programs and conducted medical camps in rural areas of Gujarat. This Institute has adopted nearby KONZA Village under AYUSH outreach services. This Institute attained a special mile stone by conducting weekly OPDs at all the three Defense establishments in Jamnagar. Total 7 satellite clinics in the form of weekly O.P.D.'s are being conducted at Sasoi garden, Indian Naval Services, Valsura, Air Force Base, Army Camp, district jail, KONZA Village and old age home, situated at Jamnagar.

The institute is trying its best to set the highest standards of teaching and research in Ayurveda. Institute has continuously increased hospital OPD and IPD attendance of patients and serving the goal of popularizing the Ayurveda and better health care of citizens.

(iv) National Institute of Unani Medicine (NIUM), Bengaluru:

National Institute of Unani Medicine, Bangalore, an autonomous organization under the Dept. of AYUSH, Ministry of Health & Family Welfare, Government of India, is established as a premier institute for the development and growth of Unani System of Medicine in terms of teaching, training, research and patient care.

The campus of the institute is spread over 50 acres of land and houses Academic Block, Administrative Block, Residential Blocks, Library, Guest House, Indoor Games Hall, separate boys' and girls' Hostels, Canteen, Hospital, Pharmacy, Animal House, Drug Museum cum Herbarium, Herbal Garden, Central instrumentation facility laboratory, Drug Standardization Laboratory, and certain other laboratories. The institute has recently got constructed a 300 seat capacity auditorium, and Regimental Therapy Block to give more and more facilities to the patients.

The Institute is affiliated to Rajiv Gandhi University of Health Science, Karnataka and offers post graduate courses in six disciplines of Unani Medicine, viz. Moalejat (Medicine), Ilmul Advia (Pharmacology), Tahafuzzi wa Samaji Tib (Preventive and Social Medicine), Amraze Niswan wa Qabalat (Obstetrics and Gynecology), Ilmus Saidla (Unani Pharmacy) and Kulliyat Umoore Tabbiya (Basic principles of Unani Medicine). Post graduate courses in two more disciplines, viz. Ilaj Bit Tadbeer (Regimental Therapy) and Jarahat (Surgery) are likely to be started in this session. The institute has already taken up the matter with Ministry of AYUSH about opening remaining six departments and also UG course from coming years. Proposal for Ph.D. in Unani Medicine has already been submitted to the affiliating University which is likely to be approved by the university. The institute is trying its best to set the highest standards of teaching and research in Unani System of Medicine and is serving the goal of popularizing the Unani Medicine and better health care of citizens.

The Hospital of the institute has an OPD wing and a 180 bed IPD wing with separate male and female wards. Clinical services are provided to the patients from general OPD and speciality OPDs for skin diseases, GIT and Hepato-Biliary disorders,

Neurorehabilitation, Psychiatric and Geriatric care. Besides, a separate unit for regimental therapy has also been established in the hospital. The hospital is able to attract patients not only from various parts of Karnataka but also from neighbouring states.

The departments of the institute are engaged in conducting research to validate Unani concepts and generate data for safety and efficacy of Unani drugs. The main areas of researches are pre clinical, clinical and basic principles of Unani System of Medicine. The quality of research is maintained by the Institutional Ethics Committee for Biomedical Research, Animal Ethics Committee, and Scientific Advisory Groups. Research papers of faculty members and P.G. Scholars are regularly published in standard national and international journals. The Institute publishes a Bi-annual peer reviewed Journal namely, 'Journal of Research in Unani Medicine' and a Newsletter.

The Institute regularly organizes academic events like CMEs, Workshops, Seminars and Guest Lectures. Faculty members are also deputed to various training programmes to update their technical and professional skills. The institute actively participates in AROGYA Melas held across the country to popularize Indian systems of Medicine.

(v) National Institute of Siddha (NIS), Chennai:

National Institute of Siddha, Chennai established in 2004, as an autonomous organization under the control of Ministry of AYUSH, Government of India, is being developed as a Center of Excellence for Siddha system of medicine (website: www.nischennai.org). The Institute has been established by the Government of India as a joint venture with the Government of Tamil Nadu under the Societies (Registration) Act, 1975.

The Institute conducts Post-graduate courses in Siddha in six specialized branches of Siddha viz. 1) Maruthuvam 2) Gunapadam 3) Sirappu Maruthuvam 4) Kuzhandai Maruthuvam 5) Noi Naadal and 6) Nanjunoolum Maruthuva Neethinoolum with varying admission capacity of 7-8 in each branch and altogether 46 including 1 from BIMSTEC countries.

Presently 46 students (Siddha graduates) get admitted every year in the first year of the M.D (Siddha) course in the aforementioned 6 branches through a separate entrance examination conducted by NIS. The sanctioned strength of faculty members is Professor-6, Associate Professor-12, Assistant Professor-10 and Lecturers-18. Separate hostels for men and women students and also for staff-nurse are available within our campus. Solar water heater, a

man-made pond, sewage water recycling plants, herbal house, animal house, auditorium, library and a guest house are other facilities available in NIS. The bed strength in Ayothidoss Pandithar hospital attached to NIS has been increased from 160 to 180 during the year. The hospital provides 24-hour medical care to patients and used for conduct of research to develop, promote and propagate Siddha system. The bed occupancy records 96% during 2013-14 and varies from 78% to 108% during different months of the year. Outpatient Department caters to the medical need of 1500-1600 patients daily and more than 2000 patients on week-ends. Number of patient visits reported in OPD during 2013-14 was 5,80,944 patients, of whom 52% and 48% were males and females respectively. The average OPD reporting per day during 2013-14 was 1592 patients which was a significant increase from 1323 during 2012-13. Siddha dispensary, laboratories of Clinical Pathology, Microbiology, Biochemistry and Pharmacology are functioning in the hospital. X-ray and ECG services are also available for patient care activities. Special Siddha therapies such as Varmam, Thokkanam, Yogam, Otradam, Ennai Kattu, Suttigai, Peechu, Kombu Kattal, Leech therapy etc. are available for the treatment of neuromuscular, skeletal and joint disorders, etc. Weekly special OP clinics-Geriatrics, Cancer, Infertility and Yoga are being conducted for the benefit of the public. Surgical correction by Karanool (Kara Suthra) is available in the Institute. The geriatric patients reporting in the special weekly OP has increased from 350 to 500 patients during 2013-14. Two weekly mobile Siddha clinics are conducted in rural and semi-urban areas of old Perungalathur and Rajakilpakkam respectively as adopted areas of NIS.

NIS is affiliated to The Tamil Nadu Dr.M.G.R.Medical University, Chennai. NIS has also been recognized as a Center for Ph.D studies by the same University. At present 6 full time Ph.D scholars and 21 part-time Ph.D scholars (our faculty members) are pursuing their research studies under 6 professors who have been recognized as guides by The T.N.Dr.M.G.R.Medical University. The research projects of NIS are reviewed and monitored by Scientific Advisory Committee, Institutional Ethics Committee and Institutional Animal Ethics Committee. NIS is publishing periodically 'Journal of Siddha' (Half yearly) and 'NIS Newsletter'(Bimonthly). NIS is developing as a centre of excellence and a referral institute for everything in Siddha. By way of conducting Continuing Medical Education (CME) programmes for Teachers and Doctors, NIS is catering to the academic needs and professional skills of the members of the teaching faculty as well as doctors who are rendering health care services to

people. NIS is participating in all AROGYA fair conducted with support of Ministry of AYUSH for promotion and propagation of Siddha. The faculty members are also participating in the Doordashan television programmes and All India Radio programmes for promotion of Siddha as well as increasing health awareness amongst public.

(vi) Morarji Desai National Institute of Yoga (MDNIY), New Delhi

Morarji Desai National Institute of Yoga (MDNIY) is an autonomous organization registered under the Societies Registration Act, 1860 and fully funded by Department of AYUSH, Ministry of Health & Family, Govt. of India, MDNIY is a focal Institute for Planning, training, promotion and coordination of Yoga Education, Training, Therapy and Research in all aspects. The erstwhile Central Research Institute of Yoga (CRIY) was established in 1976 and that has been later elevated to the status of National Institute of Yoga in 1997 and further renamed as Morarji Desai National Institute of Yoga in 1998.

The objectives of the Institute are:

- To act as a Centre of Excellence in Yoga;
- To develop, promote and propagate the science and art of Yoga; and to provide and
- To provide and promote facilities of training, teaching and research to fulfill the above two objectives.

The vision and mission of the Institute is Health, Harmony and Happiness for all through Yoga, The Institutes provides the best of Teaching, Education, Training, Therapy and Research facilities to Yoga aspirants. The aim of the Institute is to promote deeper understanding of Yoga philosophy and practices based on classical Yoga amongst the people.

The Institute is having the following Teaching Departments:

1. Department of Yoga Education
2. Department of Yoga Therapy
3. Department of Yoga Philosophy
4. Department of Human Consciousness
5. Department of Anatomy
6. Department of Human Physiology
7. Department of Allied Sciences
8. Department of Languages

The Teaching Departments are supported by other following Departments:

1. Department of Yoga Research
2. Department of Communication & Documentation
3. Department of Administration

Achievements

- ❖ Morarji Desai National Institute of Yoga (MDNIY) has been designated as WHO Collaborating Centre (WHOCC) in traditional Medicinal (Yoga) from 5th April, 2013 for a period of four years. The work related to the four Work-plans has been started.
- ❖ MDNIY has started B.Sc. (Yoga Science), a regular course of three years duration (06 Semesters) with affiliation from GGSIP University, Delhi from the academic session 2012-13 with intake capacity of 60 students. 2nd batch of the course is continues.
- ❖ MDNIY is conducting Diploma in Yoga Science (DYSc.) for Graduate of one year duration with intake capacity of 120.
- ❖ Institute has started conducting Centre Course in Yogasana as well as Certificate Course in Pranayama and Mediation, three months (part-time) course from January, 2014.
- ❖ The Institute conducts Foundation Course in Yoga Science for Wellness (FYSW) of one month duration (part-time for general public. Total 24 batches have been completed during the years 2013-14.
- ❖ Total 13 Yoga Training and Therapy Programmes are also being conducted in the Institute of one hour each from 6:00 A.M. to 6:00 PM on all working days.
- ❖ Four Yoga Therapy Centres in AYUSH/Allopathy Hospitals are being continued in Delhi and NCR.
- ❖ Preventive Health Care Units of Yoga have been established in 20 CGHS Dispensaries in Delhi and NCR are being continued.
- ❖ Swami Vivekananda District Yoga Wellness Centre through Public Private Partnership (PPP) have been established in 129 districts of the country.
- ❖ National Yoga Week, a mass awareness programme for Health, Happiness and Harmony through Yoga is being conducted every year in the month of February. The last event was on the

theme of Yoga For Youth was organized from 12-18 February, 2014.

WHO Collaborating Centre;

The Institute has been designated as WHO Collaborating Centre in Traditional Medicine (WHOCC No. IND-118) since April, 2013. MDNIY has attained the privilege to be the only WHO Collaborating Centre in the world to engage in achieving Yoga specific outcomes. Considering the global demand and popularity of Yoga for health care, MDNIY has a lot to offer as WHO Collaborating Centre by generating information and documents of Yoga for the use of all Member States of WHO. This is a vintage point for the Institute to indulge in focused activities and yield globally acceptable outcomes.

The four terms of references are:

- I. To serve as Yoga resource centre for information exchange on Yoga within the country and for other countries.
- II. To assist and work with WHO in developing standards for promoting national use of Yoga.
- III. To develop and practice materials for advocating evidence based use of Yoga.
- IV. To conduct customized training programmes for national and international health professionals and WHO fellows about the utility of Yoga in health promotion.

The Institute provides the best Teaching, Education, Therapy and Research facilities of Yoga aspirants. The aim of the Institute is to promote deeper understanding of Yoga Philosophy and practices based on classical Yoga amongst the people. Yoga training programmes are conducted in the Institute and outside for the general public, working executive, women, children etc. Different Yoga therapy programmes as well as Individual Yoga therapy sessions are also being conducted in the institute for patients have different disorders.

MDNIY is housed a state-of-the art complex with air conditioned and ultra-modern building which includes Auditorium, Conference Hall, Kriya Block, Class Rooms, Lecture Halls etc. with properly equipped teaching facilities. The Institute provides conducive environment for Yoga sadhana, Yoga Therapy OPD, Pathology Labs, etc. MDNIY is running an OPD attached with Pathological & Biochemistry Lab, Sleep Lab and an X-Ray unit.

The Institute is also participating in National and International events like Health exhibitions, AROGYA, Health Melas, Festivals, Seminars,

Conferences etc. It is involved in propagation of Yoga through print and electronic media. It has brought out 10 diseases-wise booklets for the benefit of the public and Yoga manual for Medical Professional/Students has published.

(vii) National Institute of Naturopathy (NIN), Pune:

National Institute of Naturopathy, Pune registered under the Societies Registration Act 1860 was established in 1986 at Babu Bhawan with an objective of promotion and propagation of Naturopathy in the country and to encourage research in the field of Naturopathy medicine for prevention and cure of diseases and promotion of healthy living (website: www.punenin.org).

NIN has an OPD clinic with free consultation services where various Naturopathy treatments are given to the patients at very subsidized rates. About 300 patients avail these treatment facilities daily. The institute also conducts 8 batches of Yoga classes daily. NIN is conducting a Mini Gym where health seekers from general public and patients are given service. The Institute publishes "Nisargopachar varta" a bilingual magazine (Hindi / English) every month. NIN has a Library with lending and reading facilities with 9000 books and national and international journals.

A Health Shop is being run on self sustaining basis in the institute where natural food, drinks and chemical-free products are made available to the public. Also, books on naturopathy, Yoga and other Health subjects and various instruments used in the treatment of Naturopathy are sold here. NIN is running a Naturopathic Diet Centre, on self-sustaining basis providing diet facilities to the general public and patients who visit this institute.

NIN is regularly conducting lecture classes on various Health subjects on every Saturday. NIN conducts one full day workshop on last Saturday of every month on any one disease, its cause and remedies. NIN conducts an exclusive full day workshop on 3rd Saturday of the month in any one of the regional languages of India.

The institute is conducting One-Year full-time "Treatment Assistant Training Course" (TATC) for male and female youth having passed 10th standard, age between 18 to 30 years, with a monthly stipend of Rs. 3000/- NIN is conducting Two years full time "Nursing Diploma in Naturopathy and Yoga Therapy" course (NDNYT) for male and Female youth having 12th passed with Biology with a monthly stipend of Rs.

5000/- NIN is giving internship training to BNYS internees regularly.

NIN conducts Continuous Medical Education (CME) programme and periodic workshops on Research Methodology for Naturopathy graduates. NIN conducts orientation training programme on Naturopathy and yoga for doctors of other systems of medicine. NIN also conducts Women empowerment programme for Lady doctors and other Common women.

NIN participates in exhibitions all over India to propagate and promote the science of Naturopathy. NIN also organizes Natural Health Food Fair and Yoga Naturopathy seminars with demonstration of Yoga and exhibition of more than 150 delicious dishes.

A unique activity of NIN is the sanatorium, for HIV+ve individuals at Panchagani where PLHA are treated under Naturopathy and Yoga life style modification and treatment modalities. The patients undergone treatment here are largely benefitted,

NIN organizes "Cookery Classes" every year at the Institute. Preparation of variety of Juices, salads, non-spicy oil free subbies and main course food items are taught in these classes with demonstration and full participation of the participants.

Free Acupressure Treatment is being given to the patients, daily between 2 to 5 p.m., six days a week. NIN has an acupuncture unit where the treatment is available at the rate of Rs.300 and Rs.70 for weekly and daily sitting respectively. NIN has the facility for traction at the rate of Rs.300 per week or Rs.70 per day.

NIN has re-printed the text book "Rational Hydrotherapy" written by the American author Dr. J. H. Kellogg NIN has brought out a 2nd Edition of the book on Naturopathic diet and recipes which is highly preferred by the public. NIN has also Published a Hand Book on Basic Yoga for Beginners.

Gandhi Jayanti is celebrated by observing Naturopathy day & group fasting by staff and general public, garlanding of Gandhiji's statue at the Institute and at Pune Railway Station followed by a rally with the theme "Gandhian Philosophy and Naturopathy", conducted a free Seminar on "Gandhian Philosophy and Naturopathy", and organized drawing competition for the children of different age groups.

New Outpatient Department is completed at NIN with modern naturopathy treatments facilities. Department of Health, Govt. of Maharashtra has earmarked about 25 Acres of Land in Pune to hand over to NIN for starting the Naturopathy College,

Hospital and Research Unit by NIN. The Decisions for out right purchase of the land is approved by the SFC of NIN.

Final sanction order and the demand on cost of Land is awaited from Govt. of Maharashtra.

The Ministry of AYUSH conveyed the approval of the Hon'ble Minister of HFW in his capacity as the Chairperson of the GB of NIN in April 2013 to upgrade the present one year Treatment Assistant Training Course (TATC) to a two years Nursing Diploma in Naturopathy & Yoga Therapy.

The 26th SFC at its meeting held on 10th June, 2013, has approved the proposal of starting Pathology Laboratory at NIN. Accordingly the final set up of Pathology Laboratory along with all equipment is about to complete and the same shall be available for the patients/ public for test purpose shortly.

(viii) National Institute of Homoeopathy (NIH), Kolkata:

National Institute of Homoeopathy was established on 10th December 1975 in Kolkata as an autonomous institution under the Ministry of Health and Family Welfare, Govt. of India. The Institute imparts education in Homeopathy serving as a model institution for other schools across the country. The Institute was affiliated to the University of Calcutta up to session 2003-04 and from 2004-05 has been affiliated to the West Bengal University of Health Sciences, Kolkata.

Mission of NIH

The mission of National Institute of Homoeopathy is to foster excellence in Homoeopathic Medical Education and Research, to educate and train undergraduate, post graduate students and research scholars of homoeopathy in accordance with highest professional standards and ethical values unfettered by the barriers of nationality, language, culture, plurality, religion and to meet the healthcare needs of the community through dissemination of knowledge and service.

Vision of NIH:

National Institute of Homoeopathy, Kolkata, aspires to be India's most energetic and responsive organisation, offering unparalleled educational opportunities in homoeopathy for learner community seeking the highest quality undergraduate, post graduate, and continuing personal or professional enrichment in higher education and selected professions that will lead to formation of scholarly community serving the nation by advancing, sharing and applying knowledge, and by facilitating the

development of thoughtful, creative, adaptable, contributing and humane citizens.

Objectives of NIH:

1. To promote and develop Homoeopathy;
2. To produce graduates and post graduates in Homoeopathy;
3. To conduct research on various aspect of Homoeopathy;
4. To provide medical care through Homoeopathy to the suffering humanity;
5. To provide and assist in providing Services and facilities for research, evaluation, training, consultation and guidance related to Homoeopathy;
6. To conduct experiments and develop patterns of teaching in under graduate and post graduate education on various aspects of Homoeopathy.

Management

The Chief Executive Officer of the Institute is the Director. A Governing Body constituted by the Ministry of AYUSH, Govt. of India, controls the functioning of the Institute.

The President of the Governing Body is the Hon'ble Union Minister of Health & Family Welfare, Govt. of India. The regular activities of the Institute are monitored by the Ministry of AYUSH, Govt. of India, on behalf of the Governing Body.

Campus

National Institute of Homoeopathy is located in the most planned and developed area of Salt Lake city of Kolkata. It is functioning in its own campus, situated on a plot of land measuring about 16 acres at Block-GE, Sector-III, Salt Lake, Kolkata-700106. Construction of the first phase (G + 3) of the new Academic-cum-Library building has been completed. A well-built hospital is also within the campus. The hospital is being expanded from its present bed strength of 100 to 250.

For undergraduate students Boys' hostel [(UG) (300 accommodation)], Girls' hostel (112 accommodation) and an auditorium with 500 seating capacity are available in the campus. Quarters for Residential Medical Officers are also available in the campus.

The residential campus of the Institute is located on a plot of land measuring about 10 acres at JC block, Salt Lake, Kolkata-700098, in close vicinity to the main campus. An *International Hostel* with all modern facilities for accommodating students from abroad, separate PG hostels for boys and girls along

with 24 residential quarters for the employees of the Institute is also available in the same campus.

Herbal Garden stretched over land area about of 25 acres at Kalyani (about 60 km. from Kolkata) is maintained by the Institute, envisaged for acclimatising exotic species of plants, and to build a repository of authentic specimens of medicinal plants for use by students and researchers.

Special Administrative Activities: Many of the vacant teaching posts have been filled up. Following regular appointments has been made in the Institute:

1. Lecturer - 04
2. Nurse (Grade-I) - 01
3. Physiotherapist -01

Moreover, following contractual appointments (for 01 year only) has also been made in the Institute:

1. Reader - 08
2. Lecturer - 03

Academic Activities

This Institute, at present conducts the degree course in Homoeopathy i.e., Bachelor of Homoeopathic Medicine and Surgery [B.H.M.S.] since 1987 and Post - Graduate course i.e. Doctor of Medicine in Homoeopathy [M.D. (Hom.)] since 1998. At present PG course is offered in six subjects viz. Organon of Medicine, Materia Medica, Repertory, Homoeopathic Pharmacy, Practice of Medicine and Paediatrics. These courses are recognized by the Central Council of Homoeopathy. The Institute is affiliated to The West Bengal University of Health Sciences, Kolkata for both these courses.

Hospital Services

The Institute has a Hospital consisting of **Out Patient** and **In-patient** departments caters medical services through its Hospital situated in the main campus & peripheral OPD at Kalyani, with a nominal charge for investigations and other services. **288051 patients** were attended in OPD at NIH Salt Lake Complex and **4720 patients** were attended in Kalyani peripheral OPD. The hospital has investigation facilities viz. **Clinical Pathology, Biochemistry, Radiology, Ultra-Sonography** and **ECG** etc. The Institute has been presently providing Indoor facilities through 100 bedded hospitals of which 08 beds are earmarked for **Surgery**, and 4 for **Maternity**.

The Institute has an Operation Theatre. New apparatus / instruments, such as Pulse Oxymeter,

Diathermy, Portable X-ray and Endoscopy etc. have been introduced in the operation theatre. Orthopaedic surgery has also started. The Institute has a Labour room and undertakes antenatal / post-natal care of the mother and child and also giving clinical training to the Under-graduate students.

Peripheral Medical Services

Every year the Institute organises a medical camp at Gangasagar Mela during Makar Sankranti in South 24 Parganas, District (W.B.) to provide Homoeopathic treatment on the spot to ailing pilgrims coming from all over the country. One peripheral OPD at Kalyani in Nadia District (WB) is running in full swing.

Research Activities The Research Wing of the Institute is conducting Clinical Research on the following:-

- a. Thyroid Diseases
- b. Cancer
- c. Spondylitis

Library & Information Services

This division has more than 21000 documents (macro & micro) including rare homoeopathy treatises. There are 1042 bound journals, 61 periodicals are subscribed regularly and 43 periodicals have been received as gift. It provides various services i.e. Documentation, Reference, Referral, CAS, SDI, Document delivery, Internet etc. to the in-house readers. Book Bank service is also functioning. The department of LIS also provides Information support on Homoeopathy to the Interns, PG students and the Homoeopathic fraternity as a whole.

Other Activities

Medical camp was organized during **Ganga Sagar** Mela providing 24 hours round the clock service. The Institute also participated in different fairs such as Chikitsa Fair organized Indian Chamber of Commerce at Kolkata, AROGYA Fairs at Hyderabad and Bhopal.

Seminars and Workshops

A well equipped Seminar Hall is available for holding seminars and clinical workshops. The different departments are conducting regular weekly seminars on important topics and clinical case presentations where the post graduate trainees, Interns and faculty members take active participation. Time to time special seminars/workshops is being

conducted where some eminent teachers/homoeopaths from different parts of country present their views and share their experiences with the postgraduate trainees and faculty members.

Bulletin: The Institute publishes a quarterly bulletin incorporating scientific articles contributed by NIH faculties and students.

G. STANDARDISATION OF ASU & H DRUGS:

Laying down the Pharmacopoeial standards for Ayurveda, Siddha and Unani medicine, both for single and compound drugs, is essential, as Pharmacopoeial standards are important and are mandatory for the implementation of the drug testing provisions under the Drugs and Cosmetics Act, 1940 and Rules there under. These standards are also essential to check samples of drugs available in the market for their safety and efficacy. Government of India had taken up the task of developing Pharmacopoeial standards through Pharmacopoeia Committees.. Four different Pharmacopoeia Committees are working for preparing official formularies/ pharmacopoeias of Ayurveda, Siddha, Unani and Homoeopathy drugs. These committees are engaged in evolving uniform standards for preparation of drugs of and in prescribing working standards for single drugs as well as compound formulations. Standards for around 40% of the raw materials and around 15% of formulations have been published by these Pharmacopoeial committees. In Ayurveda, 5 volumes of Pharmacopoeia and 3 volumes of Formularies have been published.

Drug Control Cell (AYUSH) is working in the Department to deal with the matters pertaining to Drug Quality Control and the regulation of Ayurveda, Siddha and Unani drugs under the provisions of the Drugs and Cosmetics Act, 1940 and Rules, 1945. The Cell is looking after the activities of Ayurveda, Siddha, Unani Drug Technical Advisory Board (ASUDTAB) and Ayurveda, Siddha, Unani Drugs Consultative Committee (ASUDCC). Besides, Pharmacopoeial Laboratory for Indian Medicine (PLIM) and Homoeopathic Pharmacopoeia Laboratory (HPL) are Standard-setting-cum-Drug-Testing-Laboratories at National level functioning at Ghaziabad (Uttar Pradesh). A public sector undertaking 'Indian Medicines Pharmaceutical Corporation Limited (IMPCL)' is engaged in manufacturing and marketing of Ayurveda and Unani products.

(i) Pharmacopoeial Laboratory for Indian Medicine (PLIM), Ghaziabad:

Pharmacopoeial Laboratory for Indian Medicine (PLIM) is a subordinate office of the Ministry of AYUSH, Govt. of India. It is located at Central Govt. Enclave, Kamla Nehru Nagar, Ghaziabad 201002 (U.P.). The laboratory was established in the year 1970 as a Pharmacopoeial Standards Setting-Cum-Drugs Testing Laboratory at National Level for Indian Medicines which includes drugs of Ayurveda, Unani and Siddha systems (Website: www.plimism.nic.in). The laboratory is also notified as Central Drugs Laboratory for drug testing and quality control. The main objectives of establishing Pharmacopoeial Laboratory for Indian Medicine (PLIM) are as under:

- Pharmacopoeial standardization of single drugs and compound formulations to be incorporated in Ayurveda, Siddha and Unani Pharmacopoeia.
- Validation of Pharmacopoeial standards, done elsewhere, for updation of standards.
- Analysis of survey, official and legal samples received from Drug Control Authorities.
- To act as Central Drugs Laboratory for Ayurveda, Siddha and Unani drugs under the provisions of the Drugs & Cosmetics Act, 1940.
- Collection of genuine crude drug samples from different Agro-climatic zones of the country for pharmacopoeial standardization.
- Development maintenance of Medicinal Plants Garden of pharmacopoeial drugs.
- Preservation of authentic specimen of drugs and Medicinal Plants in Museum and Herbarium for reference purposes.
- Repository of Botanical and Phytochemical Reference Standards.
- R & D work on pharmacopoeial and quality control thrust areas.
- Capacity Building Training Programmes for Drugs Inspectors/Drug Analysts and Analysts working in ASU pharmaceutical industry.
- Supporting structure of Pharmacopoeial Commission for Indian Medicine.

The PLIM has a Museum and Herbarium housing 950 herbarium specimens and more than 2000 exhibits of raw material used in the Ayurveda, Unani and Siddha formulations. The laboratory also imparts training to Drug Control Authorities and Quality Control Personnel from Government laboratories and private manufacturers. The Ministry of AYUSH publishes the worked-out standards in the form of monographs for the Ayurveda, Unani and Siddha

Pharmacopoeia of India. The laboratory has worked out pharmacopoeial standards of single drugs which have been incorporated in various volumes of Ayurveda, Unani and Siddha Pharmacopoeia. The laboratory has also contributed for TLC Atlas and Macroscopy and Microscopy Atlas of Ayurvedic Pharmacopoeial drugs. So far eight volumes of Ayurvedic Pharmacopoeia of India (Part I, Single drugs), three volumes of Ayurvedic Pharmacopoeia of India (Part II, Formulations), six volumes of Unani Pharmacopoeia India (Part I, Single drugs), two volumes of Unani Pharmacopoeia India (Part II, Formulations) and two volumes of Siddha Pharmacopoeia of India (Part I, Single drugs) have been published and are official for regulatory frame work.

(ii) Homoeopathic Pharmacopoeia Laboratory (HPL), Ghaziabad:

Homoeopathic Pharmacopoeia Laboratory (HPL), Ghaziabad was established in 1975, as a National Laboratory for the purpose of laying down standards and testing for identity, purity and quality of Homoeopathic medicines (website: www.hplism.org). The Laboratory also functions as a Central Drugs Laboratory for the testing of Homoeopathic Medicines under Rule 3A for the Drugs and Cosmetics Act. The Department of Science and Technology has recognized HPL as a Scientific and Technological Institution. The main objectives of Homoeopathic Pharmacopoeia Laboratory are as under:

- Laying down of standards for identity and purity of Homoeopathic Drugs and finding out indigenous substitutes for foreign drugs.
- Verification of Pharmacopoeial standards, done elsewhere, for adoption or improvement or updation of standards.
- Testing of samples of Homoeopathic Drugs, referred by Drugs Control Authorities, Port Authorities, State Government etc., for identity and quality under different provisions of Drugs and cosmetics act and rules.
- Maintaining medical plants garden with preference to plants used in Homoeopathy along with cultivation and introduction of medicinal plants.
- Survey and collection of samples of Homoeopathic Drugs for verification of quality and adulteration trends of drugs marketed.
- Survey and collection of Medicinal Plants.
- Imparting orientation in methods of standardization, identification and testing of Homoeopathic Drugs and application of various provisions of Drugs & Cosmetics Act to all India State/Central Government Drug

Authorities, Drug Authorities, Drug Inspectors, Drugs Analysts Pharmacists etc.

- Facilitates exposure visits of the laboratory to the students of Homoeopathy Colleges to familiarize the working of the laboratory.

A small herbarium and museum of medicinal plants and an experimental garden of medicinal plants including some rare and very important exotic plants are being maintained for the purpose of standards reference material so as to utilize for verification and comparative studies of standards. The Laboratory also maintains a seed bank of important exotic homoeopathic medical plants.

Standards worked out of Homoeopathic Drugs by the laboratory are published in the Homoeopathic Pharmacopoeia of India (HPI). So far nine volumes of HPI have been published covering 944 monographs on homoeopathic drugs and the work of 10th Volume of Homeopathic Pharmacopoeia of India comprising 101 monographs on homoeopathic drugs has already been completed and is under print. Work on compilation of the 9 volumes of Homoeopathic Pharmacopoeia of India into 2 volumes is over and ready for publication. On Homoeopathic Pharmaceutical codex comprising 101 Homoeopathic drugs has also been published.

The incorporation of Homoeopathy in Pharmacopoeia Commission of Indian Medicine has also been approved and the Commission has been renamed as Pharmacopoeia Commission of Indian Medicine & Homoeopathy.

(iii) Indian Medicines Pharmaceutical Corporation Limited (IMPCL), Mohan (Almora):

Indian Medicines Pharmaceutical Corporation Limited (IMPCL), a Government of India Enterprise, having 97.61% shares of Government of India and 2.39% shares of Uttarakhand State Government through Kumaon Mandal Vikas Nigam Ltd, was incorporated on 12.07.1978. The registered office and factory of the company is at Mohan (Via - Ramnagar), District Almora, Uttarakhand - 244715 incorporated on 12.07.1978. IMPCL comes under the Administrative Control of the Ministry of AYUSH, New Delhi.

IMPCL had acquired 38 acres land on lease at Mohan, Distt Almora, Uttarakhand, a notified Backward Area, 550Meter above sea level (A valley in a thick forest area adjacent to Corbett National Park.

IMPCL is Schedule D, "Mini-Ratna" Category-II, GMP Certified & ISO 9001-2008 certificated Central Public Sector Undertaking. IMPCL has

obtained an approval for in-house AYUSH Drug Testing Laboratory (DTL) for testing of raw materials as well as finished goods.

SHARE CAPITAL:

Authorized share capital - Rs. 75 Crore

Paid-up share capital - Rs. 41 Crore

OBJECTIVE:

The Commercial Production of the company was started in June, 1983. The production activities are being carried out both manual as well as mechanized. The Company was set up with the objectives to manufacture and supply the genuine and efficacious Ayurvedic and Unani Medicines to the Central Government Hospitals, Central Government Research Units all over India and to State Government related Departments besides sales in the open Market.

HR:

Total staff strength is 130 employees (excluding casual, adhoc and outsource etc. arrangement. The Company has given maximum employment to Local the peoples. Around 120 employees out of total strength are from the local areas and surrounding hills.

CSR:

Besides, purchases through open tender, the Company is purchasing raw materials etc. from local people/through Kumaon Mandal Vikas Nigam Ltd. for development and upliftment of living standard of villagers.

Company has continuously followed the Corporate Social Responsibility (CSR) guidelines issued by the Departments of Public Enterprises (DPEs). During 2012-13, the Company had spent CSR fund in Cultivation of Medicinal Plants in nearby areas, Imparting Vocational Training to the students of surrounding colleges, Promoting Cultivation of medicinal plants under Contracts farming systems, Development of Medicinal Plant Garden .and Promoting livelihood by supporting cultivation of medicinal plants and buying same from the SHGs, etc.

The company has received CSR award from World CSR congress & IPE in 2012-2013.

PERFORMANCE:

IMPCL is supplying Ayurvedic & Unani medicines to all over India. As the automation & 3rd phase modernization is under progress, the plant

capacity will be enhanced at least by 8-10 times on completion of modernization work.

The MoU rating of IMPCL was "Good" for the year 2012-2013. The company has achieved the assigned target of Rs. 36 Crore for 2013-2014.

The Production and Sales performance for the last four years is as under:

PARTICULARS		2010-11	2011-12	2012-13	2013-14
PRODUCTION	QUANTITY	661392	642387	653629	741639
	VALUE	1468	1430	1881	2472
SALE	VALUE	2441	2490	2966	3652
PROFIT		12	151	445	240

During the year 2011-12, the Government of India through Ministry of AYUSH has release Rs. 34 Crore by way of equity shares for investment in the Company for 3rd Phase Modernization/renovation to achieve WHO/ International GMP certification. The 3rd phase Modernization project work is expected to be completed up to March 2014-15.

Pharmacopoeia Commission for Indian Medicine & Homoeopathy (PCIM&H)

The Pharmacopoeia Commission for Indian Medicine & Homoeopathy (PCIM&H) is formed an autonomous organization under the Ministry of AYUSH, Govt. of India under Societies Registration Act, 1860. The Commission is based at Ghaziabad and is an umbrella organization for Ayurvedic Pharmacopoeia Committee (APC), Siddha Pharmacopoeia Committee (SPC), Unani Pharmacopoeia Committee (UPC) and Homoeopathy Pharmacopoeia Committee (HPC).

Aims and Objectives of the commission are as under:

- Publication and revision of the Ayurvedic, Siddha, Unani and Homoeopathy Pharmacopoeia of India at suitable intervals and of such addenda or supplementary compendia during the intervening periods as may be deemed necessary; releasing the publications for public use from a date when they are to become official.
- Publication and revision of the Ayurvedic, Siddha & Unani Formulary of India, Homoeopathic Pharmacopoeia as well as Homoeopathic Pharmaceutical Codex at regular intervals with a view to make it an authentic source of information on rational combination and use of medicine including their methods of preparation, therapeutic

indications, adverse reactions, contra-indications, drug interaction and similar issues concerning Indian medicine for safe use in humans and animals Identification of ASU formulations and Homoeopathic Pharmacopoeia as well as Homeopathic Pharmaceutical Codex with a view to develop their quality standards and to ensure quality and safety of ASU & H medicine;

- To nurture and promote awareness of quality in ASU drugs formulations, Homoeopathic Pharmacopoeia as well as Homoeopathic Pharmaceutical Codex and drug research on ASU & H products and publish regularly or at suitable intervals or other related scientific information as authorized under the rules and procedures of the Commission;
- Exchange information and interact with expert committees of the World Health Organization and other international bodies with a view to harmonize and develop the ASU & H pharmacopoeial standards to make those internationally acceptable;
- Arranging studies either under its own auspices or through collaboration with other institution to develop standards and quality specifications for identity, purity and strength of raw materials and compound formulations and to develop SOPs for the process of manufacture included or to be included in the Ayurvedic, Siddha, Unani and Homeopathy Pharmacopoeia/formulary and its addenda or supplementary compendia or other authorized publications;
- Maintain National repository of authentic reference raw materials used in the manufacture of Ayurveda, Siddha, Unani and Homeopathy medicine for the purpose of reference and supply of reference standards to the stake holders at a price;
- To assign responsibilities described for PLIM and HPL under the Drugs & Cosmetics Act.
- Generate and maintain repository of chemical reference marker compounds of the plants or other ingredients used in standardizing Ayurveda, Siddha, Unani and Homeopathy medicine and supply them as reference standards to the stake holders on price;
- Furtherance of the provision of Chapter IVA of Drugs and Cosmetic Act, 1940 in case of ASU drugs & 4A of Schedule II of Drugs & Cosmetics Act in case of Homeopathy medicine and rules there under related to ASU drugs and Homeopathy medicine respectively;
- Acting as a coordinating center for analytical laboratories, industry and academia by

encouraging exchange of scientific and technical information and staff and by undertaking sponsored funded research as well as consultancy projects;

- Organizing national/international symposia, seminars, meeting and conferences in selected areas from time to time and to provide updated regular training to the regulatory authorities and stake holders.

Ayurvedic Pharmacopoeia of India, Part-I consists of eight volumes which include monographs on single drugs, Minerals & Metals, Aqueous & Hydroalcoholic extracts. Part-II of the Ayurvedic Pharmacopoeia consists of three volumes comprising monographs on compound formulations. Three parts of Ayurvedic Formulary of India and supporting Pharmacopoeial publications viz. one TLC atlas and two atlases for macroscopy and microscopy of Ayurvedic Pharmacopoeial Drugs have also been published so far.

Unani Pharmacopoeia of India, Part-I consists of six volumes which include monographs on single drugs. Part-II of the Ayurvedic Pharmacopoeia consists of two volumes comprising monographs on compound formulations. Six parts of National Formulary of Unani Medicine have also been published so far.

Siddha Pharmacopoeia of India, Part-I consists of two volumes which include monographs on single drugs. Two parts of Siddha Formulary of India have also been published so far.

Homoeopathic Pharmacopoeia of India consists of nine volumes comprising monographs on single drugs of plant, animal, mineral etc. origin.

H. AYUSH SERVICES IN HEALTH CARE DELIVERY:

Providing cost effective AYUSH services, with a universal access is one of the strategies to improve the quality and outreach of Health of Care Services. The National Policy on Indian Systems of Medicine and Homoeopathy, 2002 envisaged integration of AYUSH Systems into the health care delivery system and the national health programme ensuring optimal use of the infrastructure of hospitals, dispensaries and physicians.

Within the communities in India, AYUSH systems have been an age old tradition with wide acceptance which can play an important role in the prevention and mitigation of diseases. There is a need for service integration by providing the best and unique from each system to patients as a

complementary therapy and an alternative choice of treatment. There is an important role for the AYUSH practitioners in the delivery of health services.

Under Centrally Sponsored Scheme for Development of AYUSH Hospitals and Dispensary Grant-in-aid is being provided to the States for co-location of AYUSH facilities at Primary Health Centre (PHC), Community Health Centers (CHCs) and District Hospitals (DHs) as well as for up gradation of Stand-alone AYUSH Hospitals and Dispensaries.

The Ministry of AYUSH has implemented a component during 2011-12 in the existing scheme of Centrally Sponsored Scheme of Development of AYUSH hospitals & dispensaries for providing financial assistance for setting up of 50 bedded integrated AYUSH hospitals in Tripura, Mizoram, Manipur, Himachal Pradesh, Jammu Kashmir & Uttarakhand and 10 bedded integrated AYUSH hospitals in Assam, Meghalaya, Nagaland, Sikkim and Arunachal Pradesh.