

NATIONAL PROGRAMME FOR THE HEALTH CARE OF THE ELDERLY (NPHCE)

An approach towards Active and Healthy Ageing

OPERATIONAL GUIDELINES



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Ministry of Health & Family welfare
Government Of India**

1. POLICY & STRATEGIC FRAMEWORK FOR IMPLEMENTATION

1.1 INTRODUCTION

The unprecedented increase in human longevity in 20th century has resulted in the phenomenon of population ageing all over the world. Countries with large population such as India have large number of people now aged 60 years or more. The population over the age of 60 years has tripled in last 50 years in India and will relentlessly increase in near future. In 2001, the proportion of older people was 7.7% which will increase to 8.14% in 2011 and 8.94% in 2016.

According to 2001 census, there were 75.93 million Indians above the age of sixty years; of them 38.22 million were males and 37.71 million were females. The projections for next five censuses till the year 2051 are: 96.30 million (2011), 133.32 million (2021), 178.59 (2031), 236.01 million (2041) and 300.96 million (2051).

Along with rising numbers, the expectancy of life at birth is also consistently increasing indicating that a large number of people are likely to live longer than before. The expectancy of life at birth during 1996-2001 was 62.3 years for males and 63.39 years for females. The projected data for the periods 2001-2006, 2006-2011 and 2011-2016 are 63.87 and 65.43; 65.65 and 67.22; and 67.04 and 68.8 years respectively for males and females.

Non-communicable diseases requiring large quantum of health and social care are extremely common in old age, irrespective of socio-economic status. Disabilities resulting from these non-communicable diseases are very frequent which affect functionality compromising the ability to pursue the activities of daily living. The treatment/management of these chronic diseases is also costly, especially for cancer treatment, joint replacements, heart surgery, neurosurgical procedures etc thereby making it out of bound for elderly whose income decreases post retirement and more so for the elderly in the unorganized sector and dependent elderly women

The National Sample Surveys of 1986-87, 1995-1996, and 2004 have shown that:

- The burden of morbidity in old age is enormous.
- Non-communicable diseases (life style related and degenerative) are extremely common in older people irrespective of socio- economic status.
- Disabilities are very frequent which affect the functionality in old age compromising the ability to pursue the activities of daily living.

The National Sample Survey of 2004 (60th Round) provides a comprehensive status report on older persons. According to it, the prevalence and incidence of diseases as well as hospitalization rates are much higher in older people than the total population. It also reported that about 8% of older Indians were confined to their home or bed. The proportion of such immobile or home bound people rose with age to 27% after the age of 80 years. Women were more frequently affected than males in both villages and cities. The survey estimated the state of self perceived

health status of older people. A good or fair condition of health was reported by 55-63% of people with a sickness and 77-78% of people without one. In contrast about 13-17% of survey population without any sickness reported ill health. It is possible that many older people take ill health in their stride as a part of “usual/normal ageing”. This observation has a lot of significance as self perceived health status is an important indicator of health service utilization and compliance to treatment interventions.

However, very little effort has been made to develop a model of health and social care in tune with the changing need and time. The developed world have evolved many models for elderly care e.g. nursing home care, health insurance etc. As no such model for older people exists in India, as well as most other societies with similar socioeconomic situation, it may be an opportunity for innovation in health system development, though it is a major challenge. The requirements for health care of the elderly are also different for our country. India still has family as the primary care giver to the elderly and scope for training this lot provide support to the programme. Presently Elderly are provided health care by the general health care delivery system in the country. At the primary care level, the infrastructure is grossly deficient. And otherwise the health system machinery is geared up to deal with the maternal and child health and communicable diseases. Elderly suffer from multiple and chronic diseases. They need long term and constant care. Their health problems also need specialist care from various disciplines e.g. ophthalmology, orthopedics, psychiatry, cardiovascular, dental, urology to name a few. Thus a model of care providing comprehensive health services to elderly at all levels of health care delivery is imperative to meet the growing health need of elderly. Moreover, the immobile and disabled elderly need care close to their homes.

As per the NPOP, Ministry of Health & Family Welfare was entrusted with the following agenda to attend to the health care needs of the elderly:

- Establishing Geriatric ward for elderly patients at all district level hospitals
- Expansion of treatment facilities for chronic, terminal and degenerative diseases
- Providing Improved medical facilities to those not able to attend medical centers – strengthening of CHCs / PHCs / Mobile Clinics
- Inclusion of geriatric care in the syllabus of medical courses including courses for nurses
- Reservation of beds for elderly in public hospitals
- Training of Geriatric Care Givers
- Setting up research institutes for chronic elderly diseases such as Dementia & Alzheimer

India was among the first countries to ratify UN Convention on the Rights of Persons with Disabilities (UNCRPD) which have come into effect from 3rd May, 2008. As per the provisions under Article 25 of UNCRPD, the health services needed by persons with disabilities should be provided as close to people’s own communities, including in rural areas. In addition, at present there is huge shortage of manpower in geriatrics in the country. Elderly health care is part of the general health care system. As the elderly suffer from multiple chronic and disabling diseases, it

becomes difficult for them to run from pillar and post to get appropriate health care. Moreover the general health care system is not adequately sensitized to the health needs of elderly. The undergraduate medical curriculum does not cover all aspects of geriatric care adequately. Postgraduate geriatric courses are grossly deficient in the country. Over and above, there are no posts to absorb the miniscule trained manpower, which is produced by only one medical college in the country i.e. Madras Medical College, Chennai. There is no incentive for the trained postgraduates and nearly half of the available lot has migrated to the countries where regular jobs are available for them.

As the elderly population is likely to increase in future, and there is definite shift in the disease pattern i.e. from communicable to non communicable, it is high time that the health care system gears itself to growing health needs of the elderly in an optimal and comprehensive manner. There is definite need to emphasize the fact that disease and disability are not part of old age and help must be sought to address the health problems. The concept of Active and Healthy Ageing needs to be promoted not only among the elderly but the younger age groups as well, which includes promotional and preventive and rehabilitative aspects of health.

1.2 THE VISION, OBJECTIVES & EXPECTED OUTCOME

The National Programme for the Health Care for the Elderly (NPHCE) is an articulation of the International and national commitments of the Government as envisaged under the UN Convention on the Rights of Persons with Disabilities (**UNCRPD**), National Policy on Older Persons (**NPOP**) adopted by the Government of India in 1999 & Section 20 of “The Maintenance and Welfare of Parents and Senior Citizens Act, 2007” dealing with provisions for medical care of Senior Citizen.

1.2.1 The Vision of the NPHCE is:

- To provide accessible, affordable, and high-quality long-term, comprehensive and dedicated care services to an Ageing population;
- Creating a new "architecture" for Ageing;
- To build a framework to create an enabling environment for "*a Society for all Ages*";
- To promote the concept of *Active and Healthy Ageing*;
- Convergence with National Rural Health Mission, AYUSH and other line departments like Ministry of Social Justice and Empowerment.

1.2.2 Specific Objectives of NPHCE are:

- To provide an easy access to promotional, preventive, curative and rehabilitative services to the elderly through community based primary health care approach
- To identify health problems in the elderly and provide appropriate health interventions in the community with a strong referral backup support.

- To build capacity of the medical and paramedical professionals as well as the care-takers within the family for providing health care to the elderly.
- To provide referral services to the elderly patients through district hospitals, regional medical institutions

1.2.3 Core Strategies to achieve the Objectives of the programme are:

- Community based primary health care approach including domiciliary visits by trained health care workers.
- Dedicated services at PHC/CHC level including provision of machinery, equipment, training, additional human resources (CHC), IEC, etc.
- Dedicated facilities at District Hospital with 10 bedded wards, additional human resources, machinery & equipment, consumables & drugs, training and IEC.
- Strengthening of 8 Regional Medical Institutes to provide dedicated tertiary level medical facilities for the Elderly, introducing PG courses in Geriatric Medicine, and in-service training of health personnel at all levels.
- Information, Education & Communication (IEC) using mass media, folk media and other communication channels to reach out to the target community.
- Continuous monitoring and independent evaluation of the Programme and research in Geriatrics and implementation of NPHCE.

1.2.4 Supplementary Strategies include:

- Promotion of public private partnerships in Geriatric Health Care.
- Mainstreaming AYUSH – revitalizing local health traditions, and convergence with programmes of Ministry of Social Justice and Empowerment in the field of geriatrics.
- Reorienting medical education to support geriatric issues.

1.2.5 Expected Outcomes of NPHCE

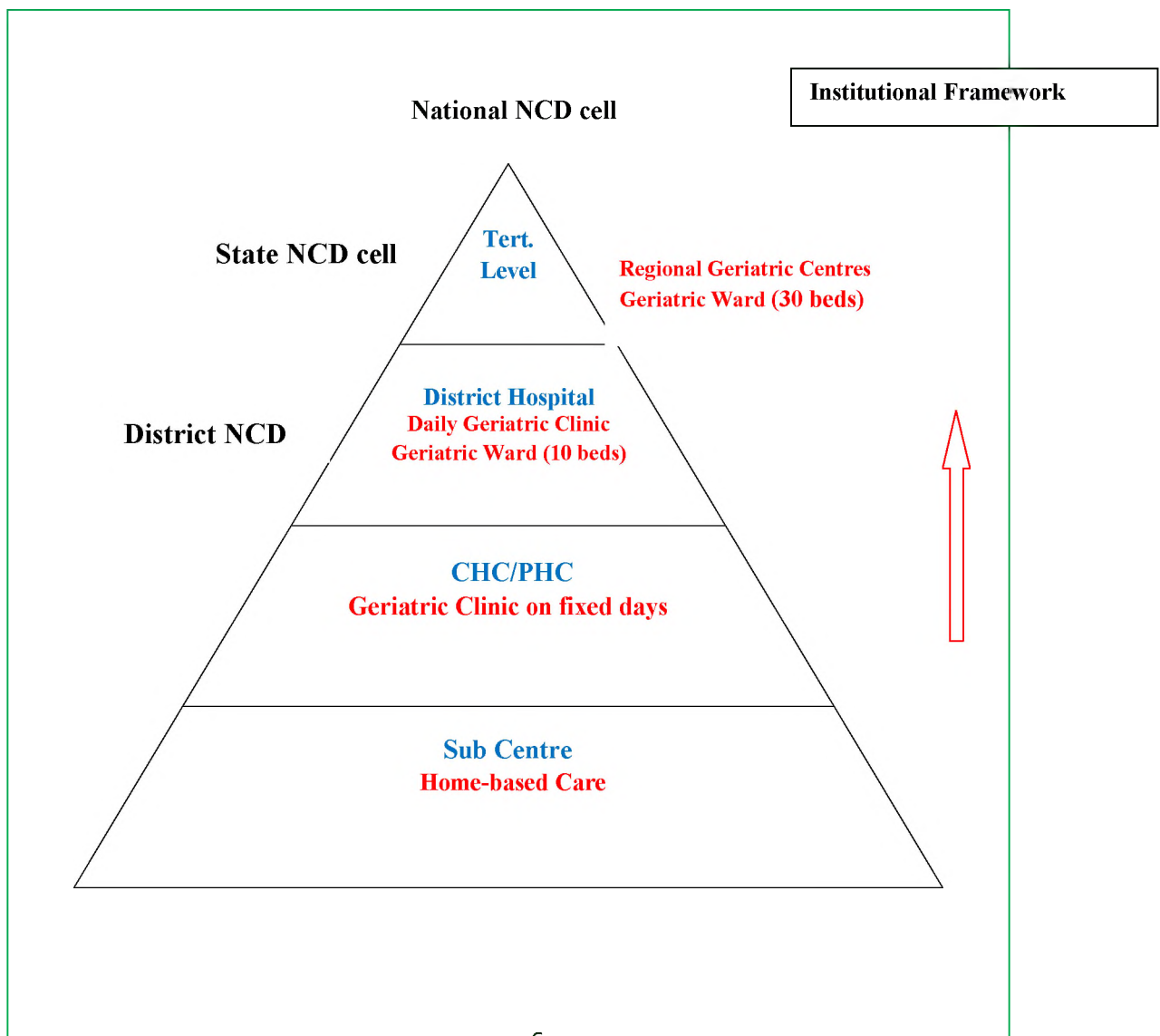
- Regional Geriatric Centres (RGC) in 8 Regional Medical Institutions by setting up Regional Geriatric Centres with a dedicated Geriatric OPD and 30-bedded Geriatric ward for management of specific diseases of the elderly, training of health personnel in geriatric health care and conducting research;
- Post-graduates in Geriatric Medicine (16) from the 8 regional medical institutions;
- Video Conferencing Units in the 8 Regional Medical Institutions to be utilized for capacity building and mentoring;
- District Geriatric Units with dedicated Geriatric OPD and 10-bedded Geriatric ward in 80-100 District Hospitals;
- Geriatric Clinics/Rehabilitation units set up for domiciliary visits in Community/Primary Health Centres in the selected districts;
- Sub-centres provided with equipment for community outreach services;
- Training of Human Resources in the Public Health Care System in Geriatric Care.

2. OPERATIONAL GUIDELINES

2.1 Package of Services

In the programme, it is envisaged providing promotional, preventive, curative and rehabilitative services in an integrated manner for the Elderly in various Government health facilities. The package of services would depend on the level of health facility and may vary from facility to facility. The range of services will include health promotion, preventive services, diagnosis and management of geriatric medical problems (out and in-patient), day care services, rehabilitative services and home based care as needed. Districts will be linked to Regional Geriatric Centres for providing tertiary level care.

The services under the programme would be integrated below district level and will be integral part of existing primary health care delivery system and vertical at district and above as more specialized health care are needed for the elderly.



Packages of services to be made available at different levels under NPHCE

Health Facility	Packages of services
Sub-centre	• Health Education related to healthy ageing • Domiciliary visits for attention and care to home bound / bedridden elderly persons and provide training to the family care providers in looking after the disabled elderly persons. • Arrange for suitable callipers and supportive devices from the PHC to the elderly disabled persons to make them ambulatory. • Linkage with other support groups and day care centres etc. operational in the area
Primary Health Centre	• Weekly geriatric clinic run by a trained Medical Officer • Maintain record of the Elderly using standard format during their first visit • Conducting a routine health assessment of the elderly persons based on simple clinical examination relating to eye, BP, blood sugar, etc. • Provision of medicines and proper advice on chronic ailments • Public awareness on promotional, preventive and rehabilitative aspects of geriatrics during health and village sanitation day/camps. • Referral for diseases needing further investigation and treatment, to Community Health Centre or the District Hospital as per need.
Community Health Centre	• First Referral Unit (FRU) for the Elderly from PHCs and below. • Geriatric Clinic for the elderly persons twice a week. • Rehabilitation Unit for physiotherapy and counselling • Domiciliary visits by the rehabilitation worker for bed ridden elderly and counselling of the family members on their home-based care. • Health promotion and Prevention • Referral of difficult cases to District Hospital/higher health care facility
District Hospital	• Geriatric Clinic for regular dedicated OPD services to the Elderly. • Facilities for laboratory investigations for diagnosis and provision of medicines for geriatric medical and health problems • Ten-bedded Geriatric Ward for in-patient care of the Elderly • Existing specialities like General Medicine; Orthopaedics, Ophthalmology; ENT services etc. will provide services needed by elderly patients. • Provide services for the elderly patients referred by the CHCs/PHCs etc • Conducting camps for Geriatric Services in PHCs/CHCs and other sites • Referral services for severe cases to tertiary level hospitals
Regional Geriatric Centre	• Geriatric Clinic (Specialized OPD for the Elderly) • 30-bedded Geriatric Ward for in-patient care and dedicated beds for the elderly patients in the various specialties viz. Surgery, Orthopedics, Psychiatry, Urology, Ophthalmology, Neurology etc. • Laboratory investigation required for elderly with a special sample collection centre in the OPD block. • Tertiary health care to the cases referred from medical colleges, district hospitals and below

2.2 Institutional framework for the implementation of NPHCE

2.2.1 Program Structure-Integration with NRHM:

Financial management group (FMG) of Programme Management support units at state and district level, which is established under NRHM, will be responsible for financial management (maintenance of accounts, release of funds, expenditure reports, utilization certificates and audit arrangements). Financial monitoring format for the programme developed by the programme division will be communicated to the FMG for this purpose.

Funds from Government of India will be released to the State Health Society. State Health Society will retain funds for state level activity and release GIA to the District Health Societies. NPHCE would operate through NCD cells under the programme constituted at State and District levels and also maintain separate bank accounts at each level. Funds from Health Society will be transferred to the Bank accounts of the NCD cell after requisite approvals at appropriate stage. This system will ensure both convergence as well as independence in achieving programme goals through specific interventions. It is envisaged to merge the programme at State and District into the SHS and DHS respectively in order to ensure sustaining the current momentum and continued focus.

2.2.2 State Health Society (SHS):

Under the NRHM framework different Societies of national programmes such as Reproductive and Child Health Programme, Malaria, TB, Leprosy, National Blindness Control Programme have been merged into a common State Health Society is chaired by Chief Secretary/Development Commissioner. Principal/Secretary (Health & Family Welfare) is the vice chair person and mission director is the Member -Secretary of the State Health Society.

2.2.3 District Health Society (DHS)

At the district level all programme societies have been merged into the District Health Society (DHS). The Governing Body of the DHS is chaired by the Chairman of the Zila Parishad / District Collector. The Executive Body is chaired by the District Collector (subject to State specific variations). The CMHO is the Member -Secretary of the District Health Society. District health society will pass on the funds to the Rogi Kalyan Samities of Block level for the activities under the programme. District Health society will monitor the utilization of funds and submit quarterly the financial management report (FMR) of the programme to State Health Society.

2.2.4 Management Structure:

2.2.4.1 National NCD Cell

The NCD Cell constituted at the central level for planning, monitoring and implementation of the National Programme for Prevention and Control of Cancer, Diabetes, CVD and Stroke (NPCDCS) will also be responsible for PPHCE. Main functions of National NCD cell are as follows:

- Enter into an MOU with the States/UTs seeking their commitments to implement and partially fund (20%) the programme.
- Preparation and dissemination of technical & operational guidelines on all aspects relating geriatrics and implementation of the National Programme.
- Plan for capacity building of health functionaries of Health care system at Primary, Secondary and Tertiary levels (including developing various training modules, etc.).
- Development of IEC strategy, prototype IEC material and dissemination through mass media.
- Coordination and liaison with all stakeholders.
- Monitoring and review of programme activities at each level through MIS, review meetings and field observations.
- Release of funds and monitoring of expenditure under NPHCE
- Organizing External evaluation and coordinating Research in geriatrics and NPHCE

2.2.4.2 Responsibilities of the State/UT:

The State/UT shall enter in to an MOU (*Annexure I*) with the Ministry of Health and Family Welfare, Government of India, committing the following:

- Appoint a State Nodal officer for liaison with Central Government, various State & District authorities as well as Regional Medical Institutes.
- Contribution of state share of 20%
- Provision of land/space for the Geriatric ward & OPD
- Provision of supportive faculty in specialties other than Internal Medicine
- Provision of diagnostic support services like Laboratory, Radiological and other investigational facilities.
- Supplementing the expenditure on equipments, drugs and consumables
- Starting P.G. Course in Geriatric Medicine @ 2 seats per year Regional Medical Institutes (by the States in which the Regional Medical Institutes is located)
- Setting up of rehabilitation unit at CHCs falling within the identified districts
- Taking over the responsibility from central Govt. once the units are fully functional.

2.2.4.3 Setting up of State NCD Cell.

The State NCD Cells constituted under NPCDCS will also implement and monitor NPHCE. The State NCD Cell will be established preferably in the Directorate of Health services or any other space provided by the State Government. The NCD Cell will be responsible for overall planning, implementation, monitoring and evaluation of the different activities, and achievement of physical and financial targets planned under the programme in the State. The Cell shall function under the guidance of State programme Officer (SPO-NCD) and will be supported by the identified officers/officials from the Directorate /Director General of Health Services. SPO (NCD) will be a State level health official identified by the State government.

A. **Composition:** State NCD Cell will be supported by following contractual staff

- State Programme Officer

- Programme Assistant
- Finance cum Logistics Officer
- Data Entry Operators (2)

B. Role and responsibilities of the State NCD Cell is as under:

- Preparation of State action plan for implementation of NPHCE.
- Organize State & district level trainings for capacity building
- Liaison with Regional Geriatric Centre for tertiary Care, Training & Research.
- Ensure appointment of contractual staff sanctioned for various facilities
- Release of funds to districts for continuous flow of funds and submission of Statement of Expenditure and Utilization Certificates
- Maintaining State and District level data on physical and financial progress of NPHCE
- Convergence with NRHM activities and other related departments in the State / District
- Monitoring of the programme through HMIS, Review meetings, field observations.
- Public awareness regarding health promotion, prevention and rehabilitation of the elderly and services made available under NPHCE.

2.2.4.4 District NCD Cell

District NCD Cell will be established preferably in the District Health Office or any other space provided by District head quarter. The NCD Cell will be responsible for overall planning, implementation, monitoring and supervision of different activities and achievement of physical and financial targets planned under the programme in the District. The Cell shall function under the guidance of District Programme Officer (DPO NCD) and will be supported by the identified officers/officials from the District health system. DPO (NCD) shall be a district level health official and be identified by the State government.

A. Composition: District NCD Cell will be supported by following contractual staff:

- District Programme Officer
- Programme Assistant
- Finance cum Logistics Officer
- Data Entry Operator

B. Role and responsibilities of the District NCD Cell

- Preparation of District action plan for implementation of NPHCE strategies.
- Maintain and update district database of the Elderly.
- Conduct sub-district/ CHC level trainings for capacity building
- Engage contractual personnel sanctioned for various facilities in the district
- Maintain fund flow and submit Utilization Certificates
- Maintaining District level data on physical and financial progress
- Convergence with NRHM activities; and
- convergence with the other related departments in the States/ District
- Ensure availability of rehabilitative services for the Elderly.

2.3 Activities under NPHCE at various levels

2.3.1 Sub Centre

The ANM / Male Health Workers posted in sub-centres will be suitably trained to make domiciliary visits to the elderly persons in areas under their jurisdiction. The activities at the sub-centre are as follows:

- The ANM/Male Health Worker will provide elderly persons or the family / community health care providers information on interventions such as: Health Education related to healthy ageing, environmental modifications, nutritional requirements, life styles and behavioural changes.
- They will give special attention to home bound / bedridden elderly persons and provide training to the family health care providers in looking after the disabled elderly persons.
- They will arrange suitable callipers and supportive devices from the PHC and provide the same to the elderly disabled persons to make them ambulatory.
- Linkage with other support groups and day care centres etc. operational in the area

Annual check-up of all the elderly at village level need to be organized by PHC/CHC and information updated in Standard Health Card for the Elderly to be developed by the National NCD cell. Role of ASHA at village level need to be worked out particularly for mobilize of the elderly to attend camps and home-based care for bed-ridden elderly

Following items will be made available at the Sub-centre level:

- Walking Sticks
- Calipers
- Infrared Lamp
- Shoulder Wheel
- Pulley
- Walker (ordinary)

No additional contractual manpower is suggested under the Programme at SC level. Combined training of all health personnel at the sub-centre level shall be integrated with training under National Programme for Prevention and Control of Cancer, Diabetes, Cardiovascular Diseases and Stroke (NPCDCS).

2.3.2 Primary Health Centre:

The PHC Medical Officer will be in-charge for coordination, implementation and promoting health care of the elderly. Following activities will be undertaken at the PHC:

- A weekly geriatric clinic will be arranged at PHC level by trained Medical Officer

- Conducting health assessment of the elderly persons based on simple clinical examination relating to vision, joints, hearing, chest, BP and simple investigations including blood sugar, etc. A simple questionnaire will be filled up during the first visit of each Elderly and record updated and maintained.
- Proper advice on chronic ailments like Chronic Obstructive Lung Disease, Arthritis, Diabetes, Hypertension, etc. including dietary regulations.
- Public awareness during health and village sanitation day/camps.
- Provision of medicine to the elderly for their medical ailments.
- Referral for further investigations and treatment to Community Health Centre or the District Hospital as per need.

Following items will be made available at the PHC:

- Nebulizer
- Glucometer
- Shoulder Wheel
- Walker (ordinary)
- Cervical traction (manual)
- Exercise Bicycle
- Lumber Traction
- Gait Training Apparatus
- Infrared Lamp etc.

The medicines for general treatment will be provided from the stock available at PHCs. The Medical Officer will liaise with the Blindness Control programme, NPCDCS and other programmes for the provision of diagnostics, equipments, consumables, medicines and services for Geriatric Clinic.

2.3.3 Community Health Centre

The Basic activities and role of the CHC under NPHCE are as under:

- First Referral Unit: CHC will be the first medical referral unit for patients from PHCs and below.
- Geriatric Clinic: CHC will arrange dedicated and specialized Geriatric Clinics for the elderly persons twice a week.
- Rehabilitation Services: Physiotherapist/Rehabilitation worker will be provided at CHC for physiotherapy and medical rehabilitation. Domiciliary visits by the rehabilitation worker will be undertaken for bed-ridden elderly and counselling to family members for care such patients.

Staff	Number	Rumeneration (Rs. p.m.)	Costs per annum (Rs. Lakh)
Rehabilitation Worker	1	15000	1.80

- Referral for further investigations and treatment to District Hospitals/Medical Colleges as per need.
- Data Compilation: Compilation of data received from all the PHCs in jurisdiction of CHCs on elderly and forwarding the same to the District Programme Officer (NCD)

Following items will be made available at the CHC:

- Nebulizer
- Glucometer
- ECG Machine
- Pulse Oximeter
- Defibrillator
- Multi - Channel Monitor
- Shortwave Diathermy
- Cervical traction (intermittent)
- Walking for gait training equipment
- Walking Sticks / Calipers
- Shoulder Wheel
- Pulley
- Walker (ordinary)
- Cervical traction (manual).

2.3.4 District Hospital

Geriatric Unit will be set up in District Hospitals with following functions:

- Geriatric Clinic for providing regular dedicated OPD services to the Elderly for examination and management of their illnesses.
- Geriatric Ward (10-bedded) for in-patient care to the Elderly. Out of the 10 beds, 2 beds will be earmarked in a separate room for the provision of respite care to the bed ridden.
- Facilities for laboratory investigations and provision of medicines for geriatric medical and health problems
- Existing specialities like General Medicine; Orthopaedics, Ophthalmology; ENT services etc. will provide services needed by elderly patients.
- Providing training to the Medical officers and paramedical staff of CHC's and PHC's
- Provide referral services to the elderly patients referred by the CHCs/PHCs etc
- Conducting camps for Geriatric Services in PHCs/CHCs and other sites
- Referral services for severe cases to tertiary level hospitals/ Regional Geriatric Centres

To carry out various functions at the District level, District Geriatric Unit will be set up as per following guidelines:

- (a) Provision of land/space for new construction/renovation/extension of the existing building for setting up of 10 bedded Geriatric Ward along with Geriatric Clinic for OPD.

Suggestive architectural sketch is provided at Annexure- VII. The State Government and District Hospital authorities have the flexibility to design the Unit based on availability of the space, as long as outcomes are met and no additional budget is required from GOI.

- (b) Ten-bedded Geriatric ward will be established at each of the identified District Hospital for providing dedicated health care to the geriatric patients. Out of these 10 beds, 2 beds will be earmarked in a separate room for the provision of respite care to elderly bed ridden / home bound persons.
- (c) Geriatric Clinic for specialized OPD services. Efforts should be made to minimize movement of the Elderly in the hospital for examination by Specialists and laboratory investigations.
- (d) Keeping in view the scarcity of specialists in geriatric field, the existing specialists in various fields who are either trained in geriatric or interested in the field be utilized for managing Geriatric Clinic and Geriatric Wards. Additional staff sanctioned under NPHCE are given below:

Staff	Number	Remuneration (Rs. p.m.)	Costs per annum (Rs. Lakh)
Consultant Medicine	2	50000	12.00
Nurses	6	15000	10.80
Physiotherapist	1	15000	1.80
Hospital Attendants	2	7500	1.80
Sanitary Attendants	2	7500	1.80
Total per month	13	95000	28.20

- (e) Investigations: It will be the responsibility of the concerned district hospital to provide lab services, x -ray and other special investigations required for the elderly. A special collection centre should be provided in the OPD block.
- (f) Referral Services: The institution will be responsible to provide secondary health care to the cases referred from within the district.
- (g) Drugs and Consumables: Additional drugs and consumables can be purchased out of provision of Rs. 10 lakh under the Programme. Any further expenses on this count shall be borne from hospital's own resources.

Following items will be made available at the District Hospital:

- Nebulizer
- Glucometer
- ECG Machine
- Defibrillator
- Multi-channel Monitor
- Non invasive Ventilator
- Shortwave Diathermy
- Ultrasound Therapy
- Cervical traction (intermittent)
- Pelvic traction (intermittent)

- Tran electric Nerve stimulator (TENS)
- Adjustable Walker.

2.3.5 Regional Geriatrics Centres

The programme will support establishment of Geriatrics Centres in the Department of Medicine of 8 following selected Medical Institutions of the country.

	Regional Institutes	States Linked
1	All India Institute of Medical Sciences, New Delhi	Delhi, Haryana, Uttarakhand, Punjab Himachal Pradesh, Madhya Pradesh
2	Institute of Medical Sciences, Banaras Hindu University, Uttar Pradesh	Uttar Pradesh, Bihar, Jharkhand, West Bengal
3	Sher-e-Kashmir Institute of Medical Sciences, Srinagar, Jammu & Kashmir	Jammu & Kashmir
4	Govt. Medical College, Tiruvananthapuram, Kerala	Kerala, Southern Districts of Karnataka & Tamil Nadu
5	Guwahati Medical College, Guwahati, Assam	Assam & NE States
6	Madras Medical College, Chennai, Tamil Nadu	Tamil Nadu, Andhra Pradesh, Orissa
7	SN Medical College, Jodhpur, Rajasthan	Rajasthan & Gujarat
8	Grants Medical College & JJ Hospital, Mumbai, Maharashtra	Maharashtra, Goa, Northern Districts of Karnataka, Chattisgarh

These will be termed as **Regional Geriatric Centres**. Following will be the key functions of the Regional Geriatric Centres:

- Provide tertiary level services for complicated/serious Geriatric Cases referred from Medical Colleges, District Hospitals and below.
- Conducting post graduate courses in Geriatric Medicine.
- Providing training to the trainers of identified District hospitals and Medical Colleges
- Developing evidence based treatment protocols for Geriatric diseases prevalent in the country.
- Developing/and updating Training modules, guidelines and IEC materials.
- Research on specific elderly diseases.

To carry out various functions at the District level, District Geriatric Unit will be set up as per following guidelines:

- (a) Land/Space provision: Provision of land/space for new construction/ renovation/ extension of the existing building for setting up of 30 bedded Geriatric Ward along with Geriatric Clinic and academic and research units etc. Suggestive architectural design is provided at Annexure- VIII, but State govt./institution is free to adopt their own design as long as outcomes are met and no additional budget is required from GOI beyond Rs. 200.00 lakh).

(b) The Medical Institution is responsible to earmark minimum two beds dedicated to the elderly patients in the various specialties in their hospital viz. Surgery, Orthopedics, Psychiatry, Urology, Ophthalmology, Neurology etc.. These will be in addition to the creation of separate 30 beds for Geriatric Medicine for which assistance is being provided in the NPHCE

(c) An indicative list of furniture, machinery and equipment required is given below:

<u>Furniture</u>	
1.	Fowlers bed
2.	Side table and stool
3.	IV Stand
4.	Examination Table
5.	Partition Screen
6.	Wheel Chair
7.	Patients Trolley
<u>Machinery and Equipment:</u>	
1.	Shortwave Diathermy,
3.	Cervical traction (intermittent)
4.	Pelvic traction (intermittent),
5.	Trans electric Nerve stimulator (TENS),
6.	Adjustable Walker,
7.	ADL Unit (activities of daily living),
8.	Including hand functions,
9.	Interferential therapy for Pain,
10.	Continuous passive Motion Units for Shoulder ,
11.	Knee, Modular Monitor,
12.	Aero – Beds, Noninvasive Ventilator,
13.	Invasive Ventilator,
14.	Other Equipment for Defibrillators,
15.	Emergency Trolleys (with multichannel monitors),
16.	Portable X-ray unit, Portable Ultrasound,
17.	Provision of Video Conferencing Unit

(d) Geriatric Clinic with Specialized services: It will be the responsibility of the concerned regional institutions to organize specialized OPDs in all the specialties available with them for the benefit of the Elderly. Staff for the newly created Geriatric Clinic will be funded under NPHCE. All the other specialists will be from existing human resources of the institution. The Institution shall not wait for the commissioning of the building for

provision of OPDs. They will have to start OPDs immediately on launch of this programme from within existing infrastructure.

- (e) Deployment of Specialists: Keeping in view the scarcity of specialist in geriatric field, the existing specialist in various fields who are either trained in geriatric or interested in the field be utilized for managing geriatric OPD and geriatric wards. Details of additional contractual staff for Regional Geriatric Centre supported under the programme are given below. Their recruitment will be made by the Medical Institution:

Staff	Number	Remuneration (Rs. p.m.)	Costs /annum (Rs. Lakh)
Professor Geriatric Medicine	1	75000	9.00
Assistant Professor	2	50000	12.00
Senior Resident/ Medical Officers	4	40000	19.20
Nurses	16	15000	28.80
Physiotherapist (3) Occupational Therapist (1)	4	15000	7.20
Medical Social Worker	1	15000	1.80
Lab Technician	1	15000	1.80
Program Assistant	1	12000	1.44
Hospital Attendant	4	7500	3.60
Sanitary Attendant	4	7500	3.60
Total per month	38	252000	88.44

- (f) Investigations: It will be the responsibility of the concerned regional institutions to provide for lab services, x-ray and other special investigation services for elderly. A special collection centre will be provided in the OPD block.
- (g) Drugs and Consumables: A provision of Rs 20 lakh per annum has been made for each Regional Geriatric Centre for Drugs and Consumables under the Programme. Any further expenses on this count shall be borne from the institutions/states own resources.
- (h) Referral Services: The institution will be responsible to provide tertiary health care to the referral cases from the medical colleges, district hospitals and below.
- (i) Training: Infrastructure and facilities, including audio-visual aids available in the institution will be utilized for various training courses envisaged under NPHCE.

- (j) Post-graduation in Geriatric Medicine: The institution will be responsible for initiating process for creating 2 post graduate seats for MD in Geriatric Medicine with affiliated Universities.
- (k) Research: The department will undertake clinical, epidemiological and applied research in the field of gerontology and geriatrics from the available grant under the programme. Areas of research will be finalized in consultation with National NCD Cell. Multi-centric studies will be encouraged for programme related research.
- (l) Guidelines have been developed in collaboration with WHO for management of 30 bedded geriatric ward and may be perused for running the Centre (Annexure II).

2.3.6 Activities at State level

The selected state will be provided support to develop capacity for providing the full complement of preventive, curative and rehabilitative services for the Elderly through various facilities strengthened under the programme. Following activities will be performed at the State level:

A. Community awareness

Public awareness through various channels of communication will be organized by the State NCD cell to sensitize public about the Health Care of the Elderly promotion of healthy life style and services made available under the programme. Mass media through Radio, Television, Print media will be used for public awareness using the most effective channels that have reach to the community. Mid media and locally prevalent folk media may also be used to reach the targeted population, particularly in rural areas

B. Planning, Monitoring & Supervision:

The State NCD cell will undertake situational analysis and prepare State Plan that spells out physical targets, means of coordination, supervision and monitoring related to various components of NPHCE in the State. Formats prescribed for reporting to Central NCD Cell will be used to report physical and financial progress made under the programme. Monthly reporting forms by Sub-centre (Form 1), PHC (Form 2), CHC (Form 3), District Hospital (Form 4), Regional Geriatric Centre (Form 5) will be forwarded to District NCD Cell for onward transmission to the States. The information will be compiled by State NCD Cell in Form 6 & 7 and submitted to National NCD Cell on a monthly basis. These Forms are given at Annexure III.

Responsibility of reporting, flow of information and frequency of reporting is summarized below:

Level	Reporting Form	Person in charge	Reporting to:	Frequency of submission
Sub-centre	Form 1	ANM/MHW	MO I/c PHC	Monthly
PHC	Form 2	MO I/c PHC	District NCD cell	Monthly
CHC	Form 3	MO I/c Geriatric Clinic	District NCD cell	Monthly
District	Form 4	MO I/c Geriatric Clinic	State NCD cell	Monthly
Regional Geriatric Centre	Form 5	Prof. & Head, Medicine	State NCD Cell	Monthly
State	Form 6 & 7	SPO (NCD)	National NCD cell	Monthly

C. Training of Human Resources

Plan for training of personnel of various facilities under the programme will be prepared by the State NCD Cell describing training institutions, duration, broad curriculum etc. Training calendar will be prepared for training of various cadres of personnel. Prototype of training kits for each category of trainee will be prepared by Central NCD Cell. Following categories of personnel will be trained under the programme for this component:

- a. Doctors
- b. Nurses
- c. Physiotherapist/ Rehabilitation Workers
- d. Medico-social Worker
- e. ANM, and Male Health Worker

Detailed training plan of staff is to be prepared based on following norms:

Facility	Doctor	Nurse	Physiotherapist/ Rehabilitation Worker	Medico-social Worker	Lab. Tech.	ANM/ MHW
Sub-Centres						2
PHC	1	2				
CHC	1	2	1			
District Hospital	2	6	1			
Regional Geriatric Centre	6	16	4	1	1	
Duration (Days)	Training will be integrated with NPCDCS					
Training Institute	Medical Colleges	Nursing Colleges	Medical Colleges	Selected Training Institute	Med. Coll.	CHC/ DH

Training guidelines and financial norms developed under NPCDCS will be applied for training under NPHCE. As far as possible, newly appointed staff under both the programmes will be trained jointly.

D. Financial Management:

State will monitor release of funds and expenditure incurred under various components of the programme in the State. State NCD Cell will submit monthly statement of expenditure in the prescribed format to the State Health Society and National NCD Cell.

2.3.7. Activities at Central level

The Government of India will facilitate implementation of the programme in selected districts and States for NPHCE. Following will be key activities coordinated by the NCD cell in the Directorate General of Health Services, Ministry of Health and Family Welfare:

A. Selection of States and Districts

The programme would be implemented in the country in phased manner. During the remaining period of 11th Five Year Plan, 100 districts in 21 states will be selected. Further expansion will be undertaken during the 12th Five Year Plan. Districts and States that will be covered during 2010-12 are given at Annexure IV.

B. Information, Education & Communication

Central will prepare prototype IEC material on Health Care of the Elderly to sensitize community about care, promotion of healthy life style and inform about services available through various electronic, print media, and other channels. These will be disseminated to States for translation, adoption and dissemination. Messages through mass media will also be organized centrally through Radio, Television, Internet and Print media.

C. Support to Regional Geriatric Centres

Central NCD cell will provide support and monitor functioning of 8 Regional Geriatric Centres strengthened and supported under NPHCE.

D. Training

Central NCD cell will prepare a plan for central level training programmes through Regional Geriatric Centres and other training institutions. Most of the Central level training will be integrated along with training envisaged under NPOCDCS.

E. Monitoring, Evaluation and Research

Standard formats for recording and reporting will be prescribed by the Central NCD Cell and will be used by various facilities, District and State NCD Cell. A Management Information System will also be developed to computerize the information. Review meetings of State Programme Officers (NCD) will be organized on a quarterly progress to assess physical and financial progress and discuss constraints in implementation of the programme

Independent evaluation of various components of the programme will also be planned and organized by the Central NCD cell. Key gaps identified during implementation of the programme and innovative interventions will be addressed through planned operational research. Most of the studies will be undertaken in coordination with Regional Geriatric Centres,

3. FINANCIAL GUIDELINES

3.1 Financial Provision for State & District under NPHCE

Financial management groups (FMG) of Programme Management support units at state and district level, which are established under NRHM, will be responsible of maintenance of accounts, release of funds, expenditure reports, utilization certificates and audit arrangements.

The funds will be released to States/UTs through the State Health Society to carry out the activities at different levels as envisaged in the operational guidelines. Funds release from State to District Health Society would inter alia include funds for CHCs, PHCs and Sub- centres to cover the entire District.

State shall have the flexibility for inter-usability of funds from one component to another limited to a ceiling of 10%, in order to impart operational flexibility in implementation of these programmes. NPHCE would operate through NCD Cells constituted under NPCDCS at State and District levels. A separate bank account in a nationalized bank should be opened for NPHCE. The Statement of Expenditure (SOE) and Utilization Certificate (UC) as per GFR shall be submitted in prescribed formats given at Annexure V & VI.

3.2 Financial Assistance under NPHCE

The funds will be released to Sub-Centre (SC), Primary Health Centres (PHC), Community Health Centre (CHC), District and State facilities through NRHM structure. The details are given in the guidelines as per unit cost at various levels. The total funds to be released to each State would be based on number of units to be taken up at different levels. Assistance to various facilities/units is summarized below:

3.2.1 Assistance for Sub Centre

Rs. Lakh

Component	Non Recurring	Recurring p.a.
Aids and Appliances	0.20	0.10.
Total	0.20	0.10.

80% of grant will be Central share and 20% State share

3.2.2 Assistance for Primary Health Centre

Rs.Lakh

Component	Non Recurring	Recurring p.a.
Machinery & Equipment	0.30	0.20
Training & IEC		0.30
Total	0.30	0.50

80% of grant will be Central share and 20% State share

3.2.3 Assistance to Community Health Centres

Rs. in Lakh

Component	Non Recurring	Recurring p.a.
Machinery and Equipment	0.50	0.50
Training of doctors/staff from PHCs/SCs & IEC.		1.20
Human Resources (Contractual)		1.80
Total	0.50	3.50

3.2.4 Assistance to District Hospitals

Rs. in Lakh

Component	Non Recurring	Recurring p.a.
Construction/renovation/extension of the existing building and furniture of Geriatrics Unit with 10 beds and OPD facilities.	80.00	
Machinery and Equipment	7.00	3.00
Drugs and consumables		10.00
Training of doctors and staff from CHCs & PHCs.		0.80
Public Awareness and IEC		2.00
Human Resources (Contractual)		28.20
Total	87.00	44.00

3.2.5 Assistance for Regional Geriatric Centres

Rs. in Lakh

Component	Non Recurring	Recurring p.a.
Construction/renovation/extension of the existing building and furniture of department of Geriatrics with 30 beds and OPD facilities including academic and research wing.	200.00	
Machinery and Equipment	50.00	10.00
Video Conferencing Unit	120.00	
Drugs and consumables		20.00
Research Activities		40.00
Human Resources (Contractual)		88.44
Training to faculty members and doctors from district hospitals.		5.00
Total	370.00	163.44

**NATIONAL PROGRAMME FOR THE HEALTH CARE OF THE ELDERLY
[NPHCE]**

Memorandum of Undertaking between Ministry of Health & Family Welfare, Government of India and Department of Health, Government/UT Administration of _____ for implementation of the “National programme for Health Care of Elderly”

1. Preamble

- 1.1 Whereas with increasing life expectancy and with demographic ageing, the number of persons above the age of 60 years has increased steadily from 2 crore in 1951 to over 7.6 crore in 2001.
- 1.2 Whereas, in view of the aforementioned and also the recommendations made in the “National Policy on Older Persons” as well as State obligations under “The Maintenance and Welfare of Parents and Senior Citizens Act, 2007”, the Ministry of Health & Family Welfare has launched a “National Programme for the Health Care of Elderly” (NPHCE) during the 11th plan period at an estimated cost of Rs.288 crore for the remaining 2 years of the 11th Plan Period.
- 1.3 Now therefore, the signatories to this Memorandum of Understanding have agreed as set out herein below:

2. Duration of the MoU

- 2.1 This MoU will be operative with effect from _____ and will remain in force till 31st March, 2012 or till its renewal through mutual agreement whichever is earlier.
- 2.2 The Memorandum of Understanding is being signed between Ministry of Health Govt. of India (hereafter referred to as ‘MoHFW’) and the State Govt./UT Administration of ----- (Name of the State/UT) (hereafter referred to as ‘State’) for providing accessible, affordable, and high-quality long-term, comprehensive and dedicated care services to an ageing population as per the terms and conditions given below:-
- 2.3 The programme shall be run under umbrella scheme of National Rural Health Mission and will be implemented as a Centrally Sponsored Scheme. The funding mechanism and appraisal process shall be the same as adopted under the NRHM.

3. Financing:

- 3.1 The MoHFW will provide a resource envelope to support the implementation of NPHCE by the State.
- 3.2 The total approved budget for this programme during the period 2010-11 and 2011-12 is Rs.288.00 crore. As per the approved scheme, the share of programme funding will be in ratio of 80:20 between the Government of India and States/UTs (except for central activities like funding for Regional Medical Institution and activities under NCD Cell). Funding will be for both recurring and non-recurring activities. Non recurring activities shall, inter alia, include, construction/renovation/extension of 30 bedded Geriatric ward, OPD, academic section and research wing in Regional Medical Institute, 10 bedded Geriatric ward at the District Hospitals and Machinery & Equipment.

The State shall be encouraged to fund civil work components of the Scheme through NRHM wherever possible.

4. Government of India Commitment

- 4.1 Setting up of National NCD Cell: MoHFW shall set up one NCD Cell at the central level for the monitoring and implementation of all NCDs under the newly proposed National Programme for Prevention and Control of Cancer, Diabetes, CVD and Stroke. The central cell will be responsible for overall coordination and operationalization of this programme. It shall also function as a technical resource centre for the Ministry/Directorate.
- 4.2 Timely provision of programme funding to the tune of 80% (Central Share) to the State.
- 4.3 In addition to the above, the MoHFW shall undertake to do the following:-
 - (i) Preparation and dissemination of technical & operational guidelines on all aspects relating geriatrics and implementation of the National Programme.
 - (ii) Capacity building of health functionaries of Health care system at Primary, Secondary and Tertiary levels (including developing various training modules, etc.).
 - (iii) Development of IEC strategy.
 - (iv) Liaisoning with all stakeholders.
 - (v) Web-based monitoring of programme activities at each level.
 - (vi) Report to the Ministry/Directorate.
 - (vii) Funding of regional medical institutions as per their budgets/.
 - (viii) Conducting third-party external evaluation at the end of the 11th Five Year Plan.

5. State Government Commitments:- The State/UT shall -

- a) Setting up of State NCD Cell [proposed under the National Programme for Prevention and Control of Cancer, Diabetes, CVD and Stroke (NPCDCS) in States where NPCDCS is in operation]. State where NPCDCS is not in operation shall set up separate NCD/Geriatric Cell at State and District level.
- b) Appoint a State Nodal officer for liason with Central Government, various State & District authorities as well as Regional Medical Institute.
- c) Prepare State Programme Implementation Plan based on the approved components of the NPHCE and submit to the MoHFW for approval.
- d) Contribute 20% of the programme cost (excluding the expenditure on Regional Medical Institutes)
- e) Provide land/space for the Geriatric ward & OPD
- f) Provide supportive faculty in specialties other than internal medicine
- g) Provide diagnostic support services like Laboratory, Radiological and other investigational facilities.
- h) Supplement the expenditure on equipments, drugs and consumables
- i) Start up P.G. Course in Geriatric Medicine @ 2 seats per year Regional Medical Institutes (by the States in which the Regional Medical Institutes is located)
- j) Conduct training and IEC activities
- k) Identify 5 district hospitals nearer to identified regional medical institutes for establishing 10 bedded Geriatric ward and regular OPD
- l) Set up of rehabilitation unit at CHCs falling within the identified districts
- m) Shall take over the responsibility from central Govt. once the units are fully functional, during the 12th Plan Period.

6. Monitoring

- 6.1 The State NCD Cell/Geriatric Cell, whichever applicable, shall supervise and monitor the progress of implementation of the scheme up to district level. The activities at Regional Medical Institutes will be monitored by MoHFW in co-ordination with state geriatric cell. The programme will be reviewed by an independent agency at the end of the 11th Five Year Plan.

7. Bank accounts of the societies and their audit

- 7.1 Funds released under the scheme will be kept in interest bearing accounts in any designated nationalized bank or as specified by the Ministry of Health & Family Welfare, Government of India
- 7.2 The State Government will prepare and provide to the Ministry of Health & Family Welfare, Government of India, an annual consolidated statement of expenditure, including the interest that may have accrued. The interest generated on the funds released by Govt. of India will be adjusted during the release of funds for each installment
- 7.3 The funds shall be subject to statutory audit by the Comptroller and Auditor General of India

8. Suspension

- 8.1 Non compliance of the commitments and obligations set hereunder and /or upon failure to make satisfactory progress may require Ministry of Health and Family Welfare, Government of India, to review the assistance committed through this MOU leading to suspension, reduction or cancellation the assistance. The Ministry of Health and Family Welfare, Government of India shall give advance adequate alert to the State Government before contemplating any such action.

And whereas the State of have been selected for implementation of NPHCE as mentioned above, this MOU is being signed between the State of ----- and Ministry of Health and Family Welfare, Government of India.

The MOU will be operative w.e.f.-----to-----
Signed on this day, the-----of-----,
-----200 between MoHFW, Govt. of India and the State Govt.

For and on behalf of the Government of India, Ministry of Health & Family Welfare	For and on behalf of the State Government of -----
Joint Secretary Ministry of health & Family Welfare, Government of India	Principal Secretary (H & FW) Government/Administration of ----- -----
Date-----	Date-----

Guidelines for Development of Geriatric Centre in Medicine Department of Medical Colleges (Report of Core Group Meet – developed in collaboration with Madras Medical College, WHO and Ministry of Health and Family Welfare):

1. There is an urgent need for developing specialized health services for older people at primary, secondary and tertiary care level in view of their rapidly increasing number with varied health, economic and psycho-social needs.
2. There is a need to develop comprehensive preventive, curative and rehabilitative services at all levels of care e.g. health care and long term care institutions, community and home (domiciliary) care and these services should be in continuum and interlinked.
3. The objective of developing departments of Geriatric Medicine in medical colleges hospitals should be:
 - To provide affordable and accessible health care of highest possible quality.
 - To build capacity in geriatric care through periodic continuing education programs; and short-term and long term training programs for medical professionals, nurse, paramedical personnel and caregivers.
 - To carryout quality research in geriatrics and gerontology to develop evidence base for service and training and enhance knowledge.
4. Geriatric Medicine service should be developed as an independent specialty, integrated with other services and specialties of the institution. Patients should be referred to this services from various departments with the following guidelines:
 - Age-60 years and above, with preference to the very old (80+)
 - Frail older patients with poor functional status
 - Older patients with multiple medical, psychological and social problems
5. The Department of Geriatric Medicine in the medical college hospitals should provide: acute, care, intermediate care and long-term care, in continuum, with focus on improving the functional status, independence and quality of life.
6. The Department of Geriatric Medicine in the medical college hospitals should develop outreach service for patients discharged to community to provide adequate follow-up care by networking with community health care professionals and civil society institutions.
7. The Department of Geriatric Medicine in the medical college hospitals should provide a dedicated outpatients service daily. Comprehensive Geriatric Assessment should be done on every patient.
8. Services from allied specialties of surgery, ophthalmology, oto-rhino-laryngiology (ENT) urology, psychiatry, orthopedics, dental survey and physical medicine and rehabilitation should be provided at least once a week. The faculty and resident staff for these services should be provided from the existing department of the medical college.
9. Specialized clinics such as: Incontinence Clinic, Dementia Clinic, Falls Clinic etc should be organized at least once a week.

10. The in-patient service should have a 30-bed ward with separate male and female wards of 15 beds each providing 3 acute care, 7 sub-acute care and 5 long-term care beds.
11. The staff pattern should be as following, as per the norms of Medical Council of India for starting a postgraduate course in Geriatric Medicine:

S.No.	Staff	No
1.	Clinical Faculty in Geriatric Medicine: Professor Assistant Professors Adjunct Faculty for specialty services from the following departments of the host all college: Surgery, ENT, Ophthalmology, Urology, Psychiatry, Orthopedics, Dental & PMR.	1 3
2.	Residents per year	4
3.	Nurse	10
4.	Clinical Psychologist	1
5.	Physiotherapist	2
6.	Medical Social Worker	1
7.	Hospital Attendant	4
8.	Sanitary Attendant	4

12. The Faculty in Geriatric Medicine should possess a postgraduate qualification in General Medicine /Geriatric Medicine / Family Medicine with experience as per MCI norms.
13. The following machinery and Equipment is to be provided to the Department:
 - (a) Physiotherapy equipments;; Short wave diathermy, wax bath, Interferential Therapy Unit, Exercise Therapy Unit – Parallel Bars, Stationary Cycle, Mariner’s Wheel etc. Assistive Devices – Working frames, Wheel chairs, Bedside Chairs, Hoist etc.
 - (b) Medical equipments: ECG machine, nebuliser, Suction Apparatus, Ventilator – 2, Non Invasive Ventilator, Cardiac Monitor – 6, pulse Oxymeter – 6, Alpha Beds – 6, Ambu bag, Laryngoscope, Ophthalmology, Ottoscope, Lab equipments – Light microscope, Centrifuge, X-Ray Viewing box, infusion pump, Glucometer.
 - (c) Radiology equipments: Portable X-Ray Unit, Portable Ultrasound
 - (d) Audio visual equipments: LCD Projector, Overhead projector.
14. The Department of Geriatric Medicine in the Medical College hospitals should have the following building outlay for the inpatient and outpatient services.

Out-patient Department:

- (a) Waiting hall / registration room-36 sq.m with computer, telephone.
 - (b) Three OPD Cubicles each 6 sq.m.
 - (c) Pharmacy
 - (d) Special Clinic
 - (e) Resuscitation room
 - (f) Physiotherapy
 - (g) ECG-12 sq.m.
 - (h) Basic Radiology Services
 - (i) Laboratory / sample collection room
 - (j) Counseling room
 - (k) Demonstration room 36 sq.m.
 - (l) Library
 - (m) Faculty room 11 sq.m.
 - (n) Injection room 12 sq.m.
- { (for both out-patients and in-patients)

In-patient Services (30 bed ward)

- Male wards: 15 beds (3 acute care, 7 sub-acute and 5 long term care)
 - Female wards: 15 beds (3 acute care, 7 sub-acute and 5 long term care)
 - Pantry room, linen room, nursing station, duty doctor's room, side lab, procedure room
 - Classroom, lecture hall, faculty room, library, administrative office
15. General guidelines of Age-Friend Environment such as wide corridors, ramps, railings, grab bars, anti-skid tiles, adequate illumination, toilet for the disabled and elevators should be implemented in the outpatient and inpatient facility.
16. The Department of Geriatric Medicine in the medical college hospitals should develop a comprehensive database, website, practice guidelines, model outpatient and inpatients records, assessment (cognitive and functionality).
17. The Department of Geriatric Medicine in the medical college hospitals should carry out research on: the biology of ageing, social and psychological aspects of ageing and family support, care-giver burden, epidemiology of various old age disease, innovations in interventions, anti-ageing medicine etc, as single centre or multi-centric studies with funding from national and international agencies.

**National Programme for Prevention & Control of Cancer, Diabetes,
Cardiovascular Diseases and Stroke (NPCDCS)**

Districts Covered during 2010-11

S.No.	States	Distt. S.No.	Districts	CHCs	Sub Centres
1	Andhra Pradesh	1	Nellore	6	481
		2	Vijayanagaram	7	470
2	Assam	3	Dibrugarh	6	240
		4	Jorhat	4	142
3	Bihar	5	Vaishali	2	336
		6	Rohtas	1	186
4	Chhattisgarh	7	Bilaspur	10	379
5	Gujarat	8	Gandhi Nagar	6	171
		9	Surendranagar	11	200
6	Haryana	10	Ambala	3	102
7	Himachal Pradesh	11	Chamba	7	170
8	Jammu & Kashmir	12	Leh (Ladakh)	3	24
		13	Udhampur	2	97
9	Jharkhand	14	Bokaro	8	116
10	Karnataka	15	Shimoga	11	307
		16	Kolar	6	201
11	Kerala	17	Pathanathitta	13	230
12	Madhya Pradesh	18	Ratlam	5	158
13	Maharashtra	19	Washim	7	153
		20	Wardha	6	181
14	Sikkim	21	East Sikkim	0	48
15	Orissa	22	Naupada	4	95
16	Punjab	23	Bhatinda	9	136
17	Rajasthan	24	Bhilwara	16	415
		25	Jaisalmer	6	136
18	Uttarakhand	26	Nainital	4	136
19	Tamil Nadu	27	Theni	6	162
20	Uttar Pradesh	28	Rae Bareilly	11	377
		29	Sultanpur	14	403
21	West Bengal	30	Darjeeling	11	230
21	TOTAL	30		205	6482