

REPORT NO.

PARLIAMENT OF INDIA RAJYA SABHA

DEPARTMENT-RELATED PARLIAMENTARY STANDING COMMITTEE ON HEALTH AND FAMILY WELFARE

NINETY- FOURTH REPORT

On

DEMANDS FOR GRANTS 2016-17 (DEMAND NO. 43) OF THE

DEPARTMENT OF HEALTH RESEARCH

(Ministry of Health and Family Welfare)

(Presented to the Rajya Sabha on 27th April, 2016) (Laid on the Table of Lok Sabha on 27th April, 2016)



Rajya Sabha Secretariat, New Delhi April, 2016/ Vaishakha, 1938 (SAKA)

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^{*} to be appended at printing stage.

<u>DEPARTMENT-RELATED PARLIAMENTARY STANDING COMMITTEE ON</u> HEALTH AND FAMILY WELFARE (2015-16)

1. Prof. Ram Gopal Yadav - Chairman

RAJYA SABHA

- 2. Shri Ranjib Biswal
- 3. Shri Rajkumar Dhoot
- 4. Dr. Bhushan Lal Jangde
- +5. Smt. B. Jayashree
- 6. Dr. R. Lakshmanan
- 7. Shrimati Kahkashan Perween
- 8. Shri Ambeth Rajan
- 9. Shri Jairam Ramesh
- ^10. Dr. T.N. Seema

LOK SABHA

- 11. Shri Thangso Baite
- 12. Dr. Subhash Ramrao Bhamre
- 13. Shrimati Ranjanaben Bhatt
- 14. Shri Nandkumar Singh Chauhan
- 15. Dr. Ratna De (Nag)
- #16. Shri Devendra alias Bhole Singh
- 17. Dr. (Smt.) Heena Vijay Gavit
- 18. Dr. Sanjay Jaiswal
- 19. Dr. K. Kamaraj
- 20. Shri Arjunlal Meena
- 21. Shri J. Jayasingh Thiyagaraj Natterjee
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- 25. Dr. Manoj Rajoria
- 26. Dr. Shrikant Eknath Shinde
- 27. Shri R.K. Singh
- 28. Shri Kanwar Singh Tanwar
- 29. Shrimati Rita Tarai
- 30. Shri Manohar Untwal
- 31. Shri Akshay Yadav

SECRETARIAT

Shri P.P.K. Ramacharyulu Additional Secretary

Shri Anil Kumar Gandhi
Shri Dinesh Singh
Shri Rajesh Kumar Sharma
Shri Pratap Shenoy

Director
Joint Director
Assistant Director
Committee Officer

⁺ ceased to be member of the Committee w.e.f. 21st March,2016.

[^] ceased to be member of the Committee w.e.f. 2nd April, 2016.

[#] ceased to be member of the Committee w.e.f. 18th April,2016.

INRODUCTION

- I, the Chairman of the Department-related Parliamentary Standing Committee on Health and Family Welfare, having been authorized by the Committee to present the Report on its behalf, hereby present this 94th Report of the Committee on the Demands for Grants (Demand No. 43) of the Department of Health Research, Ministry of Health and Family Welfare, for the year 2016-17.
- 2. The Committee held one sitting on 21st March, 2016 for examination of Demands for Grants (2016-17) of the Department of Health Research and heard the Secretary (Health Research) and other Officers thereon.
- 3. The Committee considered the Draft Report and adopted the same in its meeting held on 25th April, 2016.
- 4. The Committee while making its observations/recommendations has mainly relied upon the following documents:—
- (i) Address by the President of India to both Houses of Parliament assembled together on 23rd February, 2016;
- (ii) Speech of Finance Minister on 28th February, 2016 while presenting the Union Budget 2016-17;
- (iii) Implementation of Budget Announcements 2015-2016;
- (iv) Detailed Demands for Grants of the Department of Health Research for the year 2016-17;
- (v) Annual Report of the Department for the year 2015-2016;
- (vi) Outcome Budget of the Department for the year 2016-17;
- (vii) Detailed Explanatory Note on Demands for Grants of the Department of Health Research for the year 2016-17;
- (viii) Physical and financial targets fixed and achievements made so far during the Twelfth Plan period;
- (ix) Projection of outlays for the schemes to be undertaken by the Department during the remaining year of the Twelfth Five Year Plan;
- (x) Details of under-utilization of the allocations made under different heads during the last four years;
- (xi) Written replies furnished by the Department to the Questionnaires sent to them by the Secretariat:
- (xii) Presentation made by the Secretary (Health Research) and other concerned officers; and
- (xiii) Written clarifications furnished by the Department, on the points/issues raised by the Members during the deliberations of the Committee.

5. For facility of reference and convenience, observations and recommendations of the Committee have been printed in bold letters in the body of the Report.

NEW DELHI; April 25, 2016 Vaishakha 5, 1938 (Saka) Prof. Ram Gopal Yadav
Chairman,
Department-related Parliamentary
Standing Committee on Health and Family Welfare

REPORT (HEALTH RESEARCH)

DEMAND NO. 43

REPORT

I. Introduction

- 1.1 The Department of Health Research (DHR) was created as a separate Department within the Ministry of Health & Family Welfare by an amendment to the Government of India (Allocation of Business) Rules, 1961 on the 17th Sept., 2007. The Department became functional from November 2008 with the appointment of first Secretary of the Department.
- 1.2 The aim of the DHR is to bring modern health technologies to the people through research and innovations related to diagnosis, treatment methods and vaccines for prevention; to translate them into products and processes and, in synergy with concerned organizations introduce these innovations into public health system.
- 1.3 The following 10 functions (nine new functions, plus the ongoing function of administering the ICMR) have been allocated to the Department of Health Research:
 - Promotion and co-ordination of basic, applied and clinical research including clinical trials and operational research in areas related to medical, health, biomedical and medical profession and education through development of infrastructure, manpower and skills in cutting edge areas and management of related information thereto.
 - Promote and provide guidance on research governance issues, including ethical issues in medical and health research.
 - Inter-sectoral coordination and promotion of public private partnership in medical, biomedical and health research related areas.
 - Advance training in research areas concerning medicine and health, including grant of fellowships for such training in India and abroad.

- International co-cooperation in medical and health research, including work related to international conferences in related areas in India and abroad.
- Technical support for dealing with epidemics and natural calamities.
- Investigation of outbreaks due to new and exotic agents and development of tools for prevention.
- Matters relating to scientific societies and associations, charitable and religious endowments in medicine and health research areas.
- Coordination between organizations and institutes under the Central and State
 Governments in areas related to the subjects entrusted to the Department and
 for the promotion of special studies in medicine and health.
- Administering and monitoring of Indian Council of Medical Research.
- 1.4 With a view to fulfil its mandate of nine new functions, the DHR had formulated following five new schemes and all these schemes have since been approved and rolled out in 2013-14.
 - (i) Establishment of Multidisciplinary Research Units (MRUs) in Govt.Medical Colleges
 - (ii) Establishment of Model Rural Health Research Units (MRHRUs) in the States.
 - (iii) Establishment of Network of Research Laboratories for Managing Epidemics and Natural Calamities.
 - (iv) Human Resource Development for Health Research
 - (v) Grants in Aid Scheme for inter-sectoral convergence & promotion and guidance on research governance issues.
- 1.5 The Department has also been working on bringing suitable legislations aimed at:
 - (i) Regulating ethical issues pertaining to biomedical and heath research
 - (ii) Regulating medical, social, ethical and legal aspects of surrogacy and

(iii) Assisted reproductive technology services in the country, and also for regulating the processes for recognition of any proposed alternative systems of medicine.

II. Budgetary Allocation

2.1 The Committee has been informed that for the Twelfth Plan outlay of Rs.10,029/- crores was approved for the Department, out of which about Rs.7872.00 crores has been earmarked for the schemes/programmes during the 12th Plan Period . The scheme-wise allocation for the twelfth plan is as follows:-

Table No. 1

(Rs. in crores)

S.	Schemes/Programmes	12 th Plan	Actual cost of	Actual	Budgetary	BE 2016-
No.		Outlay	schemes/projects	Allocation		17
		(2012-17)	approved by EFC/Cabinet	Expr.	ars) by D/o	
			22 0, 0 11021100	BE	RE	
1	Establishment of a Network of Laboratories for Managing Epidemics and natural Calamities.	1084.00	646.00	160	117.86	41.50
2	Establishment of Multi- disciplinary Research Units (MRUs) in Govt. Medical Colleges and the Research Institutes.	1118.00	504.00	209.5	100.00	24.25
3	Establishment of Model Rural health Research units in the States.	246.00	67.00	50	33.60	6.00
4	Human Resource Development for Health Research	812.00	597.00	97	23.02	13.00
5	Grant-in-aid for Inter-Sectoral Convergence on Research (including International Cooperation)	1953.00	1242.00	138.5	54.40	15.25
6	Grant-in-aid to ICMR	4770.00	4770.00	2148.17	1981.74	610.00
7.	Bhopal Memorial Hospital & Research Centre, Bhopal (New)	0	0	0	0	40.00
8.	Governance and /secretariat departmental expenses	46.00	46.00	22	5.98	0.00
	Total	10029.00	7872.00	2825.17	2316.60	750.00

Notes:

- 12th Plan Allocation by the Planning Commission: 10029.00 crores.
- Approved Project Cost of schemes against the 12th Plan Allocation: 7872 crores
- Budgetary Allocation (BE) by Ministry of Finance (4 years) 2012-13 to 2015-16: Rs.2825 crores, further reduced to Rs.2316.60 crores at RE stage.
- BE 2016-17 is Rs. 750.00 crores (5th and last year of 12th Plan).

2.2 The action plan for 2016-17 is as under:-

Table No. 2

Sl.N o.	Name of the Scheme	Cumulative achievements upto	Proposed targets for 2016-17
1.	Setting up of Nation-wide Network of Laboratories for Managing Epidemics & Natural Calamities	2015-16 82 VRDLs appoved	Support to already sanctioned VRDLs and sanctioning of 5 new Regional, 7 State Level and 24 Medical College level upon the availability of resources
2.	Setting up of Multi- Disciplinary Research Units in Government Medical Colleges	70 MRUs approved	Operationalization and initiation of research activities in the already funded MRUs and sanctioning of 10 new MRUs depending upon the availability of resources
3.	Model Rural Health Research Units in the States	12 MRHRUs approved	Operationalization and initiation of research activities in the already funded MRUs and sanctioning of 3 new MRHRUs depending upon the availability of resources
4.	Human Resource Development	90 Fellowships, 12 start-up projects and support to 23 institutions/conferences	To disseminate the scheme provisions, it is intended to keep open the regional workshops and desk reviews throughout the year
5.	Grants-in-aid	181 Biomedical Research Projects approved.	100 Research projects

2.3 The Department has furnished the following information on the allocation in BE 2016-17 vis-à-vis the projected demand:-

Table No. 3 (Rs. in crores)

S.No.	Schemes of Department of Research	Projected	Allocation for
	•	requirement for	2016-17
		2016-17	
1	2	4	5
1.	Human Resource Development for Health Research	24.00	13.00
2.	Establishment of Multi-disciplinary Research Units	158.40	24.25
	(MRUs) in Government Medical Colleges and the		
	Research Institutes		
3	Establishment of Model Rural health Research units in the	13.00	6.00
	States.		
4.	(i) Establishment of a Network of Laboratories for	207.93	39.00
	Managing Epidemics and natural calamities		
	(ii) New Budget line "Development of Tools to Prevent	60.00	2.50
	Outbreaks of Epidemics" for mobilization of additional		
	resources during outbreaks/epidemics		
5.	Grant-in-aid for Inter-Sectoral Convergence & Promotion	39.00	15.25
	and Guidance on Research Governance Issues and trans-		
	disciplinary and Integrative Research, including		
	international cooperation		
6.	Grant-in-aid to ICMR	1144.10	610.00
7.	Bhopal Memorial Hospital & Research Centre, Bhopal	40.00	40.00
8.	Governance and Secretariat departmental expenses	3.00	-
	Total	1689.43	750.00

- 2.4 As is evident from the above table against the projected demand of Rs. 1689.43 crore under the Plan head for the year 2016-17, the actual allocation is Rs.750.00 crore only.
- 2.5 On being asked about the utilisation of funds of the allocation during the 12th Plan period for completion of the schemes/programmes, the Department has informed that against the total 12th Plan Outlay of Rs.10,029.00 crores, actual total allocation at R.E. stage for the four years of the 12th Plan is Rs.2316.60 crores and actual expenditure up to 21st March, 2016 is Rs.2257.15 crores. As per 21st March, 2016, there are a total of 102 proposals of DHR in each of the five schemes against which funds are yet to be released leading to a funding gap of Rs.108.79 crores. As soon as these funds are approved for release these shall be optimally utilised to achieve the goals of Research activities.
- 2.6 Total Budgetary allocation of the Department in 2016-17 is Rs.1144.80 crore out of which Rs.750.00 crore is the Plan component and Rs.394.80 crore is the non-Plan component. The Plan component reflects an increase of Rs.82.40 crore over the RE 2015-16 allocation.
- 2.7 On being asked about the projections made by the Department for 2016-17, the Department has informed that against projection of Rs.1689.00 crore (Plan) provision of only Rs.750.00 crore has been made. The major programmes likely to be affected due to shortfall include implementation of all the five schemes of Department of Health Research and proposals of ICMR for upgradation of existing infrastructure/setting up of new centres, funding of extramural research activities. However, the Department proposes to offset the effect of shortfall to the following projects:-
- (i) Priority to committed liabilities: Priority would be given to the release of funds for committed liabilities with respect to the already sanctioned units and labs under MRU, MRHRU and VRDL, Grant-in-aid projects, etc;

- (ii) Research in high priority areas: Precedence would be given to funding of new units in high priority areas in Central, Eastern and North Eastern Regions; and
- (iii) Prioritization of Research activities: ICMR will prioritize its intramural and extra-mural research activities to feed the national health programmes of public health importance.
- 2.8 In reply to a query regarding steps /actions to be taken to ensure optimum utilisation of funds allocation, the Department has informed that the following steps have been proposed to be initiated by the Department of Health Research:-
 - (i) Sanctioning of new Viral Diagnostic & Research Laboratories (VRDLs), Multi-Disciplinary Research Units (MRUs), Model Rural Health Research Units (MRHRUs) by utilising due balance expenditure;
 - (ii) Limiting funding of research projects and fellowships to the available resources; and
 - (iii) Prioritizing release of funds for the ongoing projects.
- 2.9 The Committee finds that against total 12th Plan outlay of Rs. 10,029.00 crores, actual total allocation at R.E. stage for the four years of the 12th Plan is only Rs.2316.60 crores (Table No.1) and the actual expenditure up to 21st March, 2016 is Rs 2257.15 crores. The Committee observes that the Department had projected a requirement of Rs. 1689.43 crores but the actual allocation for 2016-17 is Rs.750.00 crores (Table No. 3). This shortfall would affect the proposed targets of Schemes like Human Resources Development for Health, Establishment of VRDLs, MRUs and MRHRUs for 2016-17. The Committee was apprised of these difficulties which would be faced in completion of these schemes during the meeting of the Committee with the Secretary, Department of Health Research on 21st March, 2016. On being

asked as to what was the bare minimum requirements of additional financial resources that would be essential for carrying out the important activities of the Department, the Secretary, Department of Health and Family Welfare informed that unless Rs. 300.00 crores additional resources are provided, even the pending projects would be in a jeopardy. The Committee observes that the Department of Health Research is mandated to promote basic, applied and clinical research related to medical health and biomedical performance in cutting edge areas, starving of the on-going and proposed basic, applied and clinical research projects in the medical and public health research would prove detrimental to generation of new knowledge in the areas of health research. The Committee, therefore, lends its Parliamentary support for enhancement of funds to the tune of Rs.300.00 crores to the Department of Health Research for financial year 2016-17. This recommendation of the Committee may be immediately brought to the notice of Ministry of Finance. The Committee desires to be apprised of response of the Ministry of Finance in this regard.

2.10 The Committee also expresses its dissatisfaction on the big mismatch between the projected requirement and allocated funds (Table No.3). The Committee notes that some major programmes/schemes are likely to be affected as a result of the shortfall of Rs.939.43 crores in Plan allocation for 2016-17. The Committee desires that constraints of funds should not come in the way of the medical as well as health research. The Committee recommends that the Department prepare a comprehensive action plan while presenting its fund requirement before the Ministry of Finance which may be bifurcated into projects for which funds are desirable and projects for which funds are essential and therefore non-negotiable. Considering the fact that scientific knowledge generated through health and bio-medical research is used to develop drugs, diagnostic vaccines and devices that ultimately find place in the health care delivery systems of the country as also the fact that health research has a vital role to play in discovery and development of indigenous health products, the Committee recommends that the allocation for the Department for 2016-17 be suitably enhanced at RE stage. The Committee also impresses upon the Department to pay focussed attention to more efficient deployment of the available resources.

- 2.11 As regards increasing the Plan allocation from Rs. 667.00 crore (2015-16) to Rs.750.00 crore (2016-17) and the Non-Plan allocation of Rs.345.00 crore remaining the same in both the financial years, the Secretary and other officials during the course of the meeting held on 21st March, 2016 before the Committee inter alia informed that the Department has been trying very hard with the Finance Ministry at the RE stage by showing very good expenditure and utilisation status and had requested for additional funds but it was not given in the allocation in 2016-In consequence thereof, the effect on the running of the existing 17. facilities/liabilities of the Department are very huge. Citing that projects do not end in a particular financial year and all are research projects and will spill over in more than one, two or three years, funding for the projects/schemes become a challenge and the Department could not take on any new researches, if the Department could not even cater to the requirement of its ongoing project. With regard to non-plan allocation, it has been informed that it is more significant in terms of this financial year especially ongoing projects of ICMR where all critical research is going on and is being funded.
- 2.12 The Committee has in the earlier part of this Report already recommended enhancement Plan allocations for the Schemes of Department. As regards the non-plan allocations remaining stagnant during 2015-16 and 2016-17, the Committee observes that the Ministry of Finance while making non-plan allocation for the Department for 2016-17 should have taken inflation into account and made adequate non-plan allocation for 2016-17 accordingly. The Committee, therefore, recommends that the Ministry of Finance should address the inadequacy of non-plan allocation to the Department for 2016-17 after factoring in inflation.
- 2.13 The Department has informed that Plan, Non- Plan allocation and expenditure during the last three years of Twelfth Plan Period is as follows:

Table No. 4

(Rs. in crore)

Year	BE		RE		Expenditure	
	Plan	Non-Plan	Plan	Non-Plan	Plan	Non-Plan
2013-14	726.00	272.00	575.00	299.25	569.62	291.67
2014-15	726.00	291.67	610.00	322.00	590.65	320.13
2015-16	713.17	305.00	667.60	345.00	635.05*	344.75*

^{*}expenses upto 21.3.16.

2.14 In reply to a query regarding the expenditure incurred Scheme-wise vis-a-vis Plan allocation made during 2015-16, the Department has furnished the following information:-

Table No. 5
(Rs. in crore)

Sl.N	Scheme	BE	RE 2015-	Actual	Physical Progress upto
0.		2015-16	16	Exp. Upto 21.3.16	Feb., 2016
1.	i) Establishment of a Network of Laboratories for Managing Epidemics and natural calamities (VRDL)	46.00	45.25	45.25	82 VRDLS across the country have been so far sanctioned
	(ii) Development of Tools to Prevent Outbreaks of Epidemics	-	2.21	2.21	Fully utilized by providing support of (i) Rs.70.00 lakhs to Indira Gandhi Medical College, Shimla (HP); (ii) Rs.1.00 crore to SMS Medical College, Jaipur & (iii) Rs.51.00 lakhs to ICMR for NIV Pune
2.	Establishment of Multi- disciplinary Research Units (MRUs)	45.50	28.00	25.20	70 MRUs have been sanctioned across the coutnry
3.	Establishment of Model Rural health Research units in the States	10.00	6.50	6.50	12 MRHRUs have been so far sanctioned
4.	Human Resource Development for Health Research	8.00	10.00	9.00	105 fellowships/start up projects approved, besides support to 16 institutions
5.	Grant-in-aid for Inter-Sectoral Convergence & Promotion and Guidance on Health Research	32.50	16.10	12.55	181 research projects have been funded so far.

2.15 The Committee observes that there has been a major reduction at RE (2015-16) stage in respect of funds provided for establishment of multi-disciplinary Research Units (MRUs) and Grant-in-aid for Inter-Sectoral Convergence & Promotion and Guidance on Health Research. The

Committee has also been informed that establishment of MRUs depends on proposals of the respective State Governments. The Committee finds that the funds provided at RE (2015-16) stage have nearly been exhausted. The Committee therefore recommends that the Ministry of Finance should consider enhancing the funds provided in the year at RE (2016-17) stage, keeping in view the track record of fund utilisation in the previous year.

- 2.16 In reply to a query regarding the number of utilization certificates pending and the amount involved therein for the research projects/schemes funded by the Department and the efforts made in this regard, the Committee has informed that pendency of UCs in the year 2013-14 was 22 involving an amount of Rs.27.50 crore under MRUs. However, in the year 2014-15, the number of pending UCs was reduced to 3 involving a sum of Rs.1.61 crore. The pending UCs under the ICMR in the year 2014-15 were amounting to Rs. 87.00 lakhs. Explaining the efforts made by the Department for expediting settlement of UCs, it was submitted that letters had been written to the concerned medical colleges/institutes, carried out field visits and held desk review meetings. So far 45 field visits have been undertaken. The Committee notes that the efforts of the Department in settlement of pending UCs and hopes that pendency of UCs would not be a hindrance in the successful implementation of these schemes/projects.
- 2.17 The Committee finds that there is no mention of rare diseases, which are genetically inherited, let alone making Budgetary allocations. Often called Orphan diseases because of their rarity, rare diseases affect 6 to 8 percent of the world population. Today there are approximately 7000 different types of rare disorders that have been documented but this number is expected to grow further. There are millions of patients living with rare diseases in our country alone. The vast majority of these diseases are genetically inherited and exist over life time of a patient. Approximately 50 per cent of those affected by rare diseases are children of whom around 30 percent do not live to see their fifth birthday. While many countries have responded well to the management of rare diseases but our country is lagging behind in this regard. Although our country has made tremendous progress in the

field of science and medicine, very little has been invested in understanding rare diseases primarily because the patient pool is considered too small to merit serious attention and misdiagnosis is a common occurrence.

2.18 The Committee feels that there is a strong need for more research to help identify and diagnose rare diseases and to find better and more effective and affordable treatment for patients in the country and therefore, budgetary allocation in this field is a sine-qua-non. The Committee therefore recommends that the Department should consider this aspect.

III. Indian Council of Medical Research (ICMR)

- 3.1 The Indian Council of Medial Research (ICMR), New Delhi is the apex body for the formulation, coordination and promotion of biomedical research and is one of the oldest medical research bodies. The ICMR is funded for the Government of India through the Department of Health Research, Ministry of Health and Family Welfare.
- 3.2 The Council Research priorities coincide with the National Health priorities such as control and management of communicable diseases, fertility control, maternal and child health, control of nutritional disorders, developing alternative strategies for health care delivery, containment within safety limits of environment and occupational health problems, research on major non-communicable disease like cancer, cardiovascular diseases, blindness, diabetes and other metabolic and haematological disorders, mental health and drug research (including traditional remedies). All these efforts are undertaken with a view to reduce the total burden of disease and to promote health and well being of population
- 3.3 ICMR carries out intramural research training in its institutes/centres. Of 32 institutes/centres, 12 deal with communicable disease and coordinates by Division of Epidemiology and Communicable Diseases; 7 with Non-communicable diseases (NCDs) and coordinated by the Division of NCD, 2 deal with disease related to Reproductive and Child Health (RCH) coordinated by Division of RCH, 3 deal with diseases related to nutrition and are coordinated by Division of Nutrition and 3

deal with diseases related to Basic medical sciences (BMS) and are coordinated by Division of BMS.

- 3.4 Besides, ICMR funds extramural research in medical colleges, universities, institutions. An average of 1200-1500 projects annually are funded. ICMR also provides about 1200-1500 students fellowships -JRF, SRF,PDF,STS, on going and new, every year.
- 3.5 The financial performance of ICMR during the years 2014-15 and 2015-16 under Plan and non-Plan heads are as follows:

(Rs. in crore)

		2014-15			2015-16	
Head	BE	RE	Actual Exp.	BE	RE	Actual Exp. (upto 21.3.16)
Plan	531.00	505.00	505.00	568.17	556.74	534.15
Non-Plan	281.67	315.18	315.18	295.00	337.00	307.17
Total	812.67	820.18	820.18	863.17	893.74	870.02

- 3.6 The Department has informed that against the projected demand of Rs.1144.10 crore, the plan allocation for Indian Council of Medical Research (ICMR) in BE 2016-17 is Rs.610.00 crore which is just fractionally higher that the BE 2015-16 (Rs.568.17 crore). Explaining the reduction during 2015-16 at RE stage to Rs.556.74 crore, the Department had projected demand for additional grant at RE stage in view of its committed liabilities to fulfil the ongoing research activities. However, no additional allocation of fund was made at RE stage for fund crunch and the Ministry of Finance has advised the Department to use the research funds judiciously.
- 3.7 The Committee observes that in view of the dynamic inter-national health research environment and the current and future health challenges, the role of ICMR is very crucial and if its projects are plagued with underfunding, it can have very serious repercussion and undermine the desired outcomes in the health sector. The Committee, therefore, recommends that more funds be allocated to ICMR at RE stage.

- 3.8 The Department has informed that in the period (2012-13 to 2015-16), the funds approved as per plan, were Rs.3811.00 crore as against the funds received Rs.1983.78 Cr. Hence, there was a deficit allocation of 47.95% in the first four years (from 2012-13 to 2015-16). Further the ICMR had sought Rs.1100.00 crore in 2015-16 against which the funds received were to the tune of Rs.556.74 crore, thereby recording a shortfall Rs.543.26 crore.
- 3.9 On being asked about the shortfall in funds of ICMR, the Secretary, Department of Health Research during evidence before the Committee, on 21st March, 2015 submitted that:

"We have prioritised ongoing projects because once you start, it is something you cannot stop in between unless it is not performing well. But we had to write to all other investigators saying that we would not be able to fund them.Funds released to those projects which have already been started, even if delay in process. But nothing new can be started because there is a shortfall of Rs. 300.00 crore just for the approved and pending projects. So, the first thing that we have done is to stop all new projects. We are not accepting any new proposals, but even the ones that we have approved, which our Committees have looked at and said that these are good, we are not able to fund. So, I have put this across to the Finance Secretary also. I have shown him this slide that there is a shortfall of Rs.300 crores here. the Rs.300-crore gap is only in the extramural projects. When we look at this deficit, which is 1460 minus 894, it is on account of both, 300 for extramural as well as the money we need for our own Institutes, which is the intramural".

3.10 The Department has informed that (2012-13 to 2014-15), a sum of Rs.150.49 crores was available for consumables & chemicals needed for the conduct of intramural research by 32 institutes which is 6.04% of the total budget. In 2015-16, ICMR has a outstanding liability of Rs.470.00 crore on account of ongoing and approved extramural projects, whereas only Rs.157.00 crore is available. Thus, there is shortfall of Rs.313.00 crore for funding of extramural projects. Further it has been informed that the Budget of Rs.1460.10 crore was required to carry out activities for the financial year 2016-17 for carrying out its mandate. In order to

undertake high priority research initiatives & national level programmes in the fields of TB, cancer, anaemia and nutrition, an additional provision of Rs.400 crore shall be required. Thus, ICMR shall need a total of Rs.1860.10 crore for enabling it to effectively & comprehensively carry forward its mandate for conducting and supporting biomedical research at a national level.

- 3.11 The Committee takes note of the submission of the Department that shortfall in extramural and intramural projects would affect approved and pending research projects. The Committee agrees that it takes time to translate the research leads into tangible health products or in application of the knowledge generated through research and a lot of work remains to be done to bridge the gap between 'what is known' and 'what is done'. Concerted efforts are required to be made to bring research outcomes into application in the better interest of the public. The Committee therefore recommends that the Department should approach the Ministry of Finance for allocation of funds at RE stage with concrete grounds in terms of proposals and projects based on which the requirement is needed.
- 3.12 The Committee observes that the high priority research initiatives like T.B., Cancer, anaemia and nutrition which are affecting people from all strata of the society need more attention and therefore more funds are required. The Committee recommends that the Department should ensure that the research initiatives be prioritised as essential on which no compromise can be allowed. The Committee also recommends that the Department should also formulate a list of diseases which can be eradicated completely like Hepatitis, Kala Azar, Filarisis, Leprosy Measles, etc. and impress upon the Finance Ministry for allocating more funds to ICMR.
- 3.13 During the presentation on 21st March, 2016 before the Committee, the representatives of the Department of Health Research submitted the following activities of ICMR:-

New ICMR Centres addressing Priority Issues

- Samrat Ashok Tropical Disease Research Centre, Patna: 200 bedded hospital for research on neglected tropical diseases including visceral leishmaniasis (kala azar)
- ICMR-NIRTH field Station at Keylong in Lahaul & Spiti Area of Himachal Pradesh
- National Animal Resource Facility for Biomedical Research, Hyderabad
 - first of its kind for basic and applied biomedical research
 - Will provide support to academic and private R&D groups for preclinical testing

Evidence to Policy Unit (Health Technology Assessment Board)

- Priority Setting
- Treatment Guidelines
- Cost-effectiveness analysis
- Synthesizing evidence
- Commissioning Research
- Policy Briefs
- Work closely with NHSRC, many groups across country
- Will provide input to MOH on introduction of cost-effective technologies for public health.

Reaching Out to the people – working with state governments Tribal Health Research Forum

- Network of 16 ICMR Institutes.
- Sickle cell anemia, Nutrition and TB

Vector Borne Diseases Science Forum:

- Community based mosquito control for dengue and other arboviral infections
- Brain storming on newer methods of vector control
- Triple drug therapy for filariasis elimination
- Surveillance for zika
- Malaria elimination project in MP in public-private partnership mode

Affordable Indigenous Technologies Developed by ICMR in Recent Past

- Vaccine for Japanese Encephalitis
- Test for molecular diagnosis of beta thallassemia
- Magnifying device (Magnivisualizer) for cervical cancer screening
- Strips and detection system(s) for diabetes mellitus
- Test for detection of pathogenic bacteria in food
- Technologies for Vitamin A and Ferritin estimations
- Non-invasive procedure for diagnosis of visceral leishmaniasis from urine or saliva

Breast Cancer

- Data from Cancer Registries shows breast cancer incidence increasing
- Comparative Study of Genetic, Clinical & Epidemiological Factors of Breast Cancer in Rural and Urban Area of India.
- >30 years age of age, association with BRCA1 and XRCC, family history, obesity, urban living
- Cancer Management Guidelines developed for 10 cancers

Maternal health and fertility regulation

- Plotting of partograph during labour Effective tool to monitor progress of labour and take decision regarding augmentation of labour, referral or delivery by caesarean section.
- An intervention study comparing two strategies on the status of maternity preparedness among primigravida women indicated the usefulness of telephonic contact by nurses and an information package (booklet and video) has been developed.
- A user controlled contraceptive option progesterone vaginal ring (PVR) was evaluated to address the unmet need for contraception especially during the 1st year after delivery. PVR was found to be safe, efficacious and acceptable in lactating women during the 1st year after delivery similar to CuT 380A.
- A subdermal contraceptive implant ImplanonR was evaluated as a spacing method and was found to be safe, efficacious and acceptable in Indian women.

Environmental health - Air pollution

ICMR Centre for Advanced Research on Environmental Health, SRMC, Chennai

- 2 cohorts Mother-child and adult
- Health effects of air pollution: every 10 μgms/m³ PM_{2.5}
 - 4 gm decrease in birth weight
 - 1 % increase in episodes of Acute Respiratory Infections in children below 2 years of age
 - 10% increase in respiratory symptoms in adults

Decrease in Lung Functions (17ml fall in FVC ,15ml fall in FEV₁)
 Proposed study on effect of air pollution on respiratory morbidity in Delhi at 3 centres – AIIMS, VP Chest Inst and Kalawati Saran Hospital

With PHFI and NIREH, work on Global Air Pollution Hub

Focus Areas in 2016-17:

Programmes on Reproductive and Child Health

Projects on maternal & perinatal health including stillbirths, reproductive biology including effect of electromagnetic radiation on human health, reproductive tract infections, early detection and management of cervical cancer, development of new safe, effective and reversible male and female contraceptives are planned for 2016-17.

Programme on Communicable Diseases:

- i. National Anti-Microbial Resistance Surveillance Network (AMRSN) will be continued during 2016-17 to enable compilation of National Data of AMR at different levels of Health Care and Standard Treatment Guidelines for both hospitals and community will be developed.
- ii. Research-cum-Intervention on Vector Borne Disease Science Forum toward elimination of Filariasis and Leishmaniasis, Programmes on Epidemiology and Communicable Diseases for Congenital Rubella Surveillance involving Multi-centric study to monitor the rubella sero-prevalence among the pregnant women over the time; Non-Polio AFP involving Multi-centric study on aetiology and transmission dynamics of non-polio enteroviruses causing AFP; Research Projects on Leptospirosis and Other microbial infections will be funded.
- iii. Besides Task Force studies will be undertaken on Leprosy, Rickettsial Infections and Dengue.

Non-Communicable Diseases

- i. Focus will be on research activities in respect of diseases like Cancer, Cardiovascular Diseases, Diabetes, Neurology, Mental Health, Chronic Kidney Disease, Geriatrics and Oral Health.
- ii. Basic Medical Sciences: Following newer areas will be taken up: Virtual centre for Molecular Medicine, clinical pharmacology and pharmacoepidemiology;

Obesity & Metabolic Syndrome

Establishment of potassium counter facility for studies on body composition of infants and young children at NIN, Hyderabad.

Tribal Health

- i. Assessment of Non communicable Diseases and their risk factors in Tribal areas will be scaled up in various parts of the country.
- ii. Health systems preparedness for interventions for diabetes, hypertension, chronic respiratory diseases and cardiovascular disease and deaths due to non-communicable diseases among the tribal population in India.
- 3.14 The Committee observes that in a resource constrained country like India, judicious utilisation of funds is of paramount importance. Equally important is the fact that the attention should be focussed on health outcomes rather than health outlays. The Committee would therefore like the Department to get all ongoing research projects, being funded wholly or partially with Government money evaluated by an independent agency and place the findings in the public domain.
- 3.15 The Committee appreciates the achievements made by ICMR. However, for the sake of clarity, the Committee would like to recommend to the Department to introduce the achievements made into the public health systems of the country at the earliest opportunity.
- 3.16 On being asked about the road map of ICMR, the Department submitted the following by way of presentation during the meeting of the Committee held on 21st March, 2016:-

ICMR Vision Document and 5 year Strategic Framework

- Build Research Capacity
- Organize Data Systems and Platforms for Research
- Leverage Traditional Knowledge

- Enable Evidence to Policy Translation
- Strengthening Program Implementation through Research

One Year Goals

- Bring 3 indigenously developed diagnostic products to market for public health use
- Release state level disease burden estimates
- Initiate collaboration with AYUSH on leads from traditional medicine
- Set up an Evidence to Policy Unit in DHR
- Introduce Bill on
- Introduce 3 online courses in Research methodology
- Initiate mission mode projects in collaboration with DBT, CSIR, others –
 Nutrition, TB and Clean Ganga

Three Year Goals

- Have a fully functional Health Technology Assessment board
- Have one new drug lead from traditional medicine/Ayurveda complete clinical trial
- Have 5 innovations from ICMR labs in the market
- Big data analysis/genomics centre to address antimicrobial resistance
- ICMR gets University status and introduces MSc, PhD courses in all institutes

Five Year Goals

- ICMR institutes able to undertake cutting edge biomedical research
- At least 10 indigenously developed products(diagnostics, vaccines) in market and being used by MOH

- ICMR university producing 100 PhDs a year in medical disciplines
- Have capacity for drug development from early leads through preclinical and animal testing to all phases of clinical trials in humans
- 3.17 On being asked about the tripartite research policy on implementation/ coordination mechanism among the Departments of Health and Family Welfare,
 Health Research and the Ministry of AYUSH, the Department of Health Research
 in its written reply that ICMR has held discussions with the Ministry of AYUSH for
 collaboration to establish safety and efficacy of the common Ayurvedic
 formulations used for the treatment of fever and explore their beneficial effects in
 dengue patients. These preparations are: ShadangaPaniya, SamshamaniVati,
 Amrutasatva, Amritottarakwatha and NilavembuKudineer. A collaborative study
 has been planned at KLES Dr. Prabhakar Kore Hospital & Medical Research
 Centre, Belgaum, Karnataka in this regard. Safety studies will be done at ICMR's
 Regional Medical Research Centre (RMRC), Belagavi. Further disucsusions are
 planned with Ministry of AYUSH to discuss the protocol and budget of the study.
- 3.18 In reply to a query about the major research projects on traditional medicine undertaken by ICMR and follow up action for brining the achievements thereof in the mainstream of the benefit of public, the Department has informed that **f**ollowing studies on traditional medicine were undertaken:-

On-going:

- I. ICMR NIF collaborative Task Force on validation of "innovative claim of herbal healers
- II. Formulation and *in vitro* antimicrobial activity and standardization of Ayurvedic vaginal tablet in treatment of Swetaprader (excessive abnormal vaginal discharge)
- III. Quality standards and pharmacologycal studies on antiasthmatic Ayurvedic formulation Kanakasava
- IV. Chemical and molecular characterization of an important MedyaRasayana drug 'shankhpushpi'and authentication of its commercial samples

Completed

A study on *in vitro* anti- inflammatory effect of Indian Ayurvedic herbal formulation triphala and its mechanism of action.

3.19 The Committee notes that a strategic vision document of ICMR, i.e. one year, three year and five years in which the Department focus on developing new drugs, traditional medicines and taking initiatives on Nutrition, TB and Clean Ganga with the collaboration of DBT, CSIR. The studies should be completed at the earliest and desired outcomes should be achieved within the time frame fixed. Particularly study on medicines for dengue should be done on priority.

IV. Human Resource and Capacity Development

Human Resource Development (HRD) for Health Research

- 4.1 The scheme is intended to create a pool of talented health research personnel in the country by upgrading skills of faculty of medical colleges, mid-career scientists, medical students etc. by specialized training in priority areas of health research in leading national and international institutions,
- 4.2 Encourage and support the trainees to develop and take up research projects for addressing critical national and local health problems; and financial assistance to institutions for up- gradation of infrastructure to enable such institutions to provide training with state of the art technologies.
- 4.3 Human Resource Development (HRD) for health Research has following components:-
 - Short Term Fellowships for 1-3 months (In India and Abroad, Age: upto 55 years)
 - Long Term Fellowships for 6-12 months (In India and Abroad, Age: upto 45 years)
 - Programme specifically for Women who have had a break in their career

- Scholarships /fellowships to young scientists (medical /non-medical students) in newer areas.
- Programme to encourage health research personnel [Non-resident Indian (NRI), Persons of Indian Origin (PIO), Overseas Citizen of India (OCI)] serving abroad, who want to come back to India for undertaking research in identified areas.
- Support to Indian Institutes for imparting training to the Faculty of Medical Colleges/ Research Institutes.
- Strengthening of research through the establishment of online courses and web portal on health research for students, faculty and other researchers.
- Support to Scientific/Professionals/Associations/Bodies
- 4.4 On being asked about the steps taken by the Department on enhancing human resource expenditure for Health Research, the Department has informed that the following steps have been taken in this regard.
 - i. State Governments have been requested at the highest level, to disseminate the scheme provisions and to get more potential candidates.
 - ii. With a view to increase the response for submission of applications under the scheme, it has been decided to keep the advertisement open throughout the year and Regional Workshops and Desk Reviews to spread awareness have been undertaken.
- 4.5 An allocation of Rs.13.00 crore (Plan) has been made for 2016-17 under the head though the projected demand was to the tune of Rs.24.00 crore. BE 2015-16 allocation was Rs.8.00 crore which has been increased to Rs.10.00 crore in RE stage in 2015-16 and the expenditure was Rs.9.00 crore. The Department had also informed that there has been some fellowships, which were approved but funds could not be released due to procedural requirements like visa, etc., in respect of foreign fellowship due to the provision for keeping invitation of applications throughout the year open, more applications have been received by the Department and processed for fellowships.
- 4.6 In the outcome budget 2016-17, it has been informed that an advanced training in research in medicine and Health under the scheme of Human

Resource Development for Health Research (HRD) has been mooted. The target for 2016-17 is to fund 80 Fellowships, 50 start-up projects and support to 5 Institutes besides supports to 10 conferences under this scheme.

4.7 The Committee notes the efforts taken by the Department for getting a number of applications of potential candidates in research work under this scheme by advertisements kept open throughout the year and through regional workshops and desk reviews for spreading awareness. In the year 2015-16, an expenditure of Rs.9.00 crore was utilized against Rs. 10.00 crores at R.E. stage and Rs. 8.00 crores at BE stage. But the Committee expresses concern that only an allocation of Rs. 13.00 crores for 2016-17 has been made against the projected demand of Rs.24.00 crores. The Committee recommends that the Department should float a proposal before the Finance Ministry for increasing the allocation, at RE stage, by highlighting the good track record in the previous year. The Committee desires that the physical targets set for 2016-17 should be achieved.

V. Grant in aid scheme for inter-sectoral convergence & promotion and guidance on health research

- 5.1 The objective of Scheme is to bring modern health technology to the people through innovations related to diagnostic, treatment methods and vaccines for prevention; to translate them into products and processes and, in synergy with concerned organizations, introduce these innovations into public health service. The main components of the scheme are:
 - Research studies with emphasis on public health
 - Translational Research Projects
 - Joint Projects involving Inter-sectoral co-ordination/partnerships
 - Assessment of comparative/ Cost effectiveness of health technologies for public health choice
 - Support for participation in conferences abroad and conduct of national & international seminars & conferences etc.

- An allocation of Rs. 14.25 crore has been made for the above scheme in BE 2016-17, though the actual expenditure for 2015-16 was Rs.13.99 crore vis-à-vis allocation of Rs. 16.00 crore at RE stage. Target for 2016-17 is to fund 100 research projects under various components of the scheme.
- 5.3 The Committee observes that very important activities are envisaged to be accomplished under the head. The Committee in its 83rd Report on Demands for Grants (2015-16) of the Department of Health Research had observed that the accomplishment of targets set under the scheme would require involvement of detailed mechanisms for synergizing the core competencies of the different organizations/agencies. The Committee takes serious note of the under utilization of funds during 2015-16. It shows inefficient management of the resources. The Committee desires that it should not recur during current year.

VI. International Cooperation in Medical and Health Research:

- 6.1 DHR has started working on the mechanisms to facilitate and accelerate international cooperation in medical and health research by providing contributions to international organizations, participations abroad, organizing international conferences in India, and sending DHR delegations to international bodies, hosting foreign delegations and supporting Indian component of Indian studies under bilateral programme. Under this scheme, international cooperation in medical and health research will be strengthened.
- 6.2 The BE and RE 2014-15 and 2015-16 and actual expenditure under the Head International Cooperation in Medical and Health Research is as follows:

				(Rs. in crores)
Year	BE	RE	Actual	Physical Progress
2014-15	2.00	0.60	0.43	Support to 16 conferences
2015-16	1.00	0.80	0.23	Support to one International Conference on TB. Support to another 3 conferences in Bombay, Ahmedabad and Chennai are in pipeline.

6.3 On being asked about the achievements during 2014-15 and 2015-16, the Department has informed that Co-ordination of international collaboration in Health Research between India and other countries, as well as with national & international agencies are the main ongoing programmes under this head which are as follows:-

Achievements during the year 2014-15

The International Workshops/ meetings held under Bilateral/multilateral programmes:

Indo-Canada Mental Health Experts' Group Meeting held on 29.09.2014 at ICMR, New Delhi

ICMR-FORTE Joint Workshop on Ageing and Health held on 24-25th Nov., 2014 at ICMR, New Delhi.

SAFHeR Foundation workshop in Clinical & Laboratory Medicine Research on 9-12th Feb., 2015 at NIOP, New Delhi.

Exchange Visits:

A total of 34 exchange visits of scientists / officials to and from India were arranged under various international collaborative programmes / projects.

Health Ministry's Screening Committee (HMSC)

During the year 2014-15, four meetings of Health Ministry's Screening Committee were organized, wherein 81 projects were considered and out of which 59 projects were approved for international collaboration / assistance with agencies from USA, Germany, France, Canada, Australia, UK, WHO, European Union and several other foundations and foreign universities. Out of which, two projects are co-funded by ICMR.

Achievements during the year 2015-16

The International Workshops/ meetings held under Bilateral/multilateral programmes:

- India-ASEAN workshop on Malaria Research held on 11th 15th May, 2015 at NIMR, New Delhi under DST coordinated programme.
- ICMR-University of Sydney, Australia workshop on Maternal and Child Health at ICMR Hqrs. on 1st December, 2015.

- Indo-US Workshop on New Scientific Priorities in the U.S.-India Research Collaboration on HIV/AIDS at New Delhi on 10th -11th December 2015.
- Workshop on 'Air Pollution and Health in India' on 24th to 26th February, 2016 at New Delhi under Indo-US MoU on Collaboration in Environmental and Occupational Health and Injury Prevention and Control.
- ICMR-NIAID (NIH) Joint Workshop on System Biology of AMR at New Delhi on 20th–21st January, 2016.

Exchange Visits

A total of 25 exchange visits of scientists/officials to and from India were arranged under various international collaborative programmes/projects.

Health Ministry's Screening Committee (HMSC)

During the year 2015-16, seven meetings of Health Ministry's Screening Committee were organized, wherein 139 projects were considered and out of which 102 projects were approved for international collaboration / assistance with agencies from USA, Canada, UK, New Zealand, Australia, Norway EU and several other foundations and foreign universities, out of which, seven projects are co-funded by ICMR.

- 6.4 The Plan allocation of ₹ 1.00 crore in BE 2015-16 for "International Cooperation in Medical and Health Research" was reduced to ₹0.80 crore in Rs. 2015-16. On being enquired about the reasons behind this reduction in the Plan outlay of the Department, the Committee has been informed that the reduction at allocation at RE stage is due to overall reduction in Plan allocation of the Department at RE stage and the progress of expenditure.
- 6.5 The Committee is disappointed to note that against RE (2015-16) of Rs.80.00 lakhs, the actual expenditure is Rs.23 lakhs under the head "International Cooperation in Medical and Health Research". The physical progress made in this regard is to support one International Conference on

TB and another 3 conferences in Bombay, Ahmedabad and Chennai are in pipeline. The Committee exhorts the Department to prepare an action plan for optimum utilization of funds allocated for 2016-17 under this head and ensure close monitoring so that the funds allocated at RE stage are completely utilised, unlike previous year when a sizeable amount had to be surrendered.

VII. Infrastructure Development for Health Research

7.1 Establishment of Network of Research Laboratories (VRDLs) for Managing Epidemics and Natural Calamities

- Creating infrastructures for timely identification of viruses and other agents causing morbidity significant at public health level and specifically agents causing epidemics and/or potential agents for bioterrorism.
- Developing capacity for identification of novel and unknown viruses and other organisms & emerging-reemerging viral strains and develop diagnostic kits
- Providing training to health professionals.
- Undertaking research for identification of emerging and newer genetically active/ modified agents.

7.2 The cumulative achievements and targets are as follows:

S.No.	Name of the Scheme	Cumulative achievements upto 2015-16	Proposed Targets for 2016-17
1	Setting up of Nation Wide Network of Laboratories for Managing Epidemics & Natural Calamities	82 VRDLs approved.	Support to already sanctioned and VRDLs and sanctioning of 5 new Regional, 7 State Level and 24 Medical College level VRDLs, depending upon the availability of resources.

7.3 As per the information furnished by the Department, India continues to have outbreaks/ epidemics due to various infectious pathogens. Currently national apex institutes like NCDC, New Delhi and NIV, Pune are mandated to undertake the investigations. The resultant delay in diagnosis/detection and adequate/incomplete data about these outbreaks significantly impacts the response time for interventions.

The Department has planned to establish about 160 Viral Diagnostic Research Laboratories of three grades (10 Regional Labs, 30 State level labs and 120 medical college level labs) on infectious pathogens.

- 7.4 The Committee was informed that 82 VRDLS (5 Regional, 15 State level and 62 Medical Colleges levels) have been approved. However, funds have been released to so far of 5 regional labs, 11 State level labs and 24 medical level labs. During 2016-17, it is planned to establish 5 regional labs, 5 State Labs and 24 medical colleges level labs.
- 7.5 The Committee finds that against the projected outlays under the head for 2016-17 has been made Rs.207.93 crore (Table No. 3) and allocation is Rs.39.00 crore which is less than of the allocation of RE of Rs.45.25 in 2015-16. The Committee recommends that the Department may seek more funds, if needed at RE stage, keeping in view the importance of such laboratories.

VIII Development of Tools to prevent outbreaks of epidemics

- 8.1 From outcome budget 2016-17, it has been noted that viral diagnosis today is a major health problem and repeated outbreaks of new viral agents have become common phenomena. All countries, including India are at the threshold of such unpredictable viral attacks, resulting in large number of causalities. The inadequacy of specialized laboratories equipped with latest equipment in the country, especially at secondary and tertiary level has severely affected the response time in identification of the viruses and quick mobilization in the event of out-breaks/ response to infectious disease out-breaks or natural or man-made disasters. This was noticed during the H1N1 virus that gripped the nation in 2010 and during the Swine flu outbreak in 2015.
- 8.2 An allocation of Rs.2.21 crore has been made in the year 2015-16 which was fully utilised by different institutions which are as follows:

- (i) Rs.70.00 lakhs to Indira Gandhi Medical College, Shimla (HP) for conducting investigation in the aetiology of the periodic outbreaks of Hepatitis in Shimla city:
- (ii) Rs.1.00 crore to SMS Medical College, Jaipur for Strengthening the response facilities for State & Medical College Level Viral Diagnostic Laboratories to cope with the work of control of outbreak of Swine Flu:
- (iii) Rs. 51.00 lakhs to ICMR for NIV Pune for providing positive and negative control kits and EILSA Kits for Chikungunya, Dengue and JE, etc.
- 8.3 The Committee notes that on the projected outlays of Rs.60.00 crore in 2016-17, a mere allocation of Rs.2.50 crore has been made despite the fact that the allocation of Rs.2.21 crore at RE (2015-16) was fully utilised. The Department should take up with the Ministry of Finance for higher allocation at RE stage.

IX Development of Infrastructure for Promotion of Health Research

9.1 Establishment of Multidisciplinary Research Units (MRUs) in Govt. Medical Colleges

- Encourage and strengthen an environment of research in medical colleges.
- Bridge the gap in the infrastructure which is inhibiting health research in the Medical Colleges by assisting them to establish multidisciplinary research facilities with a view to improving the health research and health services.
- To ensure the geographical spread of health research infrastructure, in order to cover un-served and under-served Medical Colleges and other institutions.
- To improve the overall health status of the population by creating evidence-based application of diagnostic procedures/processes/methods.
- 9.2 The Department has informed that the projected outlays for this scheme in 2015-16 was Rs.180.00 crores. Against this, the actual allocation in 2015-16 was Rs.45.50 crores, which has been reduced in RE stage to Rs.28.00 crores due to overall reduction of Plan allocation of the Department from Rs.713.17 crores in BE

2015-16 to Rs.667.60 crore in RE 2015-16. The actual expenditure upto March 2016 was Rs.25.26 crores and proposals for further release of balance funds are in pipeline.

- The Committee was apprised that against the projected outlay of Rs.158.40 9.3 crores, the allocation in BE 2016-17 is Rs.24.25 crores. The target is to cover 80 medical colleges under the scheme during the Twelfth Plan period. 70 MRUs have been approved. However, the funds were released to 52 MRUs and release of funds to another five medical colleges approved in 2015-16 will be made on completion of requisite codal formalities. On being asked about the releasing of funds to the remaining 13 medical colleges, the Department has informed that the UCs pending against concerned medical colleges the pertain to schemes/programmes of other Departments of Ministry of Health and Family Welfare. However, the Department of Health Research has been vigorously pursuing the matter with the concerned medical colleges for settlement of UCs so that funds could be released for the establishments for MRUs. The steps taken include (i) writing letters to the medical colleges concerned State Health & Family Welfare Departments, pressing upon the issue during field visits; and (ii) review meetings held with the medical colleges from time to time.
- 9.4 The Secretary and other officials during the course of the meeting held on 21st March, 2016, made following submission:

"The establishment of Multi-Disciplinary Research Units in the Government medical colleges. It basically decentralizes research and promotes research in the non-communicable diseases and other areas of local importance. When the scheme was set up, probably the reason was that ICMR was focussing mainly on communicable diseases through its network of institutes. Now, the 60% of deaths in the country because of non-communicable diseases and the surveys have done recently shows that NCD is as much prevalent in rural as in urban areas - hypertension, diabetes, cancer, stroke. That is why the focus on the NCD is there. But it is no 100% rule. Depending on the local health priorities, we can fund communicable and non-communicable diseases. But focus is a little

bit on the non-communicable diseases. In this scheme, so far we have been able to approve 70 MRUs and fund has gone to 54 MRUs. In the Twelfth Five Year Plan, only 15 were approved for the country. Probably, we will extend it again next year and try to cover all the States. It is also to build the research capacity in those medical colleges to link them because these are usually attached to either a Primary Health Centre or a Community Health Centre."

- 9.5 The Committee notes the target of setting up of 80 MRUs in the Government Medical Colleges/institutions during the 12th Plan Period. Till date, 13 medical colleges have not been released the funds since UCs are pending in respect of other schemes of Ministry of Health and Family Welfare, inspite of efforts made by the Department to sort out the pending UCs with the State Health & Family Welfare Departments. The Committee therefore emphasizes that the Department should make concerted efforts to get resolved all the pending UCs so that funds could be released to these medical colleges. The Committee desires that the target for 12th Plan period should be achieved in this regard.
- 9.6 The Committee notes that in the age of digitalisation, the Department should rectify the pending UCs in a phased manner as it is the last leg of the 12th Plan period.

X Establishment of Model Rural Health Research Units (MRHRUs) in the States

- Create infrastructure at the periphery for transfer of technology to the rural level for improving the quality of health services to rural population.
- To ensure an interface between the new technology developers (Researchers in the Medical Institutions; State or Centre), health systems operators (Centre or state health services) and the beneficiaries (communities in rural areas)
- Ensure the much needed geographical spread of health research infrastructure in the Country

- 10.1 In a reply to a query, the Department has informed that in 2015-16 BE allocation of Rs.8.00 crore has been reduced to Rs.6.00 crore at RE stage for the MRHRUs scheme due to overall cut in Plan allocation of Rs.713.17 crores to 667.60 crores. The Department further stated that it had planned to establish 15 Model Rural Health Research Units in the States in close proximity to the Community Health Centre/Public Health Centre, where research targeting health interventions will be done in partnership with the States, ICMR mentor institutes and the nearby medical college for transfer of newer technology for the benefit of the rural population.
- 10.2 It was further stated that 12 MRHRUs have already been sanctioned in the States of Assam, Himachal Pradesh, Rajasthan, Tamil Nadu, Tripura, Karnataka, Punjab, Maharashtra, Andhra Pradesh, Odisha, Madhya Pradesh and Chhattisgarh and proposals for establishment of 3 more MRHRUs are in the pipeline.
- 10.3 On being asked about the research in MRHRUs focusing on the health problems of the States, the Secretary, Department of Health Research stated that it was trying to give as much decision making to the local people and the local doctors at the medical college who look after that unit which are actually proposed by them . In Tamil Nadu, Scrub Typhus is a big problem and they also want to work on hypertension. In Rajasthan, they want to work on infant mortality and they are looking at the age of marriage and age of delivery, they are also working on tuberculosis so they decide their health priorities. In this regard, the Department is thinking for some large projects which will be common for all of them so that data on rural population from different parts of the country.
- 10.4 The Committee observes that there is a wide gap between the available specialized health care technology and the technology being developed vis-a-vis their utilization in the State health systems and there is a need to calibrate the same according to local State needs. The Committee finds that in the $12^{\rm th}$ Plan Period , only 15 MRHRUs have been approved. Out of 15, 12 MRHRUs have

already been sanctioned and proposals of three are in pipeline. The Committee recommends that the Department should devise a mechanism to ensure that set targets are accomplished within timeline. The Committee desires that the proposal of the Department to have larger projects may be considered and decision taken at the earliest.

XI Scheme of North Eastern Areas

- 11.1 The Department has informed that as per Government policy, it is mandatory for 10% allocation for the North Eastern Region. The provision of Rs.66.76 crore in RE 2015-16 and Rs.71.32 crore in BE 2015-16 for North Eastern Region reflects to 10% provision of the total budgetary provision in the year.
- 11.2 In the outcome budget 2016-17, it has been informed that the projected outcomes of the health Research Projects for 2016-17 of the North Eastern Region are as follows:

Department of Health Research:

• Continuation of support in respect of already sanctioned MRUs, MRHRUs and Viral Research & Diagnostic Labs in the NE States.

ICMR:

- Ongoing intramural and extra mural projects will be supported.
- New proposals which will be received in the area of maternal & perinatal health including stillbirths, reproductive biology including effect of electromagnetic radiation on human health, reproductive tract infections, early detection and management of cervical cancer, development of new safe, effective and reversible male and female contraceptives from Medical Colleges/ Institutes in the NE States for funding.
- On-going intramural and extra mural projects will be supported. Fifty one
 (51) new proposals have been received from Medical Colleges/ Institutes in
 the NE States for funding.

- Initiation of new research projects will be taken up as in the past.
- Initiation of Construction of Research Units at Guwahati and Agartala.
- A Joint Working Group Meeting between ICMR and DBT to identify new proposals.
- Other new initiatives include new research centres on Communicable and Non-communicable diseases, health system research, etc.
- Assessment of Non communicable Diseases and their risk factors in Tribal areas of North East will be initiated. Health systems preparedness for interventions for diabetes, hypertension, chronic respiratory diseases and cardiovascular disease and deaths due to non-communicable diseases among the tribal population in India
- 11.3 On being asked about the new schemes during 2015-16 under the North East initiatives and the research activities undertaken thereunder and implementation status of these schemes, the Department has informed that with a view to build research capacity in the NE region a total of 25 projects were sanctioned under the seed grant initiative for the North East amounting to Rs. 3.06 crore in 2014-15 and 28 projects amounting to Rs. 4.36 crore in 2015-16.
- 11.4 The Committee appreciates the initiatives taken by the Department to undertake studies and projects specific to North Eastern Region and exhorts that focused allocation be made to the implementation of the above projects by way of streamlining monitoring so that tangible outcomes could be achieved and benefits emerging there from percolate down to the people. The Committee also recommends that the Department should include research in infant mortality and maternal mortality and particularly identify areas in the State where there is high maternal mortality and high infant mortality and try to address the issues because of which there is a high death rate in that area.

XII Manpower requirements for Department of Health Research

- 12.1 During the power presentation by the Department of Health Research, it has been informed that the Department is working with a very small component of staff (22 officials & some contractual staff). The Department has proposed for creation of 139 posts to the Ministry of Finance.
- 12.2 The Committee notes that research is an important component with further innovation and breakthrough of medicines for fighting diseases. The Committee therefore recommends that Department should pursue with the Ministry of Finance to expedite the proposal for creation of 139 posts at the earliest.
