

Chapter-1

Introduction

1 Introduction

National Health Policy

The primary objective of National Health Policy, 2017 is to improve health status through concerted policy action in all sectors and expand preventive, promotive, curative, palliative and rehabilitative services provided through the public sector. The policy also recognizes the pivotal importance of Sustainable Development Goals to ensure healthy lives and promote well-being for all at all ages.

Health Indicators of Uttarakhand

The health indicators of Uttarakhand are shown in the **Table-1** below:

Table-1: Health indicators of Uttarakhand

Health Indicators	Uttarakhand Goals 2020 ¹	Uttarakhand*	Uttarakhand's Ranking among 21 bigger States
Sex ratio at birth (2014-16) (per 1,000 males)	950	850	19
Neonatal Mortality Rate (2016) (per 1,000 live births)	NA	30	13
Maternal Mortality Ratio (2014-16) (per lakh live births)	100	201	16
Infant Mortality Ratio (2016) (per 1,000 live births)	25	38	10
Institutional deliveries (<i>per cent</i>)	90 and above	67.02	19

Source: *Niti Aayog, 'Healthy States, Progressive India' June 2019.

As per the Niti Aayog's report, the State of Uttarakhand ranks 17th among 21 larger States in Health Index with only Madhya Pradesh, Odisha, Bihar and Uttar Pradesh behind. Its position as regards Health Index in the reference year (2017-18) in fact deteriorated from the base year (2015-16). As such, there is a vast scope for improvement and the situation demands for better healthcare services at all levels in order to build the confidence in the psychology of patients as well as enhance their faith in the services rendered by the Government hospitals.

1.1 Public health facilities in the State

Availability, accessibility and usability of sound healthcare system are essential requirements to meet the challenges in the field of Health. The public healthcare facilities in the State are divided into three levels for providing primary care, secondary care and tertiary care under administrative control of Department of Medical Health and Family Welfare.

¹ Annual Report (2018-19) issued by Medical Health and Family Welfare Department, Uttarakhand.

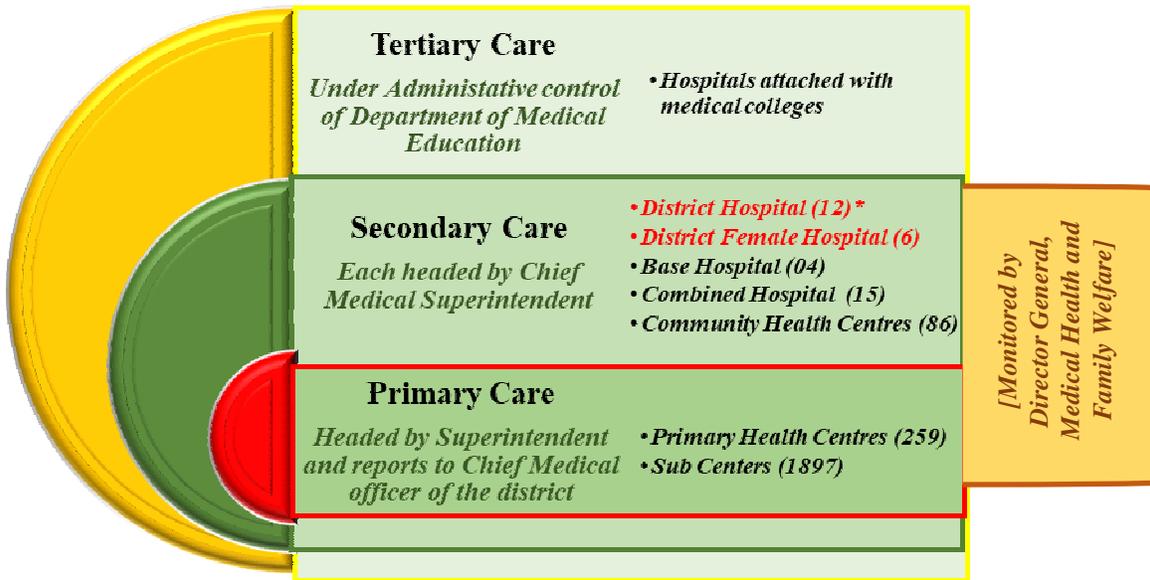
District Health System is the fundamental basis for implementing various health policies, delivery of healthcare and management of health services for defined geographic area. District hospital is an essential component of the district health system and functions as a secondary level of health care which provides curative, preventive and promotive healthcare services to the people in the district. Every district is expected to have a district hospital linked with the public hospitals/health centres down below the district such as Sub-district/Sub-divisional hospitals, Community Health Centres (CHCs), Primary Health Centres (PHCs) and Sub-Centres. In the State, against the requirement of 418 PHCs and 105 CHCs as per applicable population norms, 259 PHCs and 86 CHCs had been established as of March 2019.

The district hospitals cater to the people living in urban (district headquarters town and adjoining areas) and the rural population of the district. District hospital system is required to work not only as a curative centre but at the same time should be able to build interface with the institutions external to it including those controlled by non-government and private voluntary health organizations.

The current functioning of most of the district hospitals in the public sector are not up to the expectation especially in relation to availability, accessibility and quality. The staff strength, beds strength, equipment supply, service availability and population coverage are not uniform among all the district hospitals.

The availability of health care facilities in the State as on 31 March 2019 is shown in **Chart-1** given below:

Chart-1: Availability of health care facilities in the State



Hospitals highlighted in red are included in sampling for audit scope

**Six District Hospitals (DHs) where all services other than maternity are provided and 6 Joint Hospitals (JH) where all services are provided.*

1.2 Planning and Execution of Performance Audit

1.2.1 Audit Objectives

The broad objectives of the performance audit were to assess whether:

- Policy framework was robust enough to improve the quality of healthcare.
- Adequate provisions for line services such as out-patient services, in-patient services, emergency services, maternity services, *etc.* were made and these services were delivered in an efficient and effective manner.
- Efficient support services with regards to diagnostic services, maintenance of equipment, storage of drugs, dietary services, laundry services, *etc.* were present in hospitals.
- Hospitals had adequate resources *viz.*, human, drugs, consumables, equipment, *etc.* as per prescribed norms and these resources were utilised efficiently and effectively.
- Norms and practices for hygiene, infection control, employee and patient safety were followed within the premises of hospitals.

1.2.2 Audit Criteria

To evaluate the subject matter in pursuit of the above mentioned Audit Objectives, the criteria were sourced from various guidelines on health care services issued by Government of India and Government of Uttarakhand. The sources of audit criteria were Indian Public Health Standards (IPHS) for District Hospitals; Maternal and Newborn Health (MNH) toolkit; National Quality Assurance Standards for Public Health Facilities 2017 issued by Government of India;

The Indian Public Health Standards

The Indian Public Health Standards (IPHS) issued by the Ministry of Health and Family Welfare, Government of India, are a set of uniform standards envisaged to improve the quality of healthcare delivery in the country and serve as the benchmark for assessing performance of healthcare delivery systems.

The IPHS for District Hospitals prescribe standards for the building, manpower, equipment, drug and other facilities. These include the standards to bring the District Hospitals to a minimum acceptable functional grade (indicated as Essential) with scope for further improvement (indicated as Desired). The Essential Services include General Specialities; Diagnostic services; and Ancillary and Support services.

Assessor's Guidebook for Quality Assurance in District Hospitals (Vol I & II) 2013; Framework for Implementation of National Health Mission (NHM) 2012-17; Drugs and Cosmetic Rules, 1954; LaQshya guidelines; Kayakalp guidelines issued by Ministry of Health and Family Welfare, Government of India; Bio-Medical Waste (Management and Handling) Rules, 1998; Bio-Medical Waste Management Rules, 2016; National Disaster Management Guidelines 2014; National Disaster Management Guidelines for Hospital

Safety 2016; Financial Rules (FHB Vol. V and VI); Uttarakhand Procurement Rules; and Departmental policies, rules and orders issued by the Government of Uttarakhand.

1.2.3 Audit scope and methodology

The performance audit commenced with an Entry Conference (15 October 2019) with the Secretary-In-Charge, Department of Medical Health and Family Welfare, Government of Uttarakhand wherein the audit objectives, scope and audit criteria were discussed and the inputs of the Department were obtained. Six² out of 18 District Hospitals of four (out of 13) Districts were selected by adopting Simple Random Sampling without Replacement Method for detailed audit scrutiny and to evaluate the outcome, status and standards of delivery of healthcare services to the population of the district for the period 2014-19.

To ensure the variations/coverage in the data recorded on monthly basis, different months of the five-year audit period were covered. For this, each year was divided into four quarters and the middle month of each quarter was selected³ for capturing the data for indicators reported at monthly frequency. Following this, to capture weekly frequency, the first week was picked up for the selected months to maintain consistency.

The methodology included scrutiny of documents; issue of questionnaires and audit observations; physical inspection of various facilities of the test checked hospitals; and conducting surveys like the patient satisfaction survey. The findings and recommendations of the performance audit were discussed with the Secretary-In-Charge, Department of Medical Health and Family Welfare in an Exit Conference on 15 June 2020 and the views of the Government have been suitably included in the report.

1.2.4 Performance Indicators

The Performance Audit includes assessment of efficiency and outcome⁴ of delivery of healthcare services by District Hospitals {District Hospital (DH) where all services except maternity services are provided; District Female Hospital (DFH) where only maternity services are provided and Joint Hospital (JH) where all services are provided} with the help of various performance indicators *viz.*

- **BOR:** The Bed Occupancy Rate (BOR) is an indicator of the productivity of the hospital services and is a measure of verifying whether the available infrastructure and processes are adequate for delivery of health services.
- **ALOS:** Average Length of Stay indicates the time the patient is retained in the hospital.

² DH Almora, DH Haridwar, DFH Almora, DFH Haridwar, JH Udham Singh Nagar and JH Chamoli.

³ Sampled months -May 2014 (2014-15); August 2015 (2015-16); November 2016 (2016-17); February 2018 (2017-18) and May 2018 (2018-19).

⁴ The ultimate implication of any service is to deliver the desired result in the shape of finished product or service.

- **LAMA Rate:** Leave Against Medical Advice (LAMA) is an act whereby a patient takes his/her discharge contrary to the recommendation or will of the attending physician.
- **Referral out Rate:** Referral to higher centres denotes that the facilities for treatments were not available in the hospitals.
- **Absconding Rate:** Absconding rate refers to the percentage of patients leaving hospital without informing staff; it can be a serious challenge for staff, patients and the hospital system.
- **Discharge Rate:** Discharge Rate (DR) measures the number of patients leaving a hospital after receiving due health care. High DR denotes that the hospital is providing health care facilities to the patients efficiently.
- **Bed Turn Over Rate:** The Bed Turnover Rate (BTR) is a measure of the utilization of the available bed capacity and serves as an indicator of the efficiency of the hospital.

1.2.5 Acknowledgement

Audit acknowledges the co-operation extended by the Department of Medical Health and Family Welfare and the sampled district-level hospitals in conduct of the Performance Audit.

1.2.6 Structure of the Report

The Performance Audit Report has been structured on the basis of various services and resources available in hospitals and consists of seven themes: Out-Patient Services; Diagnostic Services; In-Patient Services; Maternity Services; Infection Control; Drug Management; and Infrastructure and other issues.

1.3 Policy framework for healthcare services

Delivery of quality and efficient healthcare services in public health facilities plays a significant role in improving the health indicators of the public at large. It is, therefore, incumbent upon the Department of Medical Health and Family Welfare, which is responsible for providing and managing the healthcare facilities in Uttarakhand, to do a comprehensive and outcome based planning for providing essential resources to the public hospitals and also to ensure its optimum utilisation.

1.3.1 Standards/norms for various inputs

For ensuring efficient operation of public sector hospitals, it is essential to prescribe standard/norms for providing various resources in the hospitals. On the basis of these standards/norms, the requirement of resources should be assessed and provisions made accordingly.

The Department did not prescribe standards/norms in respect of services to be offered by the district hospitals; and for sanction of resources to the hospitals as discussed in the **Table-2** given below and detailed in respective paragraphs:

Table-2: Status of standards and norms for various inputs

Intervention/ inputs	State Government norms for DHs	Other norms/ standards	Remarks
OPD/IPD	No uniform norms	IPHS	The State Government did not adopt the standards of various OPD and IPD services prescribed in the IPHS.
Human Resources	No uniform norms	IPHS	No standards/norms were available for sanctioning manpower to district hospitals based on their size and demand.
Drugs and consumables	Essential Drugs List	IPHS; MNH Toolkit; NHM guidelines	The Department had an Essential Drug List which was revised in July 2015 and December 2019.
Equipment	No uniform norms	IPHS	The State Government had not adopted any standards/norms for supply of equipment to district hospitals.
Hospital Beds	No criteria	IPHS and NHM	The State Government did not adopt the IPHS.

- The State Government neither adopted the IPHS nor had uniform criteria or norms for provision of OPD and IPD services.
- The Department did not undertake any exercise to re-work the number of sanctioned posts in the public hospitals in the State based on current levels of patient load and according to Government order issued in March 2011 wherein the Department was required to provide services and manpower as per IPHS.
- No gap analysis for manpower, equipment, infrastructure, services, *etc.* was carried out during 2014-19.
- In the test checked hospitals, Audit also noticed that the sanctioned strength of doctors and nurses varied significantly and it had little correlation with the number of beds in the respective hospitals.
- The Equipment Procurement Policy (EPP) of January 2015 which stipulated procedures for procurement of equipment did not standardise the types of equipment required for the district-level hospitals. Further, there was no forethought in the EPP in respect of maintenance of equipment.

1.4 Funding for Hospitals

The State Government makes budgetary provisions under the Annual Budget for the functioning of Primary, Secondary and Tertiary level healthcare facilities. Apart from the State budget, financial assistance under the National Health Mission (NHM) is also received from the Government of India with corresponding share of the State Government, as determined from time to time.

1.4.1 State budget

Year-wise allotment and expenditure of funds during 2014-19 pertaining to Department of Medical Health and Family Welfare⁵ was as shown in the **Table-3** given below:

⁵ Relates to allotment and expenditure of Primary and Secondary Level Healthcare facilities only.

Table-3: Budget provisions and expenditure during 2014-19

(₹ in crore)

Year	Estimated by Directorate	Released by State Government	Expenditure
2014-15	1,257.46	1,136.63	997.73
2015-16	1,386.00	1,252.98	1,016.24
2016-17	1,468.44	1,239.49	1,036.99
2017-18	1,558.52	1,161.13	1,070.07
2018-19	1,811.48	1,531.42	1,385.06
Total	7,481.90	6,321.65	5,506.09

Source: Directorate, Medical Health and Family Welfare.

The expenditure incurred on the Primary and Secondary level of health care by the Medical Health and Family Welfare Department increased by 39 per cent in 2018-19 when compared to 2014-15. However, the Department was unable to utilise 13 per cent of the released funds during 2014-19.

1.4.2 Release and utilisation of funds by the test checked hospitals

Year-wise release and expenditure of funds during 2014-19 pertaining to test checked hospitals under State Budget was as shown in the Table-4 given below:

Table-4: Receipt and expenditure under State Budget

(₹ in crore)

Year	Opening Balance	Receipt during the year		Interest	Total funds Available	Expenditure	Closing balance (per cent)
		Grant	Other receipts including User charges				
2014-15	1.85	5.75	2.23	0.07	9.90	6.35	3.55 (36)
2015-16	3.55	5.64	2.69	0.12	12.00	7.28	4.72 (39)
2016-17	4.72	4.28	2.32	0.14	11.46	5.39	6.07 (53)
2017-18	6.07	3.75	3.10	0.15	13.07	7.27	5.80 (44)
2018-19	5.80	2.27	5.10	0.18	13.35	8.89	4.46 (33)

Source: Test checked DHs/JHs/DFHs.

It can be seen from above that the test checked hospitals were unable to utilise 33 per cent to 53 per cent of the total available funds during 2014-19.

1.4.3 Funds under NHM

The fund received under NHM by the Department was as shown in the Table-5 given below:

Table-5: Receipt and expenditure under NHM

(₹ in crore)

Year	Opening Balance	Interest	Receipt during the year	Total funds Available	Expenditure	Closing balance (per cent)
2016-17	121.19	6.03	235.76	362.98	245.68	117.30 (32)
2017-18	117.30	3.79	172.41	293.50	229.77	63.73 (22)
2018-19	63.73	5.02	364.55	433.30	332.24	101.06 (23)

Source: Information provided by Directorate, Medical Health and Family Welfare.

The above table indicates that expenditure incurred from NHM funds increased by 35 per cent in 2018-19 as compared to 2016-17. However, 22 to 32 per cent funds remained unspent at the end of each year during the said period.

1.4.4 Release and utilisation of funds by the test checked hospitals

The fund received under NHM by the test checked hospitals was as shown in the **Table-6** given below:

Table-6: Receipt and expenditure of test checked hospitals

(₹ in crore)

Year	Opening balance	Receipt during the year	Interest	Total available funds	Expenditure	Closing balance (per cent)
2014-15	0.80	4.79	0.02	5.61	3.96	1.65 (29)
2015-16	1.65	5.05	0.05	6.75	4.98	1.77 (26)
2016-17	1.77	4.98	0.05	6.80	5.13	1.67 (25)
2017-18	1.67	5.50	0.05	7.22	5.26	1.96 (27)
2018-19	1.96	6.43	0.11	8.50	6.63	1.87 (22)

Source: Test checked DHs/JHs/DFHs.

The above table indicates that 22 to 29 per cent of funds remained unspent at the end of each year during the period 2014-19.

In Exit Conference, the Government stated that the above issues had now been addressed by adoption (October 2019) and implementation of IPHS. The reply of the Government as regards implementation of IPHS is not acceptable as the norms specified in IPHS had not yet (March 2020) been implemented in the test checked hospitals.

The deficiencies and gaps noticed in the test checked hospitals have been discussed in detail in the respective paragraphs.

To sum up, the policy framework for healthcare services in district hospitals had significant limitations. The Department, neither prescribed, for most aspects its own norms nor adopted the norms/standards suggested by the Government of India in respect of the services to be provided by district hospitals and resources to be sanctioned to the district hospitals. This was exacerbated by the absence of gap analysis for manpower, equipment, infrastructure and services in district hospitals which could help the Department in its planning process. As a result, there was an adverse impact on the availability of resources and services as discussed in the subsequent paragraphs.