

No.2/Covid-19/DHS-2020  
**GOVERNMENT OF MANIPUR**  
**DIRECTORATE OF HEALTH SERVICES**

**NOTIFICATION**

Imphal the 4<sup>th</sup> June, 2021.

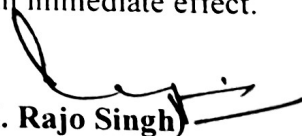
Whereas a meeting under the chairmanship of *Principal Secretary (Health & FW), Govt. of Manipur* was held on 3<sup>rd</sup> June, 2021 to discuss the “*Norms for HDUs (High Dependency Units) in DHs/ SDHs/ CHCs*” in the Conference Hall, Manipur Secretariat, Imphal;

Participants of the Meeting:

Sl.No.	Name	Designation
1	Shri C.Arthur	Secretary (MI) & State Nodal Officer: Oxygen Management Team
2	H.Roshita	Special Secretary (Health & FW), GoM
3	Dr.K.Rajo Singh	Director, Health Services
4	Prof. Th.Bhimo Singh	Director, JNIMS
5	Prof. S.Thoibahenba	HoD (Anesthesiology), JNIMS
6	Dr.H.Babychand Devi	Addl. Director (PF)/ Health Services
7	Dr.Lalthari Hmar	Addl. Director (MC)/ Health Services
8	Dr.L.Tomcha Khuman	Addl. Director (PH)/ Health Services
9	Dr.Th.Nandakishore Singh	Team Leader/ Home Isolation
10	Dr.S.Sucheta Devi	Jnt.Director (F)/ Health Services
11	Dr.N.Hemantakumar Singh	SNO (Treatment Protocols)/ Health Services
12	Dr.Veto	Dy. Secretary (Transport) & Oxygen Management Team
12	Dr.K.Surjit Singh	Sr.M.O. (Store), JNIMS
13	Dr.M.Dinesh Singh	Sr.M.O. (CMS)/ Health Services
14	Dr.O.Bisu	M.O. i/c & Anaesthetist/ Health Services

Whereas it was decided in the said meeting to adopt the draft “*Operational Guidelines for HDUs (High Dependency Units)*” prepared by Directorate of Health Services by incorporating the points suggested in the meeting;

Now, as per the decision of the said meeting the “*Operational Guidelines for HDUs (High Dependency Units)*” attached as Annexure is hereby notified with immediate effect.

  
**(Dr.K. Rajo Singh)**  
Director  
Health Services, Manipur

Copy to:-

1. Secretary to the Hon'ble Chief Minister, Govt. of Manipur.
2. P.S. to the Hon'ble Advisor to CM (Health), Govt. of Manipur.
3. S.O. to the Chief Secretary, Govt. of Manipur.
4. Principal Secretary (Health & FW), Govt. of Manipur.
5. Secretary (MI), Govt. of Manipur.
6. Director, JNIMS.
7. Director, FW Services, Manipur.
8. State Mission Director, SHS- Manipur.
9. Director (AYUSH), Manipur.
10. All Addl. Directors/ Health Services.
11. All CMOs
12. All Medical Supdt.: DH/ MO i/c: SDH/ CHC
13. All other concerned.
14. Guard file.

**GOVERNMENT OF MANIPUR  
DIRECTORATE OF HEALTH SERVICES**

**Operational Guidelines or HDU (High Dependency Unit)**

No.2/Covid-19/DHS-2020, 4 June, 2021.

**I. Overview:**

In view of rapid surge of Covid-19 cases in the State and the consequential need of large number of Critical Care support, there is an urgent need to increase the availability and accessibility to Critical Care services. Though, the majority of Covid-19 patients has mild illness and is treated at home or Covid Care Centers, some may have severe disease requiring oxygen therapy and treatment at ICUs/ HDUs. HDUs (High Dependency Units) being a step down from a proper ICU can provide oxygen therapy and fulfill majority of treatment modalities regarding Covid-19 management. To meet such need of oxygen therapy, other Critical Care Services as well as to reduce the burden over the tertiary hospitals of the State, one 10- bedded HDU will be established for every District Hospital, Sub-District Hospital and some selective CHCs. The HDUs will also act as a primary stabilization unit for critically ill patients before referring to the higher centers.

**II. Goal:**

Set up of HDU (High Dependency Units) for treatment of critically ill adult/ pediatric patients (including Covid-19 patients) phase wise in the Government sector.

**III. Objectives:**

1. The foremost objective of the HDU project is to reduce the Out of Pocket Expenditure of common people for providing emergency and critical care treatment and ensuring quality and affordable Critical care and emergency services 24X7 in secondary level hospitals.
2. Reduction of the mortality/ morbidity of the patients by providing timely and affordable Critical Care support.
3. Provision of emergency medical treatment and critical care support to every patient, so that they can be treated within the "golden hour".
4. Establish at least one HDU in every District Hospital, Sub- District Hospital and some selective CHCs so as to minimize the delay in accessing appropriate care in an emergency situation.
5. To reduce over congestion in Tertiary Care Hospitals.

**IV. Strategies:**

Set up of 10- bedded High Dependency Units (HDU) in the District Hospitals, Sub- District Hospitals and some selective CHCs.

**V. Service package Standards:**

1. One High Dependency Unit (HDU) or Step downunit should have 10 beds which include recovery beds. HDU is less resource consuming and serves relatively less sick patients stepping down from ICU or admitted straight from outside ICUs.
2. Following type of patients may be kept in an HDU-
  - a. Severe Covid-19 disease (Respiratory rate >30/min, breathlessness or SpO<sub>2</sub>< 90% on room air).
  - b. Cases recovered from Critical illness.



- c. Cases who are less sick, not requiring invasive hemodynamic monitoring or invasive Mechanical Ventilation.
  - d. Cases requiring close observation otherwise who may worsen.
3. The primary target is to provide critical care to the patients within the '**Golden Hour**' and to stabilize the critically ill patients before transferring to the nearest Intensive Care Units having provision of Invasive Mechanical Ventilation for further treatment.

#### VI. Human Resource Standards:

1. Each unit should be manned by at least one ICU/ LSAS trained Medical Officer and at least two trained Nursing personnel in each of the three eight-hour shifts.
2. One trained MO among the MOs working at the HDU will act as Medical Officer-in-Charge of the Unit and one Nursing personnel will be designated as Nursing-in-Charge. They will be responsible for making duty rosters for staff working in the HDU, store management, regular indent and compilation of monthly reports.
3. One physician and one anesthesiologist of the Hospital/ Health Centre or linked Hospital will make overall supervision regarding patient care and technical issues.

#### VII. Standard List of Equipments.

Sl no.	Particular of equipment	Quantity
1	3 parameter monitor (BP, pulse rate, oxygen saturation)	1 for every bed
2	Suction machine	1 for every 3 beds
3	Ventilator Machine back up	2 for every 10 beds
4	Bipap Machine	1 for every bed
5	Oxygen supply (D-type cylinders)	24 D -type oxygen cylinders in a day (with average consumption of 10 lit/min each for 10 beds).
6	Oxygen supply (minimum 5 lpm Oxygen Concentrators)	10 for the Unit
7	Defibrillator machine	1 for the Unit
8	Portable X-ray Machine	1 for the Unit
9	12 leads ECG machine	1 for the Unit
10	Infusion pump	10 for the Unit
11	Crash cart (laryngoscope with different sizes blade, Bougie, AMBU Bag, Bain's Circuit, ET tube of different sizes, glucometer, emergency drugs, IV cannula, IV drip set, syringes, suction catheter).	1 for the Unit
12	Power backup- UPS 2 KVA	1 for the Unit.

(Dr.K. Rajo Singh)

Director Health Services, Manipur