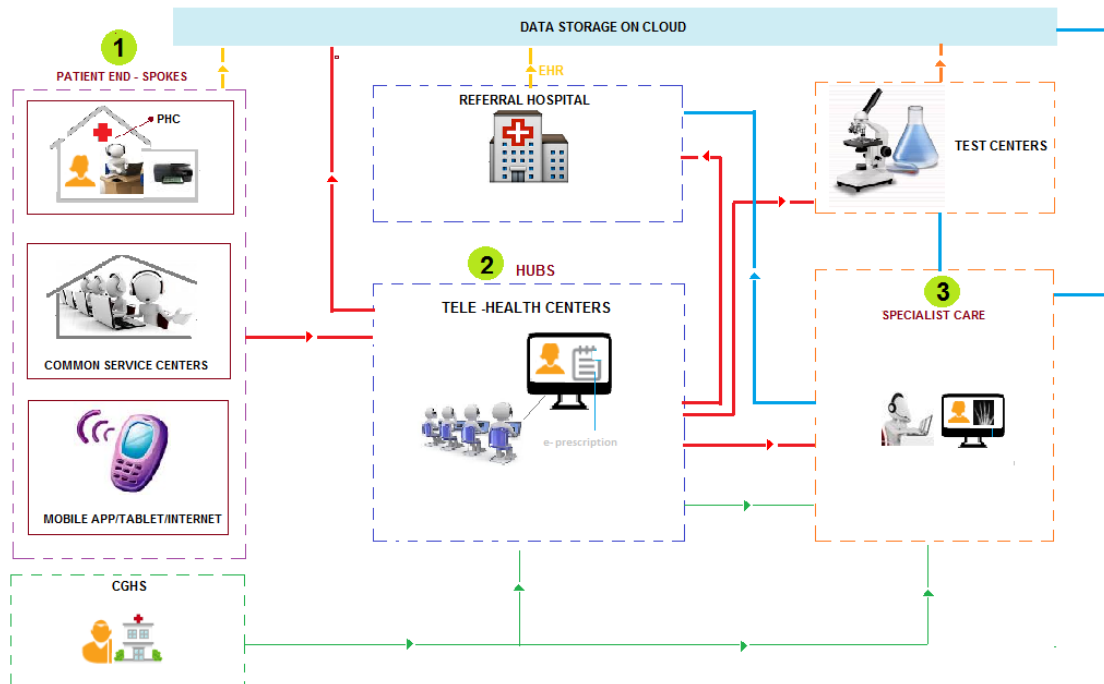


## **Registration of doctors/senior residents and specialists for providing on-line medical consultation through a VC enabled Telemedicine Platform/ application under NMCN scheme**

1. **ON-LINE Medical Consultation (ONLINE OPD)** : Under National Medical College Network (NMCN) scheme, 50 Govt. Medical Colleges are being inter-linked with the purpose of Tele-education, CME, e-Learning and Online Medical Consultation by utilizing the connectivity provided by National Knowledge Network (NKN). Under this initiative, a hub of doctors for primary consultation and a virtual layer of Specialty/ Super Specialty doctors for specialty consultation from these 50 Medical colleges would be created for providing “Online Medical Consultation” and Tele-follow up facility to citizens which will be similar to OPD facility but in a virtual way through a VC enabled web-portal.
2. This will help patients from rural, remote and urban areas to access doctors and specialists easily either through Government healthcare institutions (PHC/ CHC), Common Service Centres (CSCs) in villages and even from their home / office location through their smart phones. This initiative aim at reducing long waiting times in hospitals and long distance travel by patients to consult specialist. Also as average age of population in our country is increasing; it will enable home healthcare facility thereby reducing the burden of hospitals having limited bed facilities. All of these together will help in disease prevention, reduce mortality and out of pocket expense for treatment of NCD and chronic diseases.
3. The concept of **ONLINE VIRTUAL OPD** is based on the well-established “Hub and Spoke model” for providing 2 tier Tele-consultation to patients over VC.
  - a. **Hub:** A Hub with Video Conferencing facility to provide first line of consultation. A dedicated team of doctors (MBBS graduates – Residents) would be placed at these hubs on incentive basis to provide first line of consultation to the patient over VC just like in a call centre. A virtual layer of Specialty/ Super-specialty doctors would be created from Medical colleges (under NMCN) and Central Government Hospital for providing second line of consultation. Hubs will be located at 8 RRC/ NRC namely (SGPGI Lucknow ; AIIMS Delhi; IMS BHU; JIPMER **Puducherry** ; PGI Chandigarh; NIEGRIMS Shillong; KEM Mumbai, TMC Trivandrum) for primary consultation through a telemedicine software being developed.
  - b. **Spokes:** Spokes would be created at following point of contacts :
    - Government healthcare institutions (PHC/CHC).
    - CGHS Dispensary(s)
    - Common Service Centers (CSCs)
    - Direct through Mobile Apps (Android/iOS)
    - Telemedicine Bus
    - Portable Telemedicine Tools
    - Smart hand held devices used by Ground level health workers

Doctors or Paramedics at PHC/CHC and VLE in CSC and village health workers would be utilized for facilitating Tele-medicine services at these Spokes.

## CONCEPT OF ONLINE OPD



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4. It is being envisaged that, Doctors registered under this program will be financially incentivized and will be provided with latest ICT equipment's ( Laptop/ iPad/ Smart Phone) to enable them to attend patients on the go. This application will be linked to the web application Software being developed under NMCN DISC Scheme.
5. LOGIN facility will be provided in the web based portal to Junior/ Specialty/ Super-specialty Doctors to register themselves for indicating the real time availability and automatic preparation of Roaster of Doctors. A similar account will also be required to make for Junior Doctors who are perusing various medical courses and willing to join the programme on incentive basis in the Medical Colleges. There is a requirement of minimum number of 12 doctors (MBBS/residents) at each 'Hub' i.e. Regional Resource Centers (RRC). The telemedicine application software will allow a roster based availability for every doctor/specialist and allows each doctor to provide consultation within an agreed time slot of service as in Table 1.

## CONCEPT OF ONLINE OPD

### a. CLOUD BASED MOBILE APPLICATION



### b. AUTOMATED ROSTER FOR ENSURING AVAILABILITY OF DOCTORS

	9-10AM	10-11AM	11-12AM	12-1PM	2-3PM	3-4PM	4-5PM	5-6PM	6-7PM	7-8PM
HOSPITAL1	Light Blue	Light Green	Light Purple	Light Blue	Yellow	Blue	Orange	Light Green	Pink	Red
HOSPITAL2	Red	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange	Light Green	Pink	Red
HOSPITAL3	Pink	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange	Light Green	Pink	Red
HOSPITAL4	Light Green	Light Purple	Red	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange	Light Green
HOSPITAL5	Orange	Red	Pink	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange	Light Green
HOSPITAL6	Blue	Pink	Light Green	Red	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange
HOSPITAL7	Yellow	Light Green	Light Purple	Red	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange
HOSPITAL8	Light Purple	Blue	Yellow	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange	Light Green
HOSPITAL9	Light Blue	Light Green	Light Purple	Red	Light Blue	Light Green	Light Purple	Yellow	Blue	Orange
HOSPITAL10	Light Green	Yellow	Light Purple	Yellow	Blue	Orange	Light Green	Pink	Red	Light Blue

### c. CONSULTATION IN MAJOR SPECIALITIES

<span style="color: lightblue;">■</span> Cardiology	<span style="color: red;">■</span> Orthopaedics	<span style="color: pink;">■</span> Gastroenterology
<span style="color: lightgreen;">■</span> Gynaecology	<span style="color: orange;">■</span> Ophthalmology	<span style="color: blue;">■</span> Oncology
<span style="color: lightpurple;">■</span> Neurology	<span style="color: purple;">■</span> Medicine	<span style="color: brown;">■</span> Nephrology
		<span style="color: yellow;">■</span> Pulmonology
		<span style="color: lightgrey;">■</span> Urology

Table 1		
Tentative online consultation timings		
<b>1</b>	<b>Doctors at Hub</b>	<b>Working Hours : 11 AM to 8 PM</b>
	Payment to the Jr. Doctors will be on the basis of per hour slot.	Max. Limit : 2 hours per day & 25 hours per month
<b>2</b>	<b>Specialty / Super-specialty Doctors in the virtual layer</b>	<b>Working Hours : 03 PM to 8 PM</b>
<b>i.</b>	Payment to each specialist Doctor will be on the basis of per hour slot.	Max. Limit 2 hours per day & 20 hours per month
<b>ii.</b>	Payment to each super-specialist Doctor will be on per hour basis.	Max. 2 hours a day and 20 hours per month by any Doctor

3	Referring Staff / Doctors at Spokes	Working Hours : 11 AM to 8 PM
i.	PHC/CHC or other referral Centre	Payment shall be on per consultation basis
ii.	Common Service Centers	Payment structure will be decided after discussion with CSC
iii.	CGHS or other referral Centre	Payment shall be on per consultation basis

6. The doctors and specialists will be given honorarium/ incentive which shall be based upon the consultation hours served or number of consultations. The incentive model is being worked out and will be informed later.
7. Since virtual layer of specialists will serve telemedicine consultations for the entire country as per availability and scheduler, there is no maximum limit in the number of specialists who can register from a hospital/medical college.
8. **Doctors/ Specialists willing to join the platform for providing video consultation may kindly register themselves by visiting the link <http://phrms.cloudapp.net:8096/>**
9. A list of 50 medical colleges including 8 nos. of proposed hubs is enclosed.

## CONCEPT OF ONLINE OPD

### PATIENT POINT OF CONTACT

Spokes will be created at the following places for patients to access the telemedicine services with the use of internet and technological platform.

