

2nd Floor, Red Cross Building, New Delhi
Dated: 24th August, 2021

Subject: - Monthly Summary to the Cabinet for the month of July, 2021-Reg.

The undersigned is directed to circulate herewith a copy of the unclassified portion of the **Monthly Summary for the Cabinet** pertaining to the Department of Health Research (Ministry of Health and Family Welfare) for the month of July, 2021.



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To

1. All members of Council of Ministers
2. Deputy Chairman, NITI Aayog, Yojana Bhawan, New Delhi.
3. The Principal Information Officer, Ministry of Health and Family Welfare, New Delhi

Copy to:

The Director, Cabinet Secretariat, Rashtrapati Bhawan, New Delhi-110001

Copy also forwarded for information to:

1. Secretary to the Government of India, All Ministries/Departments.
2. The Chairman, UPSC, Shahjahan Road, New Delhi.
3. Secretary to the President of India (Rashtrapati Ke Sachiv), Rashtrapati Bhawan, New Delhi.
4. Secretary to the Vice-President of India (Up-Rashtrapati ke Sachiv), Rashtrapati Bhawan, New Delhi.
5. PS to Prime Minister of India, South Block, New Delhi
6. Secretary, Inter-State Council Secretariat, MHA, Vigyan Bhawan Annexe, New Delhi.

**MINISTRY OF HEALTH & FAMILY WELFARE
DEPARTMENT OF HEALTH RESEARCH**

Monthly Summary for the Cabinet for July, 2021

The Monthly report on important issues/development for the month of July, 2021 in respect of Department of Health Research/Indian Council of Medical Research is submitted herewith for your kind perusal.

Important policy decisions taken and major achievements during the month:

a) Global coronavirus COVID-19 management measures in India: Following new measures and initiatives were taken besides the timely COVID-19 testing and reporting.

1) **Expansion of COVID-19 testing facilities:** A total of 113 new testing labs (21 Govt. and 92 Private) were approved and functionalized for covid-19 testing in the month. Accordingly, a total of 5,44,77,675 samples have been tested during the month and the testing capacity was increased up to more than 20,00,000/day.

2) **Approved a total of 2788 (1297 Governments and 1491 Private) Labs for COVID-19 testing.**

State-wise details: Andhra Pradesh (131); Arunachal Pradesh (27); Assam (55); Bihar (67); Chandigarh (11); Chhattisgarh (56); Delhi (130); Gujarat (122); Goa (9); Haryana (74); Himachal Pradesh (33); Jammu & Kashmir (36); Jharkhand (49); Karnataka (200); Kerala (170); Maharashtra (270); Madhya Pradesh (128); Manipur (18); Meghalaya (21); Mizoram (12); Nagaland (14); Odisha (61); Puducherry (16); Punjab (67); Rajasthan (78); Tamil Nadu (279); Telangana (119); Tripura (6); Uttar Pradesh (275); Uttarakhand (64); West Bengal (147); Andaman & Nicobar Islands (5); Dadra & Nagar Haveli (1); Sikkim (4); Leh-Ladhak (4); Lakshdweep (2) ; Mobile testing lab (27)

-Real-Time RT PCR for COVID-19: 1701 (Govt: 623+Private: 1078)

- TrueNat Test for COVID-19: 938 (Govt: 625 + Private: 313)

- CBNAAT Test for COVID-19: 131 (Govt: 41 + Private: 90)

-Other Molecular-Nucleic Acid (M-NA) Testing Platforms for COVID-19: 18 (Govt: 08 + Private: 10)

Note: Other Molecular-Nucleic Acid includes Abbott ID NOW, RT-LAMP, CRISPR-Cas9, and Accula™

3) **Kits Distributed to Lab/States across the country during the month:**

RT PCR	RNA Extracti on	VTM
3,18,100	1,87,504	31,933

- 4) **Clinical characterization and Genomic analysis of COVID-19 breakthrough infections during the second wave in different states of India:** To understand the possible reason for increased number of post-vaccination breakthrough infections reported across the country during March to June 2021; 677 clinical samples (throat swab/nasal swabs) of individuals who had received two doses (n=592) and one dose (n=85) of vaccines (Covishield and Covaxin,) and tested positive for COVID-19, from 17 states/Union Territories of country. A total of 511 SARS-CoV-2 genomes were recovered with a genome coverage of higher than 98% from both cases. Analysis of both the cases determined that 86.69% (n=443) of them belonged to the Delta variant along with Alpha, Kappa, Delta AY.1 and Delta AY.2. The Delta variant is clustered into 4 distinct sub-lineages. This study indicated that the majority of the clinical cases in the breakthrough were infected with the Delta variant and only 9.8% of cases required hospitalization while fatality was observed in only 0.4% of cases. This suggests that the vaccination does provide a reduction in hospital admission and mortality.
- 5) **Phylogenetic analysis of newly identified predominantly circulating lineages B.1.617.1 and B.1.617.2.** The signature mutations possessed by these strains were L452R, T478K, E484Q, D614G and P681R in the spike protein, including within the receptor-binding domain (RBD). The structural analysis of RBD mutations L452R, T478K and E484Q revealed that these may result in increased ACE2 binding while P681R in the furin cleavage site could increase the rate of S1-S2 cleavage, resulting in better transmissibility. The two RBD mutations, L452R and E484Q, indicated decreased binding to select monoclonal antibodies (mAbs) and may affect their neutralization potential. Further in vitro/in vivo studies would help confirm the phenotypic changes of the mutant strains. Overall, the study revealed that the newly emerged variants were responsible for the second wave of COVID-19 in Maharashtra. Lineage B.1.617.2 has been designated as a VOC delta and B.1.617.1 as a variant of interest kappa.
- 6) **Issued guidance Document** for the Psychosocial Support for Health Care Workers during COVID-19 pandemic.
- 7) **Initiated activities for ICMR-WHO Solidarity Trial Plus** for conducting of Randomized Controlled Clinical Trial for treatment options for Hospitalized COVID 19 Patients.
- 8) **Completed recruitment** for Covovax COVID Vaccine trial.
- 9) **Initiated cost of illness analysis of COVID-19** among various states and union territories in India.
- 10) **Assessment of health-related quality of life (HRQOL) among COVID-19** recovered individuals in various states and union territories in India: a cross sectional study.
- 11) **Initiated and standardized COVID-19** environmental surveillance.
- 12) **Monitoring the adverse events** in Covaxin vaccinated recipients.
- 13) **Issued press release**, India achieves milestone of 40 crores COVID-19 Sample Testing: Number of Covid-19 testing laboratories at more than 2600.

14) **Audio-visual communication on COVID-19** awareness for tribal children in Sahdri (tribal dialect) language was launched by the District collector Sundergarh (Odisha)

15) **Daily media mapping** showed ICMR has been quoted more than 800 times in print in past 30 days. Queries regarding possibility and severity of third wave, fourth national sero-survey results, difference between first and second wave, and difference between effects of were addressed.

b) Launched the Ayurveda Dataset Items on CTRI Portal, by the Honourable AYUSH Minister Mr Kiran Rijiju on 5th July 2021. The modified data set items, which were jointly developed by ICMR-National Institute of Medical Statistics and Central Council for Research in Ayurveda Sciences were formally inaugurated and launched on the CTRI portal.

c) Initiated the development of an in-house IgG ELISA for Herpes Simplex Virus during the month. Initial results were promising, and further development and evaluation of the assay are in progress.

d) Developed and validated an in-house assay for HIV-1 integrase drug resistance genotyping certified by WHO.

e) Filed an IND (Investigational New Drug) on Phytopharmaceutical drug PDP-117 to DCGI for conducting phase I clinical trial on this drug. This drug has been developed to combat the growing burden of type-2 diabetes mellitus subjects in the country by delaying/prevention of type-2 diabetes mellitus among prediabetics individuals.

f) Disseminated press release on "First comprehensive estimates of disease burden from neurological disorders and their trends in every state of India from 1990 to 2019. The study was covered by more than 20 major media houses.

g) Dengue Investigations and serotyping: A total of 201 samples were tested for NS1 antigen from 11 districts. Dengue virus (DENV) type 1 was detected in 11 samples from three districts, and DENV type 2 detected in 86 samples from all 11 districts. DENV type 3 was detected in 8 samples from four districts. Dual infection with DENV types 1 and 2 were detected in one sample from one district, while eight samples from four districts showed co-infection with DENV types 2 and 3.

h) Diagnostic Reagent Facility: During the month, a total of 678 MAC ELISA kits (407 for dengue, 216 for Chikungunya and 55 for Japanese encephalitis) were supplied to sentinel surveillance hospitals and apex laboratories under the National Vector Borne Diseases Control Program (NVBDCP). A total of 39 MAC ELISA kits (12 for dengue, 11 for Chikungunya and 16 for Japanese encephalitis) were also supplied to DHR-Virus Research and Diagnostic Laboratories.

i) Initiated DBT fellowship in Genetics Diagnostics under the UMMID programme at NIIH, Mumbai.

j) Initiated and imparted 4-week DHR Training Course 2021 on Medical Genetics.