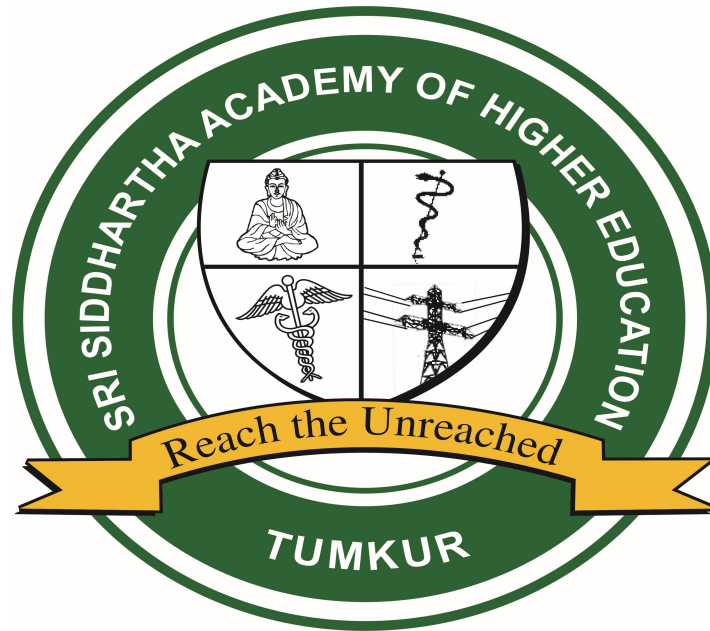


Sri Siddhartha Academy of Higher Education



COVID -19: BULLETIN:- 4

23/05/2020

Under the **Guidance** of Honorable Vice Chancellor Dr. Balakrishna Shetty P,
Sri Siddhartha Academy of Higher Education has prepared COVID-19 Bulletin.

Prepared by:

1. Dr. Sudeep Kumar M, Deputy Registrar, SSAHE
2. Dr. Girish Babu R.J, HOD Microbiology, SSIMS&RC
3. Dr. Narayana K, HOD Pharmacology, SSIMS&RC
4. Dr. Keerthi H, Dept of Psychiatry, SSIMS&RC
5. Dr. Ramya K.S, Dept of Community Medicine, SSIMS&RC

POLITICAL SCENARIO

USA

- The president said state governments should "seriously consider" reopening public schools before the end of the academic year in May. But officials have warned that doing so could pose major health risks.
- Coronavirus kills 70 veterans at Massachusetts care home.
- Los Angeles offers free virus testing to all residents.
- An MIT study says a targeted approach keeping older folks at home would be more effective against the coronavirus than a universal lockdown policy.
- US immunologist warns of 'darkest winter' if virus rebounds.

SPAIN

- Spain has now completed two months of the current 'state of alarm' that commenced on 14 March – and it could possibly be extended until towards the end of June.
- Shops can open at half capacity from around the end of June, with two metres (6ft) between shoppers.
- Beaches are expected to reopen in late June.

ITALY

- Lockdown's heavy toll on Italy's mental health.
- The surge in cases after the first diagnosis suggests the virus had been in Italy longer than realised, say researchers.
- Italy to reopen two airports as lockdown eases.
- Milan is a ticking coronavirus 'bomb' under phase two, virologist warns.
- Italy to grant residence to undocumented migrant workers during coronavirus crisis.

FRANCE

- A study into coronavirus cases in France from the Pasteur Institute in Paris has found evidence of a previously unreported strain of the virus in France, that cannot be linked to travel to either Italy or China.
- France to maintain tight international travel restrictions until at least June 15th.
- France's quarantine rules 'could apply to European countries if coronavirus is out of control.
- Bars, cafés and restaurants in France 'could reopen in June' - but only in green zones.

GERMANY

- Chancellor Angela Merkel once again urged people in Germany to stick to restrictions, saying the coronavirus pandemic is still a real danger.
- Behind locked doors: Bundesliga comeback in Germany.
- Germany's far-right AfD weakened by infighting amid coronavirus crisis.
- Germany to lift quarantine requirement for travellers from bordering countries.

UK

- Boris Johnson has announced changes to guidelines in England on exercise and social distancing.
- Police, tourism bosses and politicians say they fear some areas will see an influx of visitors.
- Garden and recycling centres in NI can reopen from today, as part of the first steps to ease lockdown.
- Schools 'safe' to reopen, Michael Gove insists.

RUSSIA

- Russia's coronavirus lockdown could stay in place until a coronavirus vaccine is developed or until the pandemic ends, said Anna Popova, the head of Russia's consumer protection.
- Moscow's coronavirus lockdown has been extended until May 31, Mayor Sergei Sobyenin said.
- More than 13,000 people in Dagestan have contracted the coronavirus or community-acquired pneumonia (CAP), the region's health minister said Sunday.
- The Russian Premier League's season will resume June 21, the Russian Football Union (RFU) said Friday.

CHINA

- Fearing 2nd infection wave, China's Wuhan ramps up virus tests.
- The number of patients undergoing treatment for COVID-19 in China has fallen below 100 for the first time since January.
- Officials vowed to test all 11 million Wuhan residents in 10 days, but it appears they need longer.
- Fearing 2nd infection wave, China's Wuhan ramps up virus tests.

INDIA

- Lockdown 4.0 will remain in effect till 31st May 2020: MHA.
- Movement of people will remain strictly prohibited across the country from 7 pm to 7 am, except for essential activities: Lockdown 4.0 guidelines.
- Aarogya Setu app must for employees: MHA Only Shramik Special, other special trains, parcel and freight services will operate during Lockdown 4.0: Indian Railways.
- Country's largest carmaker Maruti Suzuki to resume operations at Gurugram plant from May 18.
- All shops will be allowed to open, all trains running within the state will be allowed: Karnataka CM BS Yediyurappa.
- Restrictions under Sec 144 extended in Chhattisgarh for 3 months.

EPIDEMIOLOGY SCENARIO

Global

Case Report Form for multisystem inflammatory syndrome (MIS)

WHO has published a **new Case Report Form** for “Suspected cases of **multisystem inflammatory syndrome (MIS)** in children and adolescents temporally related to COVID-19” intended for use by public health professionals for collecting standardized data on clinical presentations, severity and outcomes.

COVID-19 Research Roadmap agenda

WHO is implementing the **COVID-19 Research Roadmap agenda** to translate evidence from the social sciences into action. Social science is a broad disciplinary field that includes anthropology, psychology, behavioural science, political science, and social epidemiology.

The aim of this group is to translate evidence from the social sciences into action that can inform response strategies by developing and sharing protocols, tools and technical expertise, for example on key considerations from social science on public use of face masks, immunity passports, homecare, routine immunization programmes, and vaccine implementation.

The group achieves its objectives through collaboration and by coordinating action with other initiatives, including with the research arm of the **Global Outbreak Alert and Response Network (GOARN)**.

Public health and social measures in the context of COVID-19

Every country should be implementing a comprehensive set of measures, calibrated to the local context and epidemiology of the disease. The intensity of COVID-19 transmission is typically not homogenous within a country, so national authorities should ensure that measures that are applied are based on sub-national epidemiology and with time limits on their length of implementation. Any adjustments to public health and social measures, and the reasons for the adjustments, should be clearly communicated to the public.

| Personal measures | Physical and social distancing | Movement measures | Special protection measures |
|--|--|---|--|
| Frequent hand hygiene Physical distancing Respiratory etiquette Proper use of masks if unwell or attending to someone who is ill Environmental | Workplaces Schools Distance learning, Mass gatherings Risk assessment, adapt, postpone, or cancel events Public spaces and transportation Reduce crowding | Reduce non-essential travel and limit movement locally, regionally, or nationally. <i>Cordon sanitaire</i> or border measures when justified by local epidemiology Isolation or quarantine for arriving travellers | Persons at risk, vulnerable persons Health workers frontline responders, caregivers Coordinate health care, rehabilitation centres, and community services |

| | | | |
|------------------|--|--|--|
| cleaning at home | | | |
|------------------|--|--|--|

Regional (India)

The Emergency Medical Relief (EMR) Division of Ministry of Health & Family Welfare, Government of India on 18th May, 2020 has released guidelines on preventive measures to contain spread of COVID-19 in workplace settings.

The document is divided into the following subsections

- Basic preventive measures to be followed at all times
- Measures specific to offices
- Measures to be taken on occurrence of case(s)
- Disinfection procedures to be implemented in case of occurrence of suspect/confirmed case

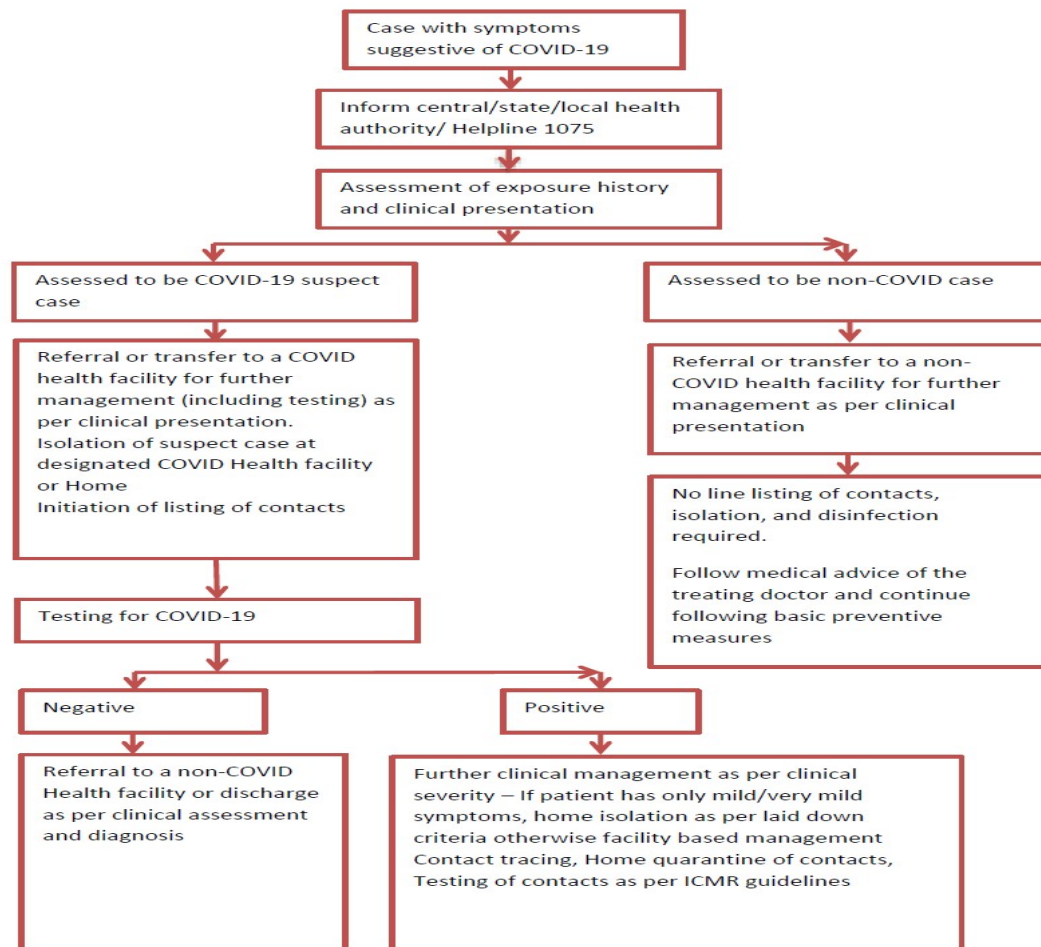
If there are large numbers of contacts from a pre-symptomatic/asymptomatic case, there could be a possibility of a cluster emerging in workplace setting. Due to the close environment in workplace settings this could even be a large cluster (>15 cases). The contacts will be categorised into high and low risk contacts by the **District RRT (Rapid Response Team)**

The **high risk exposure contacts** shall be quarantined for 14 days. They will follow the guidelines on home quarantine. These persons shall undergo testing as per ICMR protocol.

The **low risk exposure contacts** shall continue to work and closely monitor their health for next 14 days.

If there are one or two cases reported, the disinfection procedure will be limited to places/areas visited by the patient in past 48 hrs. **There is no need to close the entire office building/halt work in other areas of the office** and work can be resumed after disinfection as per laid down protocol. If large clusters, closure of workplace is necessary.

Figure 1: Management of the case(s) and contacts



CLINICAL SCENARIO

- Large-Vessel Stroke as a Presenting Feature of Covid-19 in the Young: Five cases of large-vessel stroke in patients younger than 50 years of age who presented to health system in New York City. Severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) infection was diagnosed in all five patients.
- Abdominal Visceral Infarction in 3 Patients with COVID-19: A high incidence of thrombotic events has been reported in patients with coronavirus disease (COVID-19), which is caused by severe acute respiratory syndrome coronavirus-2 (SARS-CoV-2) infection.
- Prolonged Persistence of SARS-CoV-2 RNA in Body Fluids. The prolonged persistence of virus RNA in various body fluids may guide the clinical diagnosis and prevention of onward virus transmission.
- Infections in children occur early in COVID-19 epidemics. The proportion of confirmed patients among those with compatible symptoms was 11%. Severe infections may occur, needing PICU admission or high-flow ventilation.
- During 24 days in Cheonan, South Korea, 112 persons were infected with severe acute respiratory syndrome coronavirus 2 associated with fitness dance classes at 12

sports facilities. Intense physical exercise in densely populated sports facilities could increase risk for infection. Vigorous exercise in confined spaces should be minimized during outbreaks.

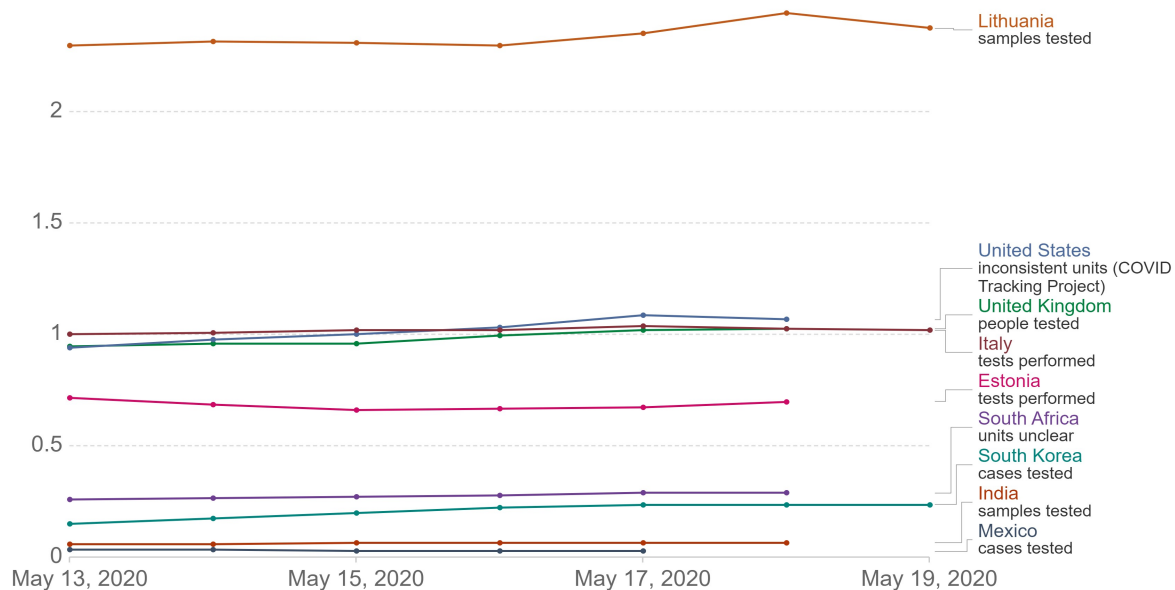
- SARS-CoV-2 environmental contamination in rooms of a quarantine hotel after presymptomatic persons who stayed there, later they became laboratory-confirmed cases having coronavirus disease. SARS-CoV-2 RNA were found on surfaces, door handle and light switch, as well as on the pillow cover, sheet, and duvet cover. Thus, to minimize the possibility of dispersing virus through the air, it is recommend that used linens not be shaken upon removal and that laundered items be thoroughly cleaned and dried to prevent additional spread.

LABORATORY TESTING SCENARIO

Daily COVID-19 tests per thousand people

The figures are given as a rolling 7-day average.

Our World
in Data



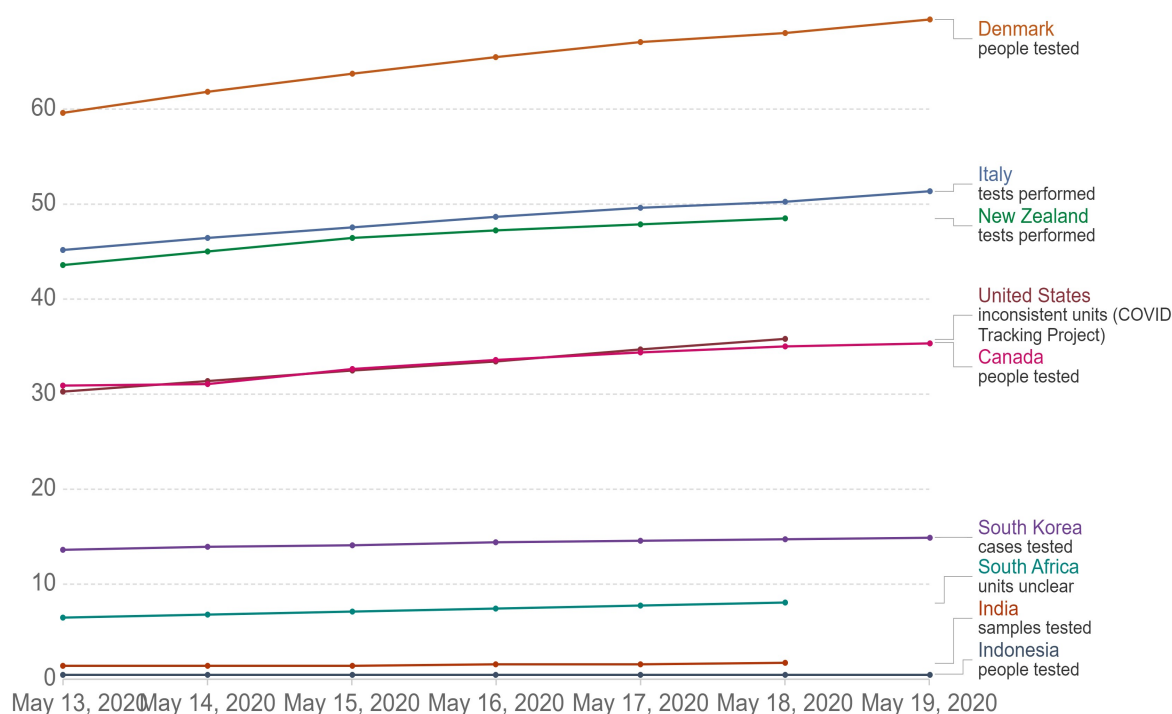
Source: Official data collated by Our World in Data

Note: There are substantial differences across countries in terms of the units, whether or not all labs are included, the extent to which negative and pending tests are included and other aspects. Not all countries report testing data on a daily basis. To generate the daily testing series we assume that testing changed equally on a daily basis over any periods in which no data was reported. Details for each country can be found at the linked page.

CC BY

Total COVID-19 tests per 1,000 people

Our World
in Data



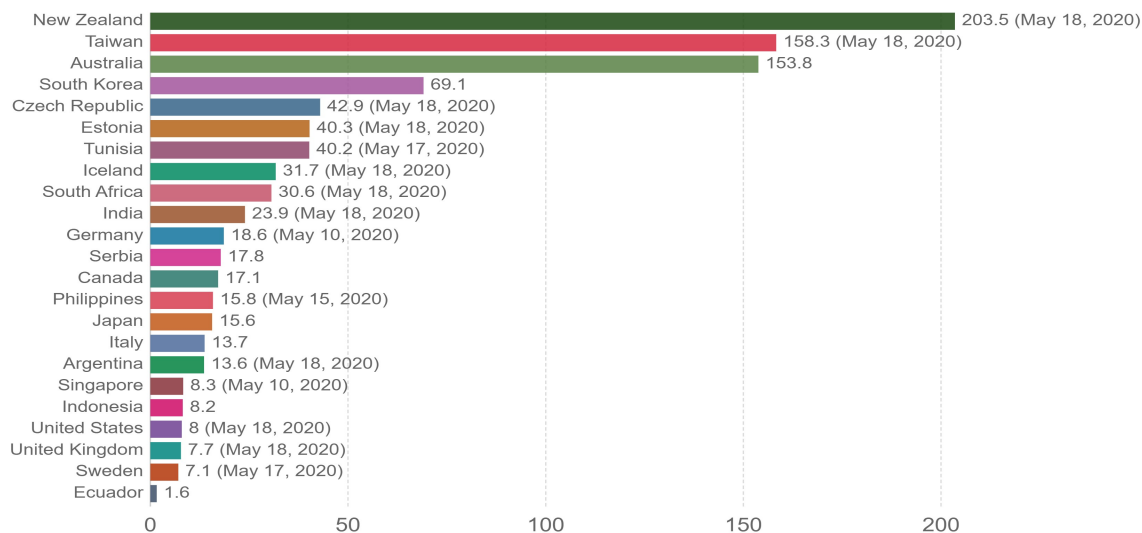
Source: Official sources collated by Our World in Data

OurWorldInData.org/coronavirus • CC BY

Note: For testing figures, there are substantial differences across countries in terms of the units, whether or not all labs are included, the extent to which negative and pending tests are included and other aspects. Details for each country can be found at the linked page.

Number of COVID-19 tests per confirmed case, May 19, 2020

Our World
in Data



Source: Tests: official data collated by Our World in Data. Confirmed cases: European CDC – Situation Update Worldwide

Note: For testing figures, there are substantial differences across countries in terms of the units, whether or not all labs are included, the extent to which negative and pending tests are included and other aspects. Details for each country can be found at the linked page.

OurWorldInData.org/coronavirus • CC BY

ICMR: Strategy for COVID19 testing in India (Version 5, dated 18/05/2020)

1. All symptomatic (ILI symptoms) individuals with history of international travel in the last 14 days.
2. All symptomatic (ILI symptoms) contacts of laboratory confirmed cases.
3. All symptomatic (ILI symptoms) health care workers / frontline workers involved in containment and mitigation of COVID19.

4. All patients of Severe Acute Respiratory Infection (SARI).
 5. Asymptomatic direct and high-risk contacts of a confirmed case to be tested once between day 5 and day 10 of coming into contact.
 6. All symptomatic ILI within hotspots/containment zones.
 7. All hospitalized patients who develop ILI symptoms.
 8. All symptomatic ILI among returnees and migrants within 7 days of illness.
 9. No emergency procedure (including deliveries) should be delayed for lack of test.
- However, sample can be sent for testing if indicated as above (1-8), simultaneously.

- Zydy delivers first batch of Antibody testing Kits to ICMR.

CDC: <https://www.cdc.gov/coronavirus/2019-ncov/lab/guidelines-clinical-specimens.html>.

Revisions were made on May 5, 2020 to reflect the following - Symptom-Based Strategy to Discontinue Isolation for Persons with COVID-19.

- Severe acute respiratory syndrome coronavirus 2 was isolated from feces of a patient in China with coronavirus disease who died. Confirmation of infectious virus in feces affirms the potential for fecal–oral or fecal–respiratory transmission and warrants further study.
- Lung pathology showed exudative and organizing phases, similar to what is observed in cases of severe acute respiratory syndrome. SARS-CoV-2 antigen in alveolar epithelial cells and alveolar macrophages were detected. COVID-19 is probably caused by direct injury of alveolar epithelial cells by SARS-CoV-2, accompanied by secondary damage to nonrespiratory organs.

THERAPEUTIC SCENARIO

Current Status as far as management of Novel Corona Virus is concerned

- With the exception of remdesivir, no drugs or biologics have been proven to be effective for the prevention or treatment of COVID-19. Remdesivir gained emergency use authorization (EUA) from the FDA on May 1, 2020, based on preliminary data showing a faster time to recovery of hospitalized patients with severe disease.
- The urgent need for treatments during a pandemic can confound the interpretation of resulting outcomes of a therapy if data are not carefully collected and controlled. Rome and Avorn write about unintended consequences of allowing widening access to experimental therapies. First, efficacy is unknown and may be negligible, but, without appropriate studies, physicians will not have evidence on which to base judgement. Existing drugs with well-documented adverse effects (eg, hydroxychloroquine) subject patients to these risks without proof of clinical benefit.

Covid- 19 Registered Trails and Analysis

- The majority of clinical trials involving Covid-19 vaccines or treatments are showing “encouraging” results, says an analyst. Of the 21 ongoing coronavirus trials that have reported interim results, 16 have produced positive indications early on, according to analytics firm GlobalData. Some 69% of these clinical trials are currently in the early stages — either Phase I or Phase II — with US biotech firm Gilead Sciences’ remdesivir drug being the main exception having moved into Phase III testing in late-February. Scotty Chung-Siu, a senior public health expert at GlobalData, said: “While many of the current Covid-19 clinical trials show promising early results, conclusions can only be drawn once the final data is reported. “With 597 planned clinical trials, there will be more data to draw

insights in the coming months and, possibly, a key drug candidate treatment for Covid-19 will emerge.”

- WHO warns against using hydroxychloroquine outside clinical trials. According to GlobalData, five ongoing clinical trials of Covid-19 drugs have failed to demonstrate positive results so far. The most notable example to date is hydroxychloroquine — an immunosuppressive drug, ordinarily used to treat malaria, that recently failed to meet endpoints and saw adverse events in a retrospective study. Patients treated with hydroxychloroquine also had a higher mortality rate in clinical trials in the US
- Scientists and health experts across the world are working day and night to find a cure for the Covid-19 pandemic. At least 140 clinical trials that are in phase II and phase III are being conducted by various countries. Out of these 140, 67 clinical trials have reached phase III. Phase III in clinical trial is referred as the phase in which the drug is administered to a large number of people to expand the scope of its study for effectiveness and safety of the drug. The next step, if the trial is successful, is to apply for necessary permission from drug controllers and start the commercial production of the vaccine or the drug.
- A coronavirus vaccine candidate — developed by US-based biotechnology company Moderna — has shown promising results in the phase one of clinical trials. The ten-year-old company was the first to launch a human clinical trial for the potential vaccine against SARS-CoV-2 virus in March this year. The trials involved 45 healthy volunteers aged 18 to 55 years over approximately six weeks. The levels of neutralising antibodies on Day 43 were at or above levels generally seen in recovered Covid-19 patients, Moderna said.
- Pharmaceutical company Strides Pharma Science said on Thursday it has received regulatory approval to conduct clinical trials of antiviral drug favipiravir, considered a potential treatment for COVID-19. The Bengaluru-based company has received approval from the Drug Controller General of India to conduct trials of favipiravir in the country.
- Astrazeneca secures orders for Covid-19 Vaccine.