PSG Medi Pulse

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PSG is the First & Only Institute
In the region approved by ICMR for the conduct of randomized control trial (PLACID TRIAL) to assess the safety and efficacy of Convalescent Plasma Trial to limit COVID-19 associated complications

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Message

வெளிப்படையான மருத்துவ பணிகளை நடைபெறும் வளர்ச்சியாளர் அறிவியல் மையம்

முதலிடம் முன்னிட்டு நிறைவேற்றுவதற்கு முன்னர நீதியால் நிலையாகவே நீதியை கொண்டு பதவியை முறக்க பதவியை மாற்றும் கலப்பாக்கல்.
Coronaviruses belong to large family of viruses, some of which are known to cause illness in humans, while others spread among mammals and birds. In rare occasions, coronaviruses that exist among animals can spread to humans. In recent years zoonotic coronaviruses have appeared to cause human outbreaks such as severe acute respiratory syndrome (SARS), Middle East respiratory syndrome (MERS) and Coronavirus disease 19 (COVID-19).

CoronaVirus Disease 19 (COVID-19) is defined as illness resulting from a novel Coronavirus (NCOV).

As it affects the respiratory system, it is now renamed as Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-CoV-2), which was first identified during an outbreak of respiratory illness among people in Wuhan City, Hubei Province, China. This deadly viral infectious disease was first reported to the WHO on December 31, 2019. Following that, on January 30, 2020 the WHO declared COVID-19 outbreak, a global health emergency. Furthermore because of its spread across the countries on March 11, 2020, the WHO declared COVID-19 a global pandemic.

Globally 4.8 9 million individuals are tested positive for COVID - 19 and more than 316,000 deaths were reported as on May 18, 2020. India has over 96,000 positive cases and 3000 deaths.

The route of transmission is found to be via respiratory droplets resulting from coughing and sneezing, which is the same as other respiratory pathogens like influenza and rhinovirus. Virus released in respiratory secretions find their entry through mucous membranes in the nose and mouth causing infection. Droplets cannot travel a distance more than 6 feet. Duration and degrees of infectivity of the virus depend upon the surface it persists. One study found that SARS-CoV-2 remained detectable for up to 72 hours on some surfaces despite decreasing infectivity over time.

COVID-19 shows wide range of clinical presentations from asymptomatic/mild symptoms to severe illness and mortality. Duration of symptom development ranges from 2 days to 2 weeks after
being exposed to the virus. In an analysis carried out among 181 confirmed cases of COVID-19 outside Wuhan, China, they found that the mean incubation period is 5.1 days and that 97.5% of individuals who developed symptoms did so within 11.5 days of infection. Among 72,314 COVID-19 cases reported to the Chinese Center for Disease Control and Prevention (CCDC), 81% were mild (absent or mild pneumonia), 14% were severe (hypoxia, dyspnea, >50% lung involvement within 24-48 hours), 5% were critical (shock, respiratory failure, multi-organ dysfunction) and 2.3% were fatal.

Symptoms for COVID-19 include cough and shortness of breath or difficulty in breathing with at least two of the following symptoms: fever, chills, muscle pain, headache, sore throat, new loss of taste or smell, fatigue, diarrhoea and malaise.

The most common severe manifestation of COVID-19 is pneumonia. The known risk factors which cause progression of the disease and mortality are advanced age, immuno compromised condition, diabetes, cardiovascular disease, hypertension, chronic pulmonary disease, chronic renal disease, liver disease, malignancy and morbid obesity. Complications of COVID-19 include pneumonia, acute respiratory distress syndrome, cardiac injury, arrhythmia, septic shock, liver dysfunction, acute kidney injury, and multi-organ failure.

RT-PCR technique of analysing the respiratory specimens is found to be the gold standard diagnostic test (samples from lower respiratory tract have high yield than nasopharyngeal and oropharyngeal samples). Leukopenia, lymphopenia, elevated lactate dehydrogenase and ferritin levels, high D Dimer are the other findings reported in COVID-19 patients. CT chest shows peripheral ground glass opacities.

There is no specific treatment for COVID-19 till date. Symptomatic treatment is being followed for patients with mild symptoms. The experimental therapies for symptomatic patients include HCQ, Azithromycin, Remdesivir, Favipravir, Lopinavir-Ritonavir, Tocilucimab, Methylprednisolone and Convalescent plasma transfusion.

No vaccine is currently available for SARS-CoV-2. Prevention is better than cure. General measures for prevention of viral respiratory infections include practice of hand washing with soap and water for at least 20 seconds or using alcohol-based hand sanitizer. Avoid touching eyes, nose, and mouth with unwashed hands, avoid close contact with sick people. Strict practice of social distancing and cough etiquette should be encouraged in public places.

DON'T

- Do not travel and avoid public transport.
- Avoid public gathering / Crowded area.
- Avoid contact with suspected patients.
- Don’t panic as far as the pandemic is concerned.
Children can get COVID-19, but they seem to get it less often than adults and it’s usually less serious. Still, parents wonder what to do if their child gets sick.

Here is a quick guide:

**when to visit your regular paediatric OPD?**

If your child
- has a temperature of 39°C or higher, or you think they have a fever
- has other signs of illness, such as a rash, as well as a high temperature (fever)
- has a high temperature that’s lasted for 5 days or more
- does not want to eat, or is not their usual self and you’re worried
- has a high temperature that does not come down with paracetamol
- is dehydrated - for example, nappies are not very wet, sunken eyes, and no tears when they’re crying

**when to visit paediatric emergency?**

If your child
- has a stiff neck
- has a rash that does not fade
- is bothered by light
- has a seizure or fit for the first time
- has unusually cold hands and feet
- has pale, blotchy, blue or grey skin
- has a weak, high-pitched cry that’s not like their usual cry
- is drowsy and hard to wake
- is extremely agitated (does not stop crying) or is confused
Available evidence suggests that pregnant women are at no greater risk of becoming unwell. However, pregnant women with anaemia, gestational diabetes mellitus (GDM), hypertension, heart disease & chronic obstructive pulmonary disease (COPD) are at higher risk. There is no evidence of miscarriage or teratogenic effect due to COVID-19. Emerging evidence now suggests that vertical transmission is probable. COVID-19 infection is currently not an indication for medical termination of pregnancy (MTP).

How to give adequate antenatal care to a pregnant patient in this covid pandemic?

The aim is to minimize antenatal visits to the hospital and tailored according to their risks & needs.

When is the first visit in the current scenario?

First visit is to be scheduled around 11 to 13 weeks of gestation along with Nuchal Translucency scan and basic antenatal investigations.

When to seek urgent medical advice in the first 3 months?

Symptoms such as pelvic pain and bleeding per vaginum, to rule out ectopic pregnancy and miscarriage.

When are the subsequent visits scheduled?

- 2nd appointment is at 20 to 22 weeks along with anomaly scan, GCT, Hemoglobin and Urine complete examination.

- Low risk patients- Schedule next appointment at 28 weeks, 32 and 36 weeks of gestation. Routine growth scan is to be done at 36 weeks.

- High risk patients may require frequent antenatal visits according to risk factors. Educate about home glucose & blood pressure monitoring, and also daily fetal movements count. High risk patients may require growth scan as early as 28-32 weeks.

- Educate about daily fetal movement monitoring & report for alarming symptoms (bleeding per vaginum, draining per vaginum, preterm pain, decreased fetal movement)

- From 36 weeks onwards reinforce weekly antenatal visit to plan delivery.

DOs

- Social distancing
- Hand washing
- Healthy diet
- To check for symptoms of fever/cough and get phone consultation for minor ailments.
Corona Crossword

Across:
1. Corona virus spreads by this way too
6. Follow you, find you and test you
11. Disinfectant for surfaces
13. If coronavirus testing is positive with mild symptoms the person does this
14. One of the major symptoms of corona virus infection
15. The farther you go, the safer you are
17. Separating people who are not ill themselves but may have been exposed to corona positive case

Answers:
Across:
1. Droplet 6. Contact tracing 11. Sodium hypochlorite
17. Quarantine

Down:
2. Maintain this distance
3. Fights malaria and possibly corona too
4. Still under research, may offer protection against corona if given
5. Other than soap and water this can be used for hand hygiene
7. This is done for at least 20 seconds
8. Indian government asks to install this app in your smartphone for information and awareness
9. Offers protection while doing surgeries or procedures
10. Corona virus disease
12. If you wear this it not only protects you but also others
16. Wear it if you do aerosol generating procedures

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