

# Evidence to guide paediatric COVID-19 patient care



In response to the World Health Organization declaring the COVID-19 pandemic a global health emergency, Cochrane Mexico immediately identified relevant evidence to develop a COVID-19 guide for diagnosing and treating paediatric patients.

## What we did



### Aim

The first COVID-19 case in Mexico was announced on 28 February 2020. We anticipated that the number of cases would rapidly increase, some cases even occurring in children. Cochrane Mexico created a Guide for COVID-19 diagnosis and treatment in paediatric patients. The Guide is for physicians in emergency departments, family physicians, paediatricians, and physicians working on newly created COVID-19 dedicated teams.



### Activities

- We reviewed all available literature on the characteristics of the virus, the mechanisms of transmission, clinical presentation and initial treatment recommendations. As it was a new virus, the information reviewed was primarily on the severe respiratory infections from other types of coronavirus (Severe Acute Respiratory Syndrome and Middle East Respiratory Syndrome).
- We finished reviewing the literature and developing the Guide as quickly as possible, so that it was available by the time the first cases in children began to appear. As this virus does not primarily affect children, the information available was limited.
- One of the Cochrane Mexico affiliate centers is based at Paediatric Hospital, National Medical Centre XXI Century of the Mexican Institute of Social Security (IMSS), so we drew on our clinical practice experience to develop a Guide on clinical care and management for new patients and patients with underlying conditions. We added evidence relevant for the latter group in various internal documents, even though not as part of the Guide.



### Collaboration

We worked on the Guide with a group of paediatric infectious disease specialists.

# What we achieved

- We successfully developed the Guide early in the pandemic, and it is being used at the Paediatric Hospital, National Medical Centre XXI Century, IMSS, to manage COVID-19 diagnosis and treatment amongst paediatric patients. It was also published in the COVID-19 repository of the Revista Médica del IMSS (IMSS Medical Journal) at the beginning of April.
- Using the same approach, we recently developed a new Guide for caring for paediatric patients with cancer.

*From March 23rd to November 6th 2020, 135 patients were hospitalized at the Pediatric Hospital, XXI National Medical Center, IMSS with a probable diagnosis of infection due to SARS-CoV-2. Of them, 40 were positive. Following the recommendations of the guideline, antiviral and adjuvant treatments were not used. Several studies had demonstrated the lack of efficacy of most of these treatments. This represents not only a proper use of resources, but also possible adverse effects were avoided.*

See more here:

<https://www.smep.org.mx/wp-content/uploads/2020/11/3736.pdf>

# What we learnt

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We learned that in an emergency situation, it is **important to identify whatever evidence is available in a short time space**, even though we could not identify and access all relevant evidence out there. The evidence we found (on other coronavirus) and experience from clinical practice in our local setting was useful for developing a Guide on COVID-19 paediatric patient care.

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A key lesson is that we are able to **continuously update and improve the recommendations we made**, as new evidence for COVID-19 paediatric patient care becomes available. Cochrane Mexico affiliate centers are constantly sharing new evidence and experiences with each other and drawing on paediatric specialists working in the local setting.



# Learn more

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