

IPCRG practice driven answers on COVID-19 and respiratory questions



What medicines are available to treat an acutely unwell person with COVID-19 in the primary care setting to reduce the risk of hospital admission?

What the research says

The monoclonal antibodies casirivimab and imdevimab are recommended by the WHO as a one off dose (subcutaneous or intravenous) for patients with non-severe COVID-19 at the highest risk of hospitalisation (WHO 2021). In the USA, the monoclonal antibody sotrovimab has been granted emergency authorisation* for use in the community setting for the treatment of children aged >12 years and adults with mild-to-moderate COVID-19 illness who are at risk for severe disease (GSK 2021). The oral antiviral agents molnupiravir and ritonavir-boosted nirmatrelvir (Paxlovid) are approved for use in the UK (MHRA, 4 November 2021; MHRA, 31 December 2021), and both agents have been granted emergency use authorisation for use in the USA (CDC 2021), in patients with mild to moderate COVID-19 who are at the beginning of symptom onset and at higher risk of progression to severe disease. A range of medicines are under evaluation for use in primary care with a view to i) symptom relief/control, ii) reducing the likelihood of hospitalisation iii) reducing the need for intensive care unit care and of death.

**An Emergency Use Authorization permits the use of a medical product that has either not yet received regulatory approval or has not received regulatory approval for a specific indication, to be used in an emergency situation to diagnose, treat, or prevent serious or life-threatening diseases or conditions.*

Although no specific studies have been conducted on the efficacy and safety of paracetamol it remains widely used as part of a standard of care for symptoms of COVID-19, with no reports of safety concerns identified. Similarly, for ibuprofen, despite initial concerns, no data indicating safety concerns exist in the context of COVID-19 infection.

What this means for your clinical practice

- The monoclonal antibodies casirivimab and imdevimab are recommended by the WHO as a one off dose (subcutaneous or intravenous) for patients with non-severe COVID-19 at the highest risk of hospitalisation.
- In the USA, following FDA emergency authorisation, sotrovimab may be considered for the treatment of children aged >12 years and adults with mild-to-moderate COVID-19 illness who are at risk for severe disease (GSK 2021).
- The oral antiviral agents molnupiravir and ritonavir-boosted nirmatrelvir (Paxlovid) are approved for use in the UK and both have been granted emergency use authorisation for use in the USA.
- Medicinal treatment of acute COVID-19 should currently focus on symptomatic relief.

- Standard antipyretics, paracetamol or ibuprofen, can be used for the management of fever and pain, there is no evidence to suggest they halt progression to more severe disease.
- Diarrhoea and nausea should be managed according to local standard of care.
- Antibiotic stewardship remains important during the COVID-19 pandemic. Antibiotic prophylaxis is not advised and antibiotics should not be prescribed unless there is a clinical suspicion of a bacterial infection.
- At the present time there is no evidence to support the use of oral steroids or prophylactic oral anticoagulants for the treatment of patients with COVID-19 in the community setting.
- While a phase 2 study in 146 patients has shown inhaled budesonide used within 7 days of COVID-19 symptom onset reduced the need for hospitalisation, larger studies are ongoing to determine whether this agent is appropriate for routine use in the primary care setting.

For more information on the emerging data for the use of inhaled corticosteroids in the community management of acute COVID-19 please see [here](#).

For more information on oral COVID treatments please see [here](#).

Useful links and supporting references

CDC. The COVID-19 Treatment Guidelines Panel's statement on therapies for high-risk, nonhospitalized patients with mild to moderate COVID-19. Available at: <https://www.covid19treatmentguidelines.nih.gov/therapies/statement-on-paxlovid-drug-drug-interactions/>. Accessed January 2022.

GSK. 2021. Sotrovimab Emergency Use Authorisation (EUA) for the treatment of COVID-19. Available at: <https://www.sotrovimab.com/>. Accessed 15 July 2021.

Hartmann-Boyce J, et al. Asthma and COVID-19: risks and management considerations. CEBM. Available at: <https://www.cebm.net/covid-19/asthma-and-covid-19-risks-and-management-considerations/>. Accessed May 2021

MHRA. Regulatory approval of Lagevrio (molnupiravir). Published: 4 November 2021. Available at: <https://www.gov.uk/government/publications/regulatory-approval-of-lagevrio-molnupiravir>. Accessed January 2022.

MHRA. Regulatory approval of Paxlovid. Published: 31 December 2021. Available at: <https://www.gov.uk/government/publications/regulatory-approval-of-paxlovid>. Accessed January 2022.

Siemieniuk RAC, et al. Drug treatment for covid-19: living systematic review and network meta-analysis. BMJ 2020;370:m2980. Available at: <https://www.bmj.com/content/370/bmj.m2980>. Accessed May 2021

World Health Organization. Home care for patients with suspected or confirmed COVID-19 and management of their contacts. Interim guidance, 12 August 2020. Available at: [https://www.who.int/publications/i/item/home-care-for-patients-with-suspected-novel-coronavirus-\(ncov\)-infection-presenting-with-mild-symptoms-and-management-of-contacts](https://www.who.int/publications/i/item/home-care-for-patients-with-suspected-novel-coronavirus-(ncov)-infection-presenting-with-mild-symptoms-and-management-of-contacts). Accessed May 2021

WHO. Therapeutics and COVID-19: living guideline. 24 September 2021. Available at : <https://www.who.int/publications/i/item/WHO-2019-nCoV-therapeutics-2021.1>. Accessed January 2022.

Authors

Professor Janwillem Kocks (President, IPCRG) for and on behalf of the IPCRG practice driven answers review group.

Last updated: 6 January 2022				
Care setting	Guideline recommended ^a	Limited evidence of efficacy	Evaluated: No evidence of efficacy	Under evaluation
Community care	<ul style="list-style-type: none"> Monoclonal antibodies: Sotrovimab (USA),^b casirivimab,^a imdevimab^a Molnupiravir (UK, USA)^{c,d} Ritonavir-boosted nirmatrelvir (UK, USA)^{d,e} 	<ul style="list-style-type: none"> Colchicine^f Inhaled budesonide^g 	<ul style="list-style-type: none"> Antibacterials with anti-inflammatory properties (azithromycin, doxycycline) Oral dexamethasone Remdesivir 	<ul style="list-style-type: none"> Antivirals: favipiravir^h Ivermectin^h Inhaled ciclesonide Anticoagulants Fluvoxamineⁱ Vitamin D, Vitamin C
Hospital care or during advanced care at home in certain countries	<ul style="list-style-type: none"> Oral steroids:^{a,j} <ul style="list-style-type: none"> Dexamethasone [preferred] Prednisolone Methylprednisolone Hydrocortisone Monoclonal antibodies: Sotrovimab (EU),^j casirivimab,^a imdevimab^a IL-6 receptor blockers, tocilizumab and sarilumab^a 		<ul style="list-style-type: none"> Lopinavir-ritonavir, remdesivir Hydroxychloroquine Prophylactic anticoagulants 	<ul style="list-style-type: none"> Colchicine Aspirin Antivirals: e.g baloxavir marboxil, favipiravir

^aWorld Health Organization. Therapeutics and COVID-19: living guideline. Available at: <https://www.who.int/publications/i/item/WHO-2019-nCoV-therapeutics-2021.1>.

^bApproved by the US FDA for Emergency use for the treatment of mild-to-moderate COVID-19 in adults and children >12 years at risk for progression to severe COVID-19. Available at: <https://www.sotrovimab.com/>.

^cMHRA. Regulatory approval of Lagevrio (molnupiravir). Available at: <https://www.gov.uk/government/publications/regulatory-approval-of-lagevrio-molnupiravir>. Published: 4 November 2021.

^dCDC. The COVID-19 Treatment Guidelines Panel's statement on therapies for high-risk, nonhospitalized patients with mild to moderate COVID-19. Available at: <https://www.covid19treatmentguidelines.nih.gov/therapies/statement-on-paxlovid-drug-drug-interactions/>. Published 30 December 2021.

^eMHRA. Regulatory approval of Paxlovid. Available at: <https://www.gov.uk/government/publications/regulatory-approval-of-paxlovid>. Published: 31 December 2021.

^fTardiff JC, et al. Pre-print, not yet peer reviewed, available at: <https://www.medrxiv.org/content/10.1101/2021.01.26.21250494v1>.

^gSTOIC study. Available at: [https://www.thelancet.com/journals/lanres/article/PIIS2213-2600\(21\)00160-0/fulltext](https://www.thelancet.com/journals/lanres/article/PIIS2213-2600(21)00160-0/fulltext)

^hPRINCIPLE study in community patients: <https://www.principletrial.org/>.

ⁱReis et al. Lancet Glob Health 2021;S2214-109X(21)00448-4.

^jApproved by the European Medicines Association for IV administration for patients aged >12 years with COVID-19 who do not require supplemental oxygen but are at risk for progression to severe COVID-19: https://www.ema.europa.eu/en/documents/referral/sotrovimab-also-known-vir-7831-gsk4182136-covid19-article-53-procedure-conditions-use-conditions_en.pdf. See also Gupta A, et al. Preprint available at: <https://doi.org/10.1101/2021.05.27.21257096>.

Last reviewed: 18 January 2022

Disclaimer: The content is drawn from the references listed above. Wording has been adapted for clarity and applicability for the primary care context. The content does not imply direction by the IPCRG nor does it form a position of the IPCRG on this subject. The content may be adapted as new evidence arises. This content is advisory; it is intended for general use and should not be regarded as applicable to a specific case. The IPCRG is a registered charity [SC No 035056] and a company limited by guarantee (Company No 256268). Communication address: 19 Armour Mews, Larbert, FK5 4FF, Scotland, United Kingdom