



## Updated advice to Antimicrobial Management Teams (AMTs) on antibiotic management/antimicrobial stewardship in the context of the COVID-19 pandemic

COVID-19 is exerting a significant impact on health care delivery across both primary and secondary care. It is critical that normal acute infection management is maintained and potential COVID-19 complications are anticipated. For the majority of patients COVID-19 will run an uncomplicated course, admission will not be required and bacterial super-infection will be uncommon. A minority of patients will require hospitalisation and a proportion will require ventilatory support. Secondary bacterial infection appears uncommon, however with overlapping clinical presentations it may be difficult to differentiate/exclude. There is no evidence that patients with COVID-19 are more likely to be affected by multidrug resistant bacteria and Staphylococcal pneumonia has not been widely recognised. Key areas to highlight regarding infection management during this challenging period are as follows:

- 1. Common bacterial infections will continue to occur.** Local primary/secondary care infection management guidelines and antimicrobial stewardship principles should be followed/ upheld.
- 2. Optimise ambulatory management of infection.** Consider and discuss with clinical managers how local OPAT/Complex outpatient antibiotic therapy services can be supported to maximise admission avoidance (e.g. skin and soft tissue infections/cellulitis) and early supported discharge (e.g. bone and joint infections) to optimise patient flow and capacity in hospitals.
- 3. Ensure availability of pre-pack antibiotics** for suspected community associated bacterial lower respiratory tract infections (5 days of amoxicillin or doxycycline) to support admission avoidance in community assessment hubs and hospital acute assessment units.
- 4. Consider/promote local Patient Group Directions (PGDs)** to support prompt patient triage and management in acute assessment areas in hospitals and the community.
- 5. Discuss maximising use of the multi-disciplinary infection management teams** including Antimicrobial Pharmacists and Infection Specialist nurses to support infection clinics and antimicrobial stewardship ward rounds to support staff in dealing with increased demand due to COVID-19.
- 6. Antimicrobial prescribing guidance in suspected or proven COVID-19 infection:**
  - COVID-19 suspected/confirmed, no purulent sputum and no evidence of pneumonia: Do not prescribe antibiotics
  - Bronchitis and purulent sputum: doxycycline or amoxicillin (5 days) or azithromycin (3 days)
  - Pneumonia (community or healthcare onset): follow local severity-based (CURB-65) CAP guidelines. Azithromycin may be considered as an alternative to clarithromycin.
  - Ventilator associated pneumonia: follow local guidance and microbiology advice
  - Remember to consider drug interactions particularly QTc prolongation and cation drug interactions
  - Remember to apply IVOST criteria
- 7. Specific COVID-19 directed therapy:** There is no proven therapy for COVID-19 infection. Experimental treatments (including hydroxychloroquine and chloroquine) should be restricted to use within clinical trials or exceptional compassionate use. The evidence remains inconclusive and changes almost daily with potential risks e.g. QTc prolongation in context of COVID-19 myocarditis that may outweigh benefits.