

Highly accurate point-of-care testing for CRP supports improved antibiotic prescribing and reduced risk of antimicrobial resistance.

Australia has a higher rate of antimicrobial medicines use than many other OECD countries. Monitoring use and reducing unnecessary antibiotic prescribing is a key strategy for preventing and containing antimicrobial resistance (AMR). AMR reduces the range of antimicrobial medicines available to treat infections and increases the morbidity and mortality of multi-drug resistant infections.¹

C-reactive protein (CRP) is a helpful biomarker to differentiate between a serious acute respiratory tract infection (ARI) like pneumonia and a self-limiting ARI.²



High levels of CRP in the blood are often associated with potentially serious bacterial infections but it doesn't usually increase to high levels in viral or self-limiting bacterial infections.³



In Australia, ARIs are among the most frequently managed problems in general practice with antibiotic prescribing rates for ARIs four to nine times those recommended by Therapeutic Guidelines.⁴

A CRP test can be performed at the point-of-care from a small fingerstick sample of blood with results available in 4 minutes.

Measuring the level of CRP in the blood (in addition to clinical signs, symptoms and patient history) can help determine whether a person may require antibiotics and additional medical care when presenting with coughs, colds, fever and/or symptoms of chest infections.

Point-of-care CRP testing supports healthcare professionals to 'rule out' the need for antibiotics in low-risk patients, while 'ruling in' antibiotics for high-risk patients.³ Reducing antibiotic use is the most important clinical response in limiting the risk of antimicrobial drug resistance.⁴



Patient presents with symptoms



CRP PoCT



Diagnosis & treatment - more informed decision during the patient visit

1. <https://www.safetyandquality.gov.au/our-work/healthcare-variation/antimicrobial-medicines-dispensing-2013-14-2017-18>
2. How to use CRP testing in general practice within consultations for acute respiratory tract infections. General Practitioners Antimicrobial Stewardship Programme Study (GAPS), University of Queensland.
3. Straight to The Point! Ensuring the rational use of antibiotics in Primary Care using C-reactive protein, a Consensus Report, June 2015.
4. McCullough A.R. et al. Antibiotics for acute respiratory infections in general practice: comparison of prescribing rates with guideline recommendations. Med J Aust 2017; 207 (2): 65-69