

Emergency Department Staff **be alert** for Meningococcal Disease!

Early recognition and prompt administration of empirical antibiotic therapy can be life saving.

- > *Meningococcal septicaemia* is more common than meningococcal meningitis and has a greater mortality rate.
- > Patients with a *systemic febrile illness*, particularly children, must be assessed promptly and reassessed as frequently as necessary for meningococcal disease, whether or not a rash is present.
- > In early stages of infection the rash may be atypical or not present; during later stages of infection a petechial or purpuric rash may develop rapidly.

Signs and symptoms

- > Fever, sweats, rigors, pallor, vomiting and/or nausea (non-specific signs and symptoms of a systemic illness).
- > Prostration, drowsiness, irritability, altered conscious state.
- > Headache, neck stiffness, photophobia, cranial nerve palsies and seizures (if meningitis).
- > Joint pain, myalgia, backache, difficulty walking.
- > Classic non-blanching petechial or purpuric rash, often in clusters where pressure occurs from elastic. However, in early stages the rash may blanch and resemble a viral exanthem. Less commonly the rash may be non-blanching and maculopapular.

Absence of rash does not exclude meningococcal infection



maculopapular rash



petechial rash



purpuric rash

In infants and children the following **may also occur**

- > Irritability, dislike of being handled, refusal of food
- > Tiredness, floppiness, drowsiness
- > Twitching or convulsions
- > Grunting or moaning
- > Photophobia
- > Leg pain, cold extremities, and abnormal skin colour are frequently seen in the first 12 hours of disease (before classic symptoms and signs develop) in children under 16 years.

IMMEDIATELY on clinical suspicion of meningococcal infection, and REGARDLESS OF PRIOR ANTIBIOTIC THERAPY:

1. Treatment

Commence empirical antibiotic therapy immediately (without waiting for test results):

Benzympenicillin:

2.4 g (children: 60 mg/kg up to 2.4 g) IV, every 4 hours (penicillin should only be withheld in cases who have a definite history of anaphylaxis).

PLUS either

Ceftriaxone

2 g (children: 50 mg/kg up to 2 g) IV, every 12 hours

or

Cefotaxime

2 g (children 50 mg/kg up to 2 g) IV, every 6 hours.

2. Laboratory Tests

Take blood cultures, (2 sets - 4 bottles) EDTA blood for PCR, and, if indicated, CSF for microscopy, culture and PCR.

3. Infection Control

Additional precautions (patient isolation; staff wearing surgical masks) – continue for 24 hours after the commencement of recommended antibiotics.

Surgical masks should be worn while intubating and during oropharyngeal suctioning.

The patient should wear a surgical mask during transport.

4. Notification (URGENT)

Notify immediately, by telephone, clinically suspected cases of meningococcal disease to the Communicable Disease Control Branch.

Phone (08) 8226 7177

24 hours/7 days