

## Illness Scenario 6 Refresher Course

*This is a Teaching Scenario. Some flexibility in how it progresses is possible according to individual learner needs*

### History {initial candidate briefing prior to arrival of child}

A 4 year old girl is brought in by ambulance from the GP clinic. The paramedics have communicated that the child is shocked, febrile and with a decreased conscious state. Estimated weight 20 kg.

### Initial impression {provide information as candidate assesses child and applies monitoring}

Child moaning and flushed on arrival. She is not speaking and lying very still.

### Additional History & Observations

History of lethargy, fever, cough for the past 24 hours.  
HR 154, RR 42, CRT 5 sec. Feels hot to touch (temp 39.7). SpO<sub>2</sub> 85% in air. BP 70/46. PEARL.

### Clinical Course {to be given to candidate as they progress}

As the assessment progresses the child stops moaning, and upper airway obstructive sounds develop with decreasing O<sub>2</sub> sat. Airway opening manoeuvres, oropharyngeal airway and BVM ventilation are required to clear airway and improve O<sub>2</sub> sat. Circulation improves with 2 fluid boluses and commencement of inotropes. For more advanced participants O<sub>2</sub> sat slow to improve until IPPV with PEEP instituted.

VBG; pH 7.15, PCO<sub>2</sub> 45 mmHg, PO<sub>2</sub> 50 mmHg, HCO<sub>3</sub> 12 mmol/L, Lactate 5.2 mmol/l.

## INSTRUCTORS INFORMATION

### Key Treatment Points

<b>Airway &amp; Breathing</b>	Airway opening and oropharyngeal airway. High flow O <sub>2</sub> via face mask commenced early Titrate O <sub>2</sub> therapy to SpO <sub>2</sub> 94-98% when stable BVM ventilation Arrange for intubation or intubate	
<b>Circulation</b>	IV access Fluid bolus 10 mls/kg, up to 20-40 mls/kg Commencement of inotropes Bloods for FBC, U&Es, BGL, VBG and cultures.	
<b>Specific Therapy</b>	IV Broad-spectrum antibiotics. Consult ICU	

**Diagnosis:** Pneumococcal pneumonia, septic shock

### **Learning objectives**

At the end of this session participants should be able to:

- Apply the structured approach to assessment, management and diagnosis of septic shock and pneumonia
- Recall and classify the potential causes of hypoxemia
- Recall and apply the principles of management of sepsis and pneumonia in their own practice

### **Potential Issues to be Discussed/Resources**

- [https://www.rch.org.au/clinicalguide/guideline\\_index/Community\\_acquired\\_pneumonia/](https://www.rch.org.au/clinicalguide/guideline_index/Community_acquired_pneumonia/)
- [CPG Sepsis Paediatric Improvement Collaborative](#)
- Management of sepsis
- Rapid sequence induction and respiratory/hemodynamic optimisation