Paediatric Sepsis Pathway Management Plan explained

This plan should be used for all paediatric patients treated with sepsis

Communication should be continuous over the course of the admission, as goals of care may change.

Minimum monitoring frequencies for patients with
- **deteriorating** or **persistent** signs of sepsis (purple)
- **resolving** signs of sepsis (orange).

Patients with sepsis can deteriorate rapidly. Regular monitoring and reassessment is crucial to identify changes early.

Remember to collect relevant micro samples ASAP, even though treatment has already begun.

Queensland Government

PAEDIATRIC Sepsis Pathway

(Affix identification label here)

URN:

Family name:

Given name(s):

Address:

Date of birth: Sex: ☐M ☐F ☐I

Sepsis Management Plan

DETERIORATING OR PERSISTENT SIGNS OF SEPSIS Level of care: Critical	RESOLVING SIGNS OF SEPSIS Level of care: Inpatient
COMMUNICATE	
Discussions with family to include: • Explanation of sepsis • Parent and carer information sheet (tear off *Information for Parents* page at back) • Family questions • Goals of care • Social work, welfare support and other allied health services • Indigenous Health Liaison Officers (IHLO) • Interpreter supports	**Discussions with family to include:** • Explanation of sepsis • Parent and carer information sheet (tear off *Information for Parents* page at back) • Family questions • Social work and welfare support • Indigenous Health Liaison Officers (IHLO) • Interpreter supports
MONITOR	
Continuous: • SpO_2 • Heart rate • Respiratory rate • Arterial blood pressure (if required) **15 minutes:** • AVPU • Non-invasive blood pressure • Capillary refill time **60 minutes:** • Strict fluid balance • Temperature (until resolved) • Urine output **4 hourly:** • Lactate • Blood sugar level • Venous blood gas • Temperature (once resolved)	**Continuous:** • SpO_2 • Heart rate • Respiratory rate **60 minutes:** • Blood pressure • Temperature (until resolved) • Strict fluid balance • Urine output **4 hourly:** • AVPU • Temperature (once resolved)
REASSESS	
Patients may move between streams according to clinical response. Patients who are deteriorating or have persistent signs of sepsis require more frequent monitoring. Obtain senior medical officer advice on changing sepsis management plan stream.	
Clinically reassess after interventions, monitored vital sign changes or every 60 minutes as a minimum: • Tachypnoea (CEWT respiratory score ≥2) • Tachycardia (CEWT heart rate score ≥2) • Hypotension (CEWT blood pressure score ≥2) • Altered AVPU • Poor skin perfusion; capillary refill ≥3 seconds or cold extremities • Urine output less than 1mL/kg/hr • Lactate ≥2mmol/L (4 hourly) If deteriorating or persistent signs of sepsis are still present: • Escalate via local policy • Notify Senior Medical Officer and call PICU, ICU or RSQ 1300 799 127	**Clinically reassess after interventions, monitored vital sign changes or every 60 minutes as a minimum:** • Tachypnoea (CEWT respiratory score ≤1) • Tachycardia (CEWT heart rate score ≤1) • Hypotension (CEWT blood pressure score ≤1) • Improving AVPU • Improved skin perfusion; capillary refill <3 seconds or warm extremities • Urine output greater than or equal to 1mL/kg/hr After 12 hours, if no intervention reassess every 4 hours After 24 hours, if no intervention follow local de-escalation policy
INVESTIGATE	
Collect relevant outstanding microbiology samples: ☐ Urine ☐ Blood cultures ☐ CSF (when stable) ☐ Other relevant sources (e.g. surgical specimens following source control) ☐ Stool ☐ Respiratory	**Collect relevant outstanding microbiology samples:** ☐ Urine ☐ Blood cultures ☐ CSF ☐ Other relevant sources (e.g. surgical specimens following source control) ☐ Stool ☐ Respiratory

CONTINUE to next page

Page 3 of 6

Parent and carer information sheet is an essential resource for families. It was co-designed with families in a language that is appropriate for them.

Documentation is key for optimising ongoing management and ensures the next member of the multidisciplinary team is informed.

Patients may move between streams based on clinical response.

E.g. monitored vital signs, Tachycardia CEWT of 2 indicates patient is deteriorating. **Immediately** escalate, reassess and follow the purple stream.

Queensland Government

PAEDIATRIC Sepsis Pathway

(Affix identification label here)

URN:

Family name:

Given name(s):

Address:

Date of birth: Sex: ☐M ☐F ☐I

Sepsis Management Plan *(continued)*

DETERIORATING OR PERSISTENT SIGNS OF SEPSIS Level of care: Critical	RESOLVING SIGNS OF SEPSIS Level of care: Inpatient
ANTIMICROBIAL OPTIMISATION	
• Reconsider source and need for source control • Review microbiology results in consultation with laboratory • Review appropriateness of antimicrobial cover and consider additional risk factors • Consider ID expert guidance as per local referral pathway. QCH oncall service available Ph: 07 3068 1111 • Ensure Therapeutic Drug Monitoring where appropriate	• Review microbiology results in consultation with laboratory • Review appropriateness of antimicrobials and consider de-escalation, targeting or cessation
DOCUMENT	
Antimicrobial Stewardship: ☐ Document confirmed or suspected source of infection in health record ☐ Document plan to continue, change or cease antimicrobials • Consider longer-term central IV access if required • Review antimicrobial allergy history if applicable and refer to ID or immunology for assessment **Other documentation:** ☐ Document sepsis in health record ☐ Document when patient is seen by Sepsis Care Coordinator ☐ Document variations to assist future optimisation of the pathway	**Antimicrobial Stewardship:** ☐ Document confirmed or suspected source of infection in health record ☐ Document plan to continue, change or cease antimicrobials • Review antimicrobial allergy history if applicable and refer to ID or immunology for assessment **Other documentation:** ☐ Document sepsis in health record ☐ Document when patient is seen by Sepsis Care Coordinator ☐ Document variations to assist future optimisation of the pathway
HANDOVER AND DISCHARGE	
Handover to ward: ☐ Document psychosocial support required in health record (e.g. social work, IHLO, interpreter) ☐ Document clinicians involved in handovers in the health record • Involve parents and carers in handover and provide information • Handover to also include provisional sepsis diagnosis, comorbidities, management plan for medicines and medical conditions	**Discharge planning:** • Give resources to family • Identify GP and document in health record • Discuss supports required with family and GP • Consider nurse navigator, hospital in the home or other referral • Give local patient experience survey to family
RESOURCES	
Clinical: • Queensland Paediatric Sepsis Program clinical resources for health professionals • Children's Resuscitation Emergency Drug Dosage Guide (CREDD). Consider using CREDD for weight adjusted dosing measurements • National Sepsis Clinical Care Standard, including discharge planning guide, GP letter template and other resources • Surviving Sepsis Campaign Guidelines January 2020 **Family:** • Queensland Paediatric Sepsis Program family resources • Find an Aboriginal Community Controlled Health Organisation (ACCHO) near you **Bereavement:** • Children's Health Queensland Bereavement Service	

Throughout management plan

● = for consideration

☐ = action is required

Ensure results are reviewed ASAP and communicated between departments e.g. PICU to ward.

When clinically appropriate ensure IV to oral step down occurs.

These discharge planning steps are key to patients recovery and outcomes after sepsis.

For detailed discharge planning guides, letters and patient experience surveys search 'National Sepsis Clinical Care Standard implementation resources'.