



# Guideline

## Rural and Remote Emergency Services Standardisation Guideline – Resuscitation Trolley

This guideline is applicable State-wide

### Custodian/Review Officer:

Executive Director

Rural and Remote Clinical Support Unit

Version no: 2.0

**Applicable To:** Rural and remote health care facilities throughout Queensland with Emergency Services that have been assessed as Level 1 or Level 2 services under the *Clinical Services Capability Framework Version 3.2* (2014).

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**Authority:** Director-General

**Approving Officer:** Michael Walsh

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**Key Words:** guideline, rural, remote, emergency, services, standardisation, resuscitation, trolleys

### 1. Purpose

This Guideline provides recommendations regarding best practice for standardisation of resuscitation trolleys in rural and remote health care facilities throughout Queensland with Emergency Services that have been assessed as Level 1 or Level 2 services under the *Clinical Services Capability Framework Version 3.2* (2014). With a mobile workforce, standardisation promotes consistency of evidence based practice and benefits patient outcomes and safety.

The resuscitation trolley content configuration follows the airway, breathing and circulation format with procedural kits for advanced and interventional treatments.

This guideline is aligned to the Australian Resuscitation Council, Basic Life Support (BLS) and Advanced Life Support (ALS) Principles.

Paediatric resuscitation requirements differ significantly from adults. The resources and guidelines from Lady Cilento Children's Hospital are recommended.

<http://qheps.health.qld.gov.au/childrenshealth/html/lcch/met/met-resources.htm>

### 2. Scope

This Guideline provides information for all Queensland Health employees (permanent, temporary and casual) and all organisations and individuals acting as its agents (including Visiting Medical Officers and other partners, contractors, consultants and volunteers) working in rural and remote health care facilities throughout Queensland with Emergency Services that have been assessed as Level 1 or Level 2 services under the *Clinical Services Capability Framework Version 3.2* (2014).

### 3. Related documents

#### Legislation and Frameworks

- *Health (Drugs and Poisons) Regulation 1996*



- *Clinical Services Capability Framework Version 3.2 (2014)*
- Australian Resuscitation Guidelines
  - Basic Life Support
  - Advanced Life Support

## 4. Procedures, Guidelines, Protocols

- Rural and Remote Emergency Services Standardisation Guideline – Emergency Equipment
- Rural and Remote Emergency Services Standardisation Guideline – Procedural Kits

## 5. Forms and templates

- Rural and Remote Resuscitation Trolley - basic layout and contents checklist available from: <http://www.health.qld.gov.au/rrcsu/html/rress.asp>
- Rural and Remote Emergency Services Procedural Kits - basic checklist available from: <http://www.health.qld.gov.au/rrcsu/html/rress.asp>

## 6. Guideline for Rural and Remote Emergency Services Standardised Resuscitation Trolleys

### 6.1 Resuscitation trolley choice and maintenance

6.1.1 The resuscitation trolley should be configured with 5 clearly labelled drawers with the drawers configured as follows

Drawer	Description
A	Airway
B	Breathing
C	Circulation
D	Drugs
E	Extras

6.1.2 The contents and layout of the resuscitation trolley should be established and maintained as per the Resuscitation Trolley in Rural and Remote Emergency Services – Basic contents (Appendix A).

6.1.3 The Airway and Breathing Support Procedural Kit is a vital part of the equipment required for resuscitation and **must** be located on/or within close proximity to the resuscitation trolley

(see *Rural and Remote Emergency Services Standardisation Guideline – Procedural Kits* Appendix A – Rural and Remote Emergency Services Procedural Kits – Basic contents).

- 6.1.4 The resuscitation trolley and the Airway and Breathing Support Procedural Kit should be easily accessible to staff in a designated emergency area.
- 6.1.5 Resuscitation trolley and the Airway and Breathing Support Procedural Kit should be restocked immediately after each use as per the Resuscitation Trolley in Rural and Remote Emergency Services – Basic contents (Appendix A) and the *Rural and Remote Emergency Services Standardisation Guideline – Procedural Kits*, Appendix A Rural and Remote Emergency Services Procedural Kits – Basic contents).
- 6.1.6 **NOTE:** Some minor local supplementation of the Resuscitation Trolley contents and layout list is acceptable, but no items should be removed.

## 6.2 Quality Assurance

### 6.2.1 Resuscitation Trolley Checking Requirements

- (a) The facility clinical manager should assign responsibility to a relevant registered nurse in each facility for checking, maintenance and stocking of all resuscitation equipment and drugs.
- (b) The relevant registered nurse assigned responsibility should check resuscitation trolley at least daily.
- (c) Checking of resuscitation trolleys any less frequently than a minimum of daily should be accompanied by documented risk management.
- (d) If equipment is not present or within date, then replace immediately
- (e) The signature of the person conducting the checking verifies items are present, charged (if applicable) functional and are within product expiry dates

### 6.2.2 Locking systems

- (a) All unlocked sections of trolleys with locking tags systems are to be checked daily
- (b) All locked sections of trolleys with locking tags systems are to undergo a full check weekly
- (c) Locking tag numbers must be recorded next to the signature of the person conducting the checking on the first page of the checklist only
- (d) Checking of unlocked sections of the resuscitation trolleys any less frequently than a minimum of daily should be accompanied by documented risk management

### 6.2.3 Resuscitation trolley audit requirements

- (a) The facility clinical manager should conduct a monthly audit of the checking of the trolley and report to relevant line manager
- (b) 100% compliance for checking daily and all items must be present and within expiry date
- (c) The *Rural and Remote Resuscitation Trolley Basic Contents and Layout – Checklist* is available from: <http://www.health.qld.gov.au/rrcsu/html/rress.asp>
- (d) The local unit clinical manager will be responsible for ensuring that the audits are completed and will manage their unit to 100% compliance
- (e) Random external spot audits will be conducted and reported to relevant committees within the organisation

6.2.4 Documentation of resuscitation trolley checks should be regularly audited by Clinical Governance Units to ensure both:

- (a) compliance with the need for a (minimum) daily checking schedule
- (b) the standardisation is being maintained.

6.2.5 Where emergency equipment is available for patient monitoring and support, facility managers/Directors of Nursing should satisfy the requirements for on-going maintenance of staff skills and competencies to ensure safe operation of the equipment.

### 6.3 Compliance with regulations

6.3.1 First and second line emergency drugs may be kept on the resuscitation trolley in the emergency room, however compliance with the *Health (Drugs and Poisons) Regulation 1996* requires that the emergency room shall be either secure from any public access or there shall be signage to indicate restricted public access to the area and staff implement and monitor this restriction.

## 7. Definition of Terms

Definitions of key terms are provided below

Term	Definition/Explanation/Details	Source
Resuscitation trolley	A trolley for the purpose of cardio-pulmonary resuscitation and management of other emergencies in the Health Centre	Department of Health and Families, Northern Territory Government. <i>Remote Health Atlas</i> : <a href="http://remotehealthatlas.nt.gov.au/resuscitation_trolley.pdf">http://remotehealthatlas.nt.gov.au/resuscitation_trolley.pdf</a>

## 8. References and Suggested Reading

- *Health (Drugs and Poisons) Regulation 1996* Chapter 3, Part 8, Section 211 *Storage of restricted drugs generally* available from:  
<http://www.legislation.qld.gov.au/LEGISLTN/CURRENT/H/HealDrAPoR96.pdf>

## 9. Consultation

- The initiative to standardise equipment in rural and remote emergency services has been developed to satisfy a recommendation following a patient safety incident.
- The initial Guideline was developed with specific advice from a Project Reference Group consisting of Clinical Nurses, Clinical Nurse Consultants, Nurse Educators, Nurse Practitioner, Directors of Nursing and Pharmacist, all of whom were currently practising in the rural and remote clinical context. Emergency Physicians with retrieval experience, the State-wide ED Clinical Network, Retrieval Services Queensland, Queensland Ambulance Service and the Royal Flying Doctor Service also provided advice.
- This review of the guideline sought expert advice from a Reference Group with broad experience in rural and remote environments, retrieval medicine and supporting rural networks consisting of representatives from the:
  - Australian College of Rural and Remote Medicine
  - Australasian College for Emergency Medicine
  - Telehealth Emergency Management Support Unit
  - Nurse Practitioner
  - Rural and Remote Directors of Nursing
  - Rural and Remote Nurse Educators
  - Clinical Nurse Consultant Clinical Service Improvement
  - Director Clinical Quality and Patient Safety Queensland Ambulance Service
  - Senior Clinicians Emergency Care Institute New South Wales
  - Directors of Pharmacy Services Advisory Committee Queensland Health
  - Royal Flying Doctor Service

## 10. Guideline Revision and Approval History

Version No.	Modified by	Amendments authorised by	Approved by
0.1 draft	Debbie Jolley	Review process	N/A
0.2 draft	Debbie Jolley	Further drafting	N/A
0.3 draft	Peter McCormack and Sean Booth	Executive Director, RRCSU	TBC
0.5 draft	Sean Booth	Reference Group	Reference Group
0.6 draft	Peter McCormack and Sean Booth	Reference Group	Reference Group
0.7 draft	Sean Booth	Reference Group	Reference Group
1.0 final draft for approval	Peter McCormack and Sean Booth	Reference Group	DG Michael Walsh



## Appendix A – Basic Contents for Resuscitation Trolley in Rural and Remote Emergency Services

RESUSCITATION TROLLEY BASIC CONTENTS
Description
<b>Monitor / Defib Tray</b>
Lifepak12/15 monitor/defib (therapy cable attached)
Battery support unit connected to Lifepak
NIBP cable attached
SpO2 cable attached
Quik-Combo Pads Adult x 1
Quik-Combo Pads Paed x 1
ECG/monitoring Dots x 8
Scissors (Trauma)
Torch (pencil)
<b>Other</b>
<b>N.B. The Airway and Breathing procedural kit is a vital part of the equipment required for resuscitation and must be located on, or close to the resuscitation trolley (refer to <i>Rural and Remote Emergency Services Standardisation Guideline – Procedural Kits</i>)</b>
Sharps bin
IV pole & mount
Sphygmomanometer (manual within 2 metres of trolley)
Stethoscope (hanging on pole)
Infant Bag Valve Mask (hanging on IV pole)
Paediatric Bag Valve Mask (hanging on IV pole)
Adult Bag Valve Mask (hanging on IV pole)
Goggles x 2
Calculator x 1
IV pressure bag - emergency infusion device (hanging on IV pole)

**DRAWER A - AIRWAY**

Laryngeal masks – Size 1 x 1

Laryngeal masks – Size 2 x 1

Laryngeal masks – Size 3 x 1

Laryngeal masks – Size 4 x 1

Laryngeal masks – Size 5 x 1

50ml luer tip syringe marked with tape (LMA volumes for size)

Nasopharyngeal airways - Size 6 with Safety Pin attached

Nasopharyngeal airways - Size 7 with Safety Pin attached

Nasopharyngeal airways - Size 8 with Safety Pin attached

Oropharyngeal – Size 0 x 1

Oropharyngeal – Size 00 x 1

Oropharyngeal – Size 000 x 1

Oropharyngeal – Size 1 x 1

Oropharyngeal – Size 2 x 1

Oropharyngeal – Size 3 x 1

Oropharyngeal – Size 4 x 1

Oropharyngeal – Size 5 x 1

Suction catheters – Size 6 x 2

Suction catheters – Size 8 x 2

Suction catheters – Size 10 x 2

Suction catheters – Size 12 x 2

Suction catheters – Size 14 x 2

Yankeur sucker x 2

**DRAWER B - BREATHING**

Paediatric Hudson O2 mask x 1

Paediatric non rebreather mask x 1

Paediatric nebuliser mask x 1



Adult Hudson mask x 1
Adult nebuliser mask x 1
Adult non rebreather mask x 1
Nasal Prongs Adult x 1
Nasal Prongs Paeds x 1
Nebulisers x 4
O2 tubing x 1
<b>DRAWER C - CIRCULATION</b>
Alcowipes x 10
Tourniquet x 2
Retractable IV cannulas 14g x 2
Retractable IV cannulas 16g x 2
Retractable IV cannulas 18g x 2
Retractable IV cannulas 20g x 2
Retractable IV cannulas 22g x 2
Retractable IV cannulas 24g x 2
Intraosseous Needles X 2 – Paediatric (manual)
Intraosseous Needles X 2 – Adult (manual)
Transparent adhesive IV dressing x 5
2.5cm Micropore x 1 roll
IV three-way tap with extension tubing x 2
IV Giving sets x 2 (Rapid Infusion)
IV Burette x 1
IV Infusion Pump Set x 1 (appropriate for infusion pump being used)
Injection sites x 5 (interlink Smartsite)
Non-safety needle – Size 18g x 5
Non-safety needle – Size 21g x 5
Non-safety needle – Size 23g x 5

Non-safety needle – Size 25g x 5
2ml Luer lock syringes x 5
5ml Luer lock syringes x 5
10ml Luer lock syringes x 5
30ml Luer lock syringes x 5
50ml Luer lock syringes x 2
Conforming bandage x 2
<b>DRAWER D – DRUGS</b>
<b>First Line Drugs</b>
Adrenaline 1:10,000 prefilled syringes x 5
Amiodarone ampoule 150mg/3ml x 2
Aspirin 300mg dispersable tablet x 1 sleeve
Atropine Sulphate 600mcg/ml x 2 amps
Glyceral Trinitrate (Anginine) 600mcg tablets x 1 bottle
<b>Second Line Drugs</b>
Adenosine 6mg/2ml ampoule x 4
Adrenaline 1:1000 ampoule x 10
Calcium Gluconate 10% 1gm/10mls vial OR Calcium Chloride 100mg/ml in 10ml vial x 4
Ceftriaxone 1g vial x 2
Diazepam 5 mg rectal solution x 2 (with Lubricating gel sachet x 1)
Droperidol 10mg/2ml vial x 1
Glucose 50% 50mls vial x 1
GTN 50mg/10ml ampoule x 1
Magnesium Sulfate 10mmol/5ml ampoule x 2
Mannitol 20% (500 ml) bag x 1
Midazolam 5mg/1mls ampoule x 3
Naloxone Hydrochloride 0.4mg ampoule x 2
Noradrenaline 2mg/2mls ampoule x 3

Phenytoin 250mg/5mls ampoule x 4
Sodium bicarbonate injection 8.4% 100ml vial x 1
Sterile water for injection 10mls ampoules
Intranasal Mucosal Atomisation Device (MAD) x 2
<b>DRAWER E – EXTRAS</b>
Lifepak12/15 lead ECG cable
Disposable Quick combo pads - size adult x 2
Disposable Quick combo pads - size paed x 2
ECG printer paper x 3 rolls (Lifepak 12/15 paper)
Therapy/pacing cable (if paddles attached to Lifepak)
ECG electrodes x 1 packet
Clippers and or razor x 2
Combine x 2
Sterile gauze x 2 packets
Spare torch batteries
Paediatric SPO2 Probe
Space blanket
<b>SIDE TROLLEY</b>
Yankaeur sucker and tubing x 1
Oxygen tank holder
Oxygen cylinder - size C with regulator
Portable Suction Unit with suction tubing connected
<b>SIDE OF TROLLEY – SWING POCKET</b>
<b>Top pocket</b>
NIBP cuffs - size infant arm
NIBP cuffs - size child
NIBP cuffs - size small adult
NIBP cuffs - size adult

NIBP cuffs - size large arm

NIBP cuffs - size adult thigh

**Second pocket**

0.9% Sodium Chloride 1000mls bag for infusion x 2

0.9% Sodium Chloride 100mls bag for infusion x 2

5% Dextrose 100mls bag for infusion x 2

**HOOK ON BACK OF TROLLEY**

Extension cord