Clinical Practice Guidelines:
Neurological/Autonomic dysreflexia

Policy code	CPG_NE_AUD_0722
Date	July, 2022
Purpose	To ensure consistent management of patients with autonomic dysreflexia.
Scope	Applies to Queensland Ambulance Service (QAS) clinical staff.
Health care setting	Pre-hospital assessment and treatment.
Population	Applies to all ages unless stated otherwise.
Source of funding	Internal – 100%
Author	Clinical Quality & Patient Safety Unit, QAS
Review date	July, 2025
Information security	UNCLASSIFIED – Queensland Government Information Security Classification Framework.
URL	https://ambulance.qld.gov.au/clinical.html

While the QAS has attempted to contact all copyright owners, this has not always been possible. The QAS would welcome notification from any copyright holder who has been omitted or incorrectly acknowledged.

All feedback and suggestions are welcome. Please forward to: Clinical.Guidelines@ambulance.qld.gov.au

Disclaimer

The Digital Clinical Practice Manual is expressly intended for use by appropriately qualified QAS clinicians when performing duties and delivering ambulance services for, and on behalf of, the QAS.

The QAS disclaims, to the maximum extent permitted by law, all responsibility and all liability (including without limitation, liability in negligence) for all expenses, losses, damages and costs incurred for any reason associated with the use of this manual, including the materials within or referred to throughout this document being in any way inaccurate, out of context, incomplete or unavailable.

Autonomic dysreflexia

July, 2022

Autonomic dysreflexia (AD) is a syndrome of massive imbalanced reflex sympathetic discharge [1] occurring in patients with an existing, non-acute spinal cord injury above the level of T6.[2]

This condition can be caused by a number of different noxious stimuli, including;[3]

- distended bladder due to blocked/kinked catheter
- urinary tract infection
- bowel irritation (e.g. constipation/faecal impaction)
- skin irritations (e.g. pressure sores, ingrown toenails, burns, sunburn)
- contracting uterus, fractures or any other event that would normally be deemed painful.

Patients and carers know about this condition and should be asked if they suspect a cause.[4]

Removal of the noxious stimuli is the preferred management, however as this can often be difficult within the pre-hospital environment, symptomatic management to prevent cerebrovascular catastrophe and other complications is more often the primary goal.

Complications from AD occur due to sustained, severe peripheral hypertension and include cerebral haemorrhage, myocardial infarction and seizures.

Clinical features

- Relative hypertension (BP for quadriplegics and high level paraplegics is typically low when lying and even lower when sitting (≥ 90–100/60 mmHg may be significant)[4]
- Flushing of skin above the level of injury or paleness below level of injury
- Bradycardia
- Profuse sweating and piloerection above the level of injury
- Pounding headache (worsening symptoms as BP rises)
- Blurred vision, headache, CVA/TIA symptoms
- Acute coronary syndrome (ACS)
- Anxiety and apprehension
- Irritability/combative behaviour in people with limited cognitive/communication ability [5]

Risk assessment

- A variety of symptoms can vary in intensity, from being asymptomatic or mild discomfort (e.g. headache) to a life threatening emergency[5]

CPG: Clinician safety
CPG: Standard cares

- **Sit patient upright with legs dependent where possible to help lower BP**
- **Loosen or remove any tight clothing**
- **Ensure indwelling catheter or suprapubic catheter is not kinked**
- **Remove noxious stimuli if possible**
- **Avoid any pressure to the patient's abdomen**

Consider:

- **GTN**
- **Morphine OR fentanyl**

Transport to hospital
Pre-notify as appropriate

Note: *Clinicians must only perform procedures for which they have received specific training and authorisation by the QAS.*