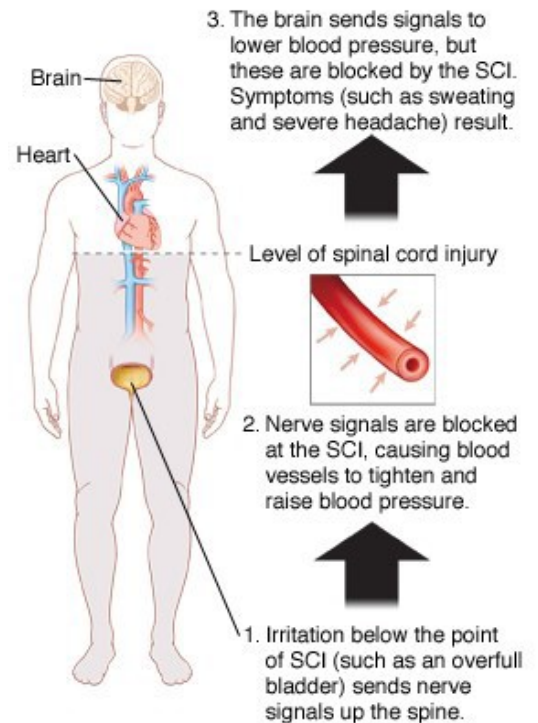


What is it?

Autonomic Dysreflexia (AD) is an over activity of the autonomic nervous system. You cannot control the autonomic nervous system; it works on its own to control bodily functions like heart rate, breathing, blood pressure and digestion. AD occurs when a stimulus below the level of the spinal cord injury causes irritation. As the message wants to travel up the cord to the brain, it is blocked by the injury. When this message cannot reach the brain, a reflex is activated that increases the sympathetic portion of the autonomic nervous system. This causes a narrowing of the blood vessels leading to an abrupt increase in blood pressure. The nerve receptors in the heart and blood vessels detect this rise and send a message to the brain. The brain then sends messages to the heart to slow down the heart rate. Since the brain can not send a message below the level of injury, the blood pressure can not be regulated. This can be life threatening to the person and cause many issues for those with injuries at T-5 or higher. If not treated immediately, and correctly, it may lead to seizures, stroke or death.



What are the symptoms?

- White patches, or goose bumps
- Sudden onset of headache
- Nasal stuffiness
- Elevated Blood pressure (greater than 200/100)
- Flush face
- Red blotches on the skin above the level of injury
- Nausea
- Slow pulse (<60 beats a minute)
- Cold clammy skin below the level of injury

What causes it?

- Irritation of the bladder(most common)
- Blocked catheter
- Constipation
- Clothing irritation
- Cramps
- Skin Infections
- Abdominal conditions
- Ingrown toe nails
- Wounds
- Pressure sores
- Burns from water that is too hot, or sun-burn
- Prolong pressure by an object in the shoe or chair
- Cuts, abrasions

What should I do?

- Act quickly
- Notify school nurse or designated health team member
- Put student in an upright position and relieve pressure immediately
- Loosen any tight or wrinkled clothing, shoes or braces
- Empty the bladder or bowel

AUTONOMIC DYSREFLEXIA

Autonomic dysreflexia, or hyperreflexia, is a life-threatening medical emergency that can occur in a person with a spinal cord injury. Delayed treatment can cause seizures, stroke, retinal hemorrhage, cardiac arrest, or death.

Signs and Symptoms of Autonomic Dysreflexia

- Increased blood pressure
- Severe pounding headache
- Flushing & sweating above the level of the SCI
- Bradycardia
- Pallor and gooseflesh below the level of the SCI
- Anxiety
- Bronchospasm or respiratory distress
- Cardiac irregularities

Request emergency card

SHNIC school nurses information:

Specific health issues for individual health care plans

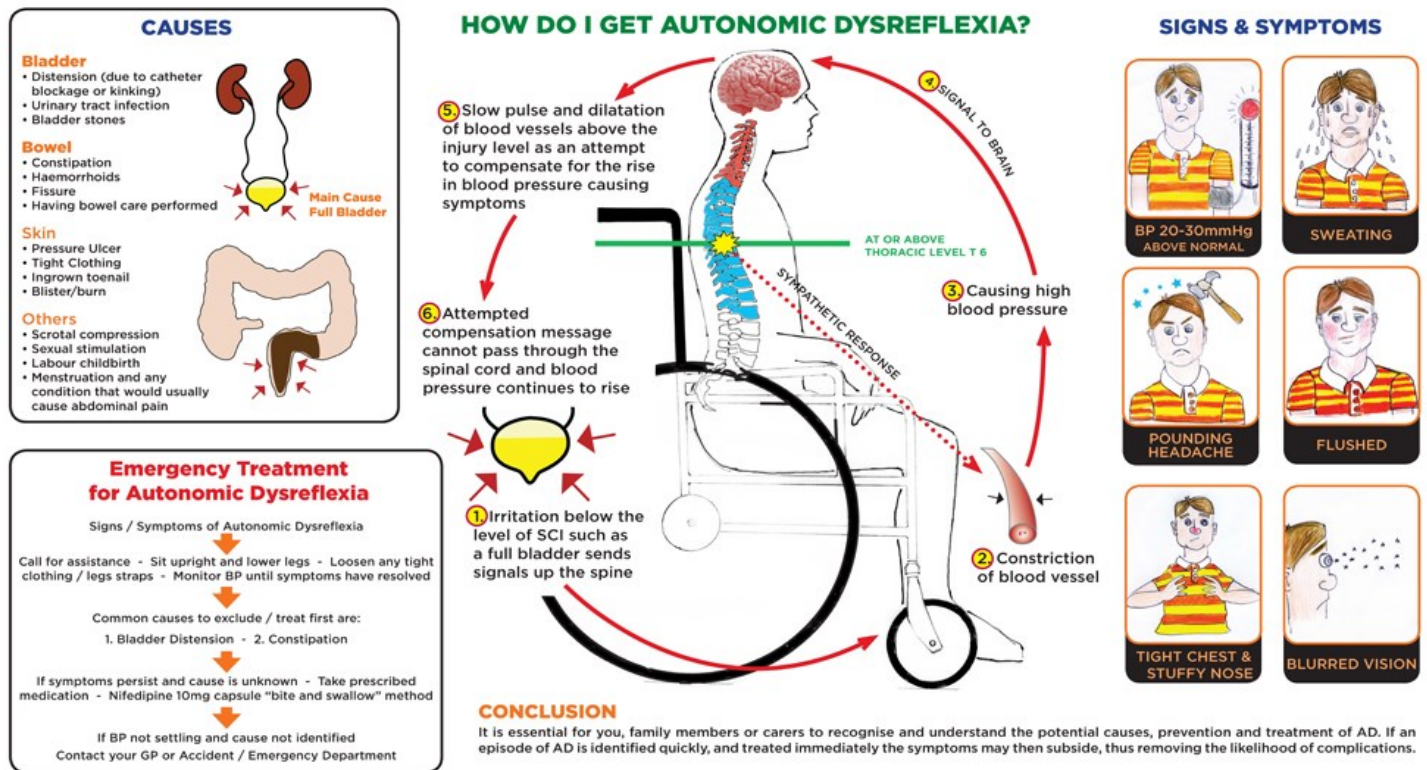
- Date and level of injury
- Current medication list, including PRN medications
- Signs and symptoms of AD that are specific to the child
- Baseline assessment including blood pressure parameters
- Document triggers (sunburn, long bus ride, delay in bladder emptying)
- Ways to identify/assess/remove stimulus
- Catheterization schedule
- Note recent surgeries
- Positioning restrictions
- Temperature regulation in school settings and transportation
- Education of staff
- Emergency care plan



THE MYSTERY OF AUTONOMIC DYSREFLEXIA?



Autonomic Dysreflexia (AD) is a medical emergency specific to individuals with Spinal Cord Injury (SCI) at the neurological level of T6 or above. It is usually caused when a painful irritation occurs below the level of your spinal cord injury. It can present with a variety of signs / symptoms which can vary from mild to severe discomfort. As a SCI individual you need to have a good understanding of AD and be familiar with signs and symptoms and immediate management of this potentially life threatening condition. It must be addressed immediately because if it is untreated it may progress to cause a seizure, stroke or death. (Ahrens Prestice 1998).



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Resources & Manuals

Paralysis Resource Center– AD

http://www.christopherreeve.org/site/c.mtKZKgMWKwG/b.4451921/k.5E8C/Paralysis_Resource_Center.htm

A guide for school personnel working with students with spinal cord injuries

https://www.kennedykrieger.org/sites/kki2.com/files/guide_for_school_personnel_working_with_students_with_spinal_cord_injuries_1.pdf