Conducted Electrical Weapon Injury (e.g. TASER®)

Aliases

Tased

Patient Care Goals

1. Manage the condition that triggered the application of the conducted electrical weapon; focus special attention on patients meeting criterion for excited delirium [see Agitated or Violent Patient/Behavioral Emergency guideline].
2. Make sure patient is appropriately secured or restrained with the assistance of law enforcement to protect the patient and staff [see Agitated or Violent Patient/Behavioral Emergency guideline].
3. Perform comprehensive trauma and medical assessment as patients who have received conducted electrical weapon may have already been involved in physical confrontation.
4. Assess distance of discharge: If discharged from a distance, locate and remove two single barbed darts (13mm length) from the patient.

Note: Do not remove barbed dart from sensitive areas (head, neck, hands, feet or genitals).

Patient Presentation

Inclusion Criteria

1. Patient received either the direct contact discharge or the distance two barbed dart discharge of the conducted electrical weapon
2. Patient may have sustained fall or physical confrontation trauma
3. Patient may be under the influence of toxic substances and or may have underlying medical or psychiatric disorder

Exclusion Criteria

No recommendations

Patient Management

Assessment

1. Secure or restrain patient with assistance of law enforcement.
2. Perform primary and secondary assessment including 3-lead ECG and pulse oximeter. Consider using 12-lead ECG
3. Evaluate patient for evidence of excited delirium manifested by varied combination of agitation, reduced pain sensitivity, elevated temperature, persistent struggling, or hallucinosis.

Treatment and Interventions

1. Make sure patient is appropriately secured with assistance of law enforcement to protect the patient and staff. Consider psychologic management medications if patient is struggling against physical devices and may harm themselves or others.
2. Remove barbed darts except for sensitive areas (head, neck, hands, feet, or genitals).
3. Treat medical and traumatic injury.

Patient Safety Considerations

- Before removal of the barbed dart, make sure the cartridge has been removed from the conducted electrical weapon.
- Patient should not be restrained in the prone, face down, or hog-tied position as respiratory compromise is a significant risk.
- The patient may have underlying pathology before being tased (refer to appropriate guidelines for managing the underlying medical or traumatic pathology).

- Perform a comprehensive assessment with special attention looking for signs and symptoms that may indicate agitated delirium.
- Transport the patient to the hospital if they have concerning signs or symptoms.
- EMS providers who respond for a conducted electrical weapon patient should not perform a "medical clearance" for law enforcement.

Notes and Educational Pearls Key Considerations

- Conducted electrical weapon can be discharged in three fashions:
    - By direct application of weapon without the use of the darts
    - By a single dart combined with direct application of weapon
    - By two darts fired from a distance up to 35 feet
- The device delivers 19 pulses per second with an average current per pulse of 2.1 milliamps which—in combination with toxins or drugs, patient's underlying diseases, excessive physical exertion, and trauma—may precipitate arrhythmias. Consider ECG monitoring and 12-lead ECG assessment.
- Drive Stun is a direct weapon two-point contact that is designed to generate pain and not incapacitate the subject. Only local muscle groups are stimulated with the Drive Stun technique.

Pertinent Assessment Findings

1. Thoroughly assess the tased patient for trauma as the patient may have fallen from standing or higher.
2. Ascertain if more than one TASER® cartridge was used (by one or more officers, in effort to identify total number of possible darts and contacts).

Quality Improvement

Associated NEMSIS Protocol(s) (eProtocol.01)

9914203—Injury-Conducted Electrical Weapon (e.g. Taser)

Key Documentation Elements

- If darts removed, document the removal location in the patient care report
- Physical exam trauma findings
- Cardiac rhythm and changes
- Neurologic status assessment findings

Performance Measures

- Comprehensive patient documentation as this is a complex patient
- Abnormal findings or vital signs were addressed
- Patient received ECG or 12-lead ECG evaluation
- If indicated, review for appropriate securing technique

References

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2. Ho JD, Dawes DM, Cole JC, et al. Corrigendum to "lactate and pH evaluation in exhausted humans with prolonged TASER X26 exposure or continued exertion." *Forensic Sci Int*. 2009;190(1-3):80-6.
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4. Ho JD, Dawes DM, Nelson RS, et al. Acidosis and catecholamine evaluation following simulated law enforcement "use of force" encounters. *Acad Emerg Med*. 2010;17(7):e60-8.

5. Ho JD, Dawes DM, Nystrom PC, et al. Markers of acidosis and stress in a sprint versus a conducted electrical weapon. *Forensic Sci Int.* 2013;233(1-3):84-9.
6. *White Paper Report on Excited Delirium Syndrome.* ACEP Excited Delirium Task Force, American College of Emergency Physicians; September 10, 2009.