

MASSACHUSETTS
OFFICE OF EMERGENCY MEDICAL SERVICES
DEPARTMENT OF PUBLIC HEALTH

EMERGENCY MEDICAL SERVICES
PRE-HOSPITAL
STATEWIDE TREATMENT
PROTOCOLS

OFFICIAL VERSION 2023.2

Complete Version

May 4, 2023



2.1 Adrenal Insufficiency/Adrenal Crisis Adult & Pediatric

EMT STANDING ORDERS – ADULT & PEDIATRIC

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- 1.0 Routine Patient Care
- Identify and treat the underlying condition.
- Consider paramedic intercept.

ADVANCED EMT STANDING ORDERS - ADULT & PEDIATRIC

A

- Obtain vascular access, if appropriate.

PARAMEDIC STANDING ORDER – ADULT & PEDIATRIC

P

Stress Dose:

- Adult: History of adrenal insufficiency; administer **hydrocortisone** 100mg IV/IO/IM or **methylprednisolone** 125mg IV/IO/IM.
- Pediatric: History of adrenal insufficiency; administer **hydrocortisone** 2mg/kg, to a maximum of 100mg IV/IM/IO or **methylprednisolone** 2mg/kg to a maximum dose of 125mg IV/IM/IO.



MEDICAL CONTROL MAY ORDER

- Additional doses of above medications
- In patients who continue demonstrating the following signs and symptoms, consult medical control for repeat stress dose orders:
 - Nausea, vomiting, weakness, dizzy, abdominal pain, muscle pain, dehydration, hypotension, tachycardia, fever, mental status changes.
- Additional Considerations:
 - Aggressive volume replacement therapy.
 - Treat other conditions according to specific protocols.
 - Normalize body temperature.



Adrenal insufficiency results when the body does not produce the essential life-sustaining hormones cortisol and aldosterone, which are vital to maintaining blood pressure, cardiac contractility, water, and salt balance.

Chronic adrenal insufficiency can be caused by a number of conditions:

- Congenital or acquired disorders of the adrenal gland.
- Congenital or acquired disorders of the pituitary gland.
- Regular use of steroids (COPD, asthma, rheumatoid arthritis, and transplant patients).

Acute adrenal insufficiency can result in refractory shock or death in patients on a maintenance dose of **hydrocortisone** (SoluCortef)/prednisone who experience illness or trauma and are not given a stress dose and, as necessary, supplemental doses of **hydrocortisone**.

A "stress dose" of **hydrocortisone** should be given to patients with known chronic adrenal insufficiency who have the following illnesses/injuries:

- Shock (any cause).
- Fever >100.4°F and ill-appearing.
- Multi-system trauma.
- Drowning.
- Environmental hyperthermia or hypothermia.
- Multiple long-bone fractures.
- Vomiting/diarrhea accompanied by dehydration.
- Respiratory distress.
- 2nd or 3rd degree burns >5% BSA
- Hypoglycemia