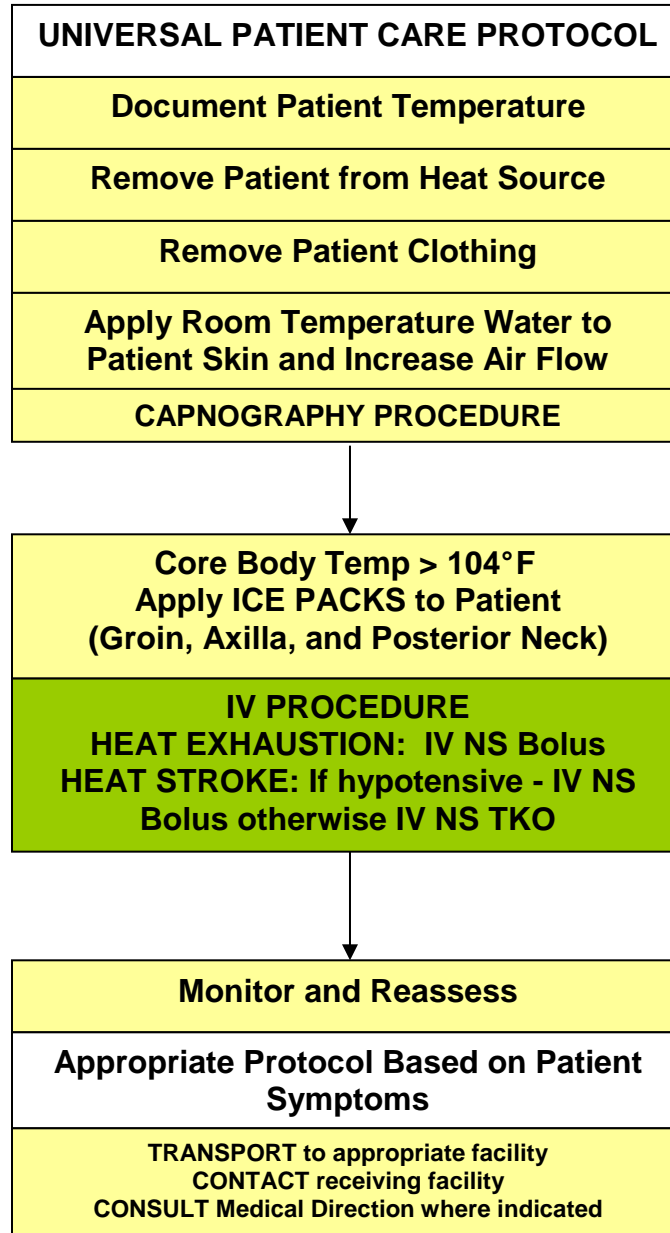




Section 5: Adult Medical Emergencies Protocol

ADULT MEDICAL EMERGENCIES: HYPERTHERMIA / HEAT EXPOSURE

E	EMT	E
A	AEMT	A
P	PARAMEDIC	P
M	MED CONTROL	M





Section 5: Adult Medical Emergencies Protocol

ADULT MEDICAL EMERGENCIES: HYPERTHERMIA / HEAT EXPOSURE-Cont.

PEARLS and KEY POINTS

HISTORY	SIGNS AND SYMPTOMS	DIFFERENTIAL DIAGNOSIS
<ul style="list-style-type: none"> • Age • Exposure to increased temperatures and humidity • Past medical history / medications • Extreme exertion • Time and length of exposure • Poor PO intake • Fatigue and / or muscle cramping 	<ul style="list-style-type: none"> • Altered mental status or unconsciousness • Hot, dry, or sweaty skin • Hypotension or shock • Seizures • Nausea 	<ul style="list-style-type: none"> • Fever (infection) • Dehydration • Medications • Hyperthyroidism (storm) • Delirium tremens (DT's) • Heat cramps • Heat exhaustion • Heat stroke • CNS lesions or tumors

Heat Exhaustion: Dehydration	Heat Stroke: Cerebral Edema
<ul style="list-style-type: none"> • Muscular / abdominal cramping • General weakness • Diaphoresis • Febrile • Confusion • Dry mouth / thirsty • Tachycardia • BP normal or orthostatic hypotension 	<ul style="list-style-type: none"> • Confusion • Bizarre behavior • Skin hot dry, febrile • Tachycardia • Hypotensive • Seizure • Coma

<ul style="list-style-type: none"> • Exam: Mental Status, Skin, HEENT, Heart, Lungs, Neuro • Extremes of age are more prone to heat emergencies (i.e. young and old). • Predisposed by use of: tricyclic antidepressants, phenothiazines, anticholinergic medications, and alcohol. • Cocaine, amphetamines, and salicylates may elevate body temperatures. • Sweating generally disappears as body temperature rises above 104°F (40°C). • Intense shivering may occur as patient is cooled. • Heat Cramps consists of benign muscle cramping 2° to dehydration and is not associated with an elevated temperature. • Heat Exhaustion consists of dehydration, salt depletion, dizziness, fever, mental status changes, headache, cramping, nausea and vomiting. Vital signs usually consist of tachycardia, hypotension, and an elevated temperature. • Heat Stroke consists of dehydration, tachycardia, hypotension, temperature >104°F (40°C), and an altered mental status. • Patients at risk for heat emergencies include neonates, infants, geriatric patients, and patients with mental illness. Other contributory factors may include heart medications, diuretics, cold medications and / or psychiatric medications. • Heat exposure can occur either due to increased environmental temperatures or prolonged exercise or a combination of both. Environments with temperature > 90°F and humidity > 60% present the most risk. • Heat stroke occurs when the cooling mechanism of the body (sweating) ceases due to temperature overload and / or electrolyte imbalances. Be alert for cardiac dysrhythmias for the patient with heat stroke. • In patients with significant hyperthermia (temp > 104° F) begin actively cooling with natural or chemical ice packs applied to the patients' groin, armpits (axilla), and back of neck.
