



An employee publication of the
Texas Department of Criminal Justice

May/June 2012
Volume 19 Issue 5

Agency News



Heat precautions and workplace safety at TDCJ

Texas is known for hot weather during the summer months, and this makes heat stress in the workplace a serious safety concern. Hot weather increases the likelihood of injuries due to sweaty palms, dizziness and fogged safety glasses, while overheating can cause weakness, confusion, nausea, and if left untreated, more serious medical emergencies.

Prevention is the best way to deal with heat-related illnesses. By gradually adapting to work in hot and humid conditions and staying hydrated with fluids, most serious heat-related issues can be avoided. Our bodies can usually maintain a healthy temperature through blood circulation and perspiration, but both of these cooling mechanisms can be overwhelmed by very high temperatures and humidity. It's important to recognize the following types and signs of heat stress in yourself, your coworkers and the offender population so you will know when to take action. Remember: severe heat stress is a medical emergency and must be treated by properly-trained medical personnel.

- **HEAT RASH** is a skin irritation caused by excessive sweating during hot, humid weather. It looks like tiny bumps surrounded by areas of redness and commonly occurs on the neck and upper chest, in the groin, under the breasts and in elbow creases. **TREATMENT:** Keep the affected area as cool and dry as possible.
- **HEAT CRAMPS** usually develop after hours of strenuous work or exercise in hot and humid conditions, and can happen even at moderate temperatures in high humidity. Cramps are brief and abrupt, intermittent, and can be severe. **TREATMENT:** Rest in a cool area and replace fluids

and electrolytes (sodium and potassium) with cool, caffeine free liquids. Don't give liquids to a person who is unconscious or not alert. If the patient does not improve within 30 minutes, seek medical attention.

- **HEAT EXHAUSTION**, or heat prostration, is caused by an electrolyte (sodium and potassium) imbalance. Symptoms include weakness, anxiety, dizziness, headache, nausea and sometimes vomiting. Signs include heavy perspiration, rapid pulse and lack of coordination. The patient's skin may appear gray and be cool and clammy to the touch. **TREATMENT:** Seek medical help immediately. Rest the victim in a cool area, replace fluids and electrolytes, and remove the victim's shirt and shoes.
- **HEAT STROKE** means the body can no longer cool itself. It may be preceded by signs of heat exhaustion, but the onset of heat stroke is often sudden. Physical collapse of the victim may be the first indication of a problem. Signs include hot and dry skin, rapid pulse, headache and weakness, lack of coordination, nausea and vomiting, followed by unconsciousness, shock and death. **TREATMENT:** This is a medical emergency, seek medical help immediately. Move the victim to a cool, air-conditioned place, remove their clothing and cool them using a water spray and fans.

Exposure to heat and humidity are often unavoidable for agency staff and offenders. It is important to diminish the impact of the Texas summer by drinking plenty of fluids, remaining alert to the warning signs of heat stress in yourself or others, and seeking immediate medical assistance if symptoms of heat related illness appear. ●