

Preventing heat-related illness

What is heat-related illness?

Heat-related illness occurs when the body is unable to adequately cool itself. The body normally cools itself by sweating, but sometimes sweating isn't enough and the body temperature keeps rising.

Heat-related illness can range from mild conditions such as a rash or cramps to very serious conditions such as heat stroke, which can kill. Heat may worsen the condition of someone who already has a medical condition such as heart disease. Prevention is the best way to manage heat-related illness.

Who is at risk of heat-related illness?

Anyone can suffer from heat-related illness, but those most at risk are:

- Older people (>65 years), particularly those living alone without air conditioning
- infants
- the overweight or obese
- pregnant and nursing mothers
- people with a chronic illness, such as heart disease or high blood pressure or diabetes, cancer or kidney disease
- people with health conditions that impair sweating such as scleroderma, cystic fibrosis and extensive scarring from burns
- people with limited or poor mobility
- people taking medications that may interfere with the body's ability to regulate temperature.

Because elderly people have a reduced ability to adapt to summer heat, they are more prone to heat stress. They are more likely to have a chronic medical condition and to be taking medication that may interfere with the body's ability to regulate temperature.

Heat-related illness

Heat cramps

Heat cramps are muscle pains or spasms, usually in the abdomen, arms or legs. They may occur after strenuous activity in a hot environment, when the body gets depleted of salt and water. They may be a symptom of heat exhaustion.

Heat exhaustion

Heat exhaustion is a serious condition that can develop into heat stroke.

Warning signs may include:

- pale complexion and sweating
- rapid heart rate
- muscle cramps, weakness
- dizziness, headache
- nausea, vomiting
- fainting

Heat stroke

Heat stroke is a *life-threatening emergency*. It occurs when the body is unable to prevent the temperature rising rapidly. The symptoms may appear the same as for heat exhaustion, but the skin may be dry with no sweating, and the person's mental condition worsens. They may stagger, appear confused, have a seizure, appear to have a stroke or collapse and become unconscious.

What you can do to prevent heat related illness in yourself and others

Before the hot weather:

- See your doctor and make sure your medical condition is as well controlled as possible.
- Undertake regular moderate exercise in warmer weather prior to severe hot weather to enable the body to adapt and cope better with hot weather.

Once the weather is hot:

- Drink plenty of water and non-alcoholic fluids. (Note: If your doctor normally limits your fluids or you are on fluid tablets, you may need to check how much to drink while the weather is hot).
- Avoid alcohol because of its dehydrating effects.
- Stay indoors, if possible with air-conditioning, or in the shade.
- Take a cool shower or bath.
- Wear lightweight, loose-fitting clothing.
- Reduce physical activity.
- Check on older, sick and frail people who may need help coping with the heat.
- Never leave anyone in a closed parked car.
- Don't rely on fans to cool people unless they are well hydrated and there is adequate ventilation.
- Know the signs and symptoms of excessive heat exposure and know how to respond.

If you must be out in the heat

- Limit outdoor activity to morning or evening hours.
- Protect yourself from the sun and *Slip, Slop, Slap* when outside by using sunscreen, wearing a hat and covering exposed skin.
- Rest regularly in the shade and drink fluids frequently.

What to do for heat cramps

- Stop activity and sit quietly in a cool place.
- Increase fluid intake.
- Rest a few hours before returning to activity.
- Seek medical help if cramps persist.

What to do for heat exhaustion

- Get the person to a cool area and lie them down.
- Remove outer clothing.
- Wet skin with cool water or wet cloths.
- Seek medical advice.

What to do for heat stroke

- Call an ambulance.
- Get the person to a cool area and lie them down.
- Remove clothing and wet skin with water, fanning continuously.
- Position an unconscious person on their side and clear the airway.

Further information

If you are concerned that someone may be suffering heat-related illness encourage them to see their doctor. For further advice or health information contact NURSE-ON-CALL on 1300 60 60 24. Other useful information may be found at: <http://www.bt.cdc.gov/disasters/extremeheat> and <http://www.betterhealth.vic.gov.au>

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