EXCESSIVE HEAT

Introduce excessive heat by defining a heat wave.

DISPLAY VISUAL

A Heat Wave Is . . .

A prolonged period of excessive heat, often combined with excessive humidity.

Explain that a heat wave is a prolonged period of excessive heat, often combined with excessive humidity. Extreme heat is defined as temperatures that hover 10 degrees or more above the average high temperature for the region and last for prolonged periods of time.

Tell the group that under normal conditions, the body's internal thermostat produces perspiration that evaporates and cools the body. In abnormal heat and high humidity, however, evaporation is slowed and the body must work extra hard to maintain its normal temperature. The elderly, the very young, and those who are disabled are at risk from extreme heat. Also, because men sweat more than women, they are more likely to have difficulty with extreme heat as a result of dehydration.

Continue by explaining that studies indicate that excessive heat that continues for periods longer than 2 days causes a significant rise in heat-related illnesses. Spending several hours each day in air conditioning, however, can reduce the risk of heat-related illness.

Explain that people living in urban areas may be at greater risk from the effects of a prolonged heat wave than people living in rural regions. Stagnant atmospheric conditions can trap pollutants in urban areas, and asphalt and concrete stay warm longer. This phenomenon is known as the "urban heat island effect."

EXCESSIVE HEAT (CONTINUED)

DISPLAY VISUAL

Risks Associated With a Heat Wave

- Heat cramps
- Heat exhaustion
- Heat/Sun stroke

Explain that the risks associated with a heat wave can include:

- Heat cramps: Muscular pains and spasms resulting from heavy exertion. Heat cramps are often the first signal that the body is suffering from excessive heat.
- Heat exhaustion: A form of mild shock that typically occurs when people exercise heavily or work in a hot, humid place where body fluids are lost through heavy sweating.
- Heat/Sun stroke: A life-threatening condition in which the victim's temperature control system that produces sweating to cool the body stops working. The body temperature can rise to the extent that brain damage and death may result if the body is not cooled quickly.

EXCESSIVE HEAT (CONTINUED)

ASK QUESTION

What can you do during a heat wave?

Allow the group time to respond. Summarize the discussion using the points from the visual.

DISPLAY VISUAL

Actions to Take During a Heat Wave

- Seek air conditioning.
- Avoid strenuous activities during the heat of the day.
- Wear lightweight, light-colored clothing.
- Check on family members and neighbors.
- Drink plenty of fluids.

- Seek air conditioning. If the home does not have air conditioning, persons should seek areas that do. Schools, libraries, shopping malls, community centers, and many other public places offer good refuges during extreme heat.
- Avoid strenuous activities during the hottest period of the day. Heat-related illnesses can strike quickly, especially for those who perform strenuous work during the heat of the day.
- Wear lightweight, light-colored clothing. Light colors reflect the sun's rays better than dark colors, which absorb the heat. Protect the face and head by wearing a wide-brimmed hat.
- Check on family members and neighbors who do not have air conditioning or who have medical problems that make them particularly susceptible to heat-related illnesses.

EXCESSIVE HEAT (CONTINUED)

- Drink plenty of fluids. Dehydration can occur quickly and can be unnoticed or mistaken for other illnesses. Increasing fluid intake, even if not thirsty, can reduce the risk of dehydration.

  Caution the group, however, that persons who are on fluid-restrictive diets (e.g., those with kidney disease) should consult their doctors before increasing fluid intake.

ASK QUESTION

What can you do to make your home cooler, even if you don't have air conditioning?

Allow the group time to respond. Be sure to mention the points covered in the visual below.

EXCESSIVE HEAT (CONTINUED)

DISPLAY VISUAL

Preparing the Home

- Install additional insulation.
- Protect windows.
- Use attic fans.

Suggest the measures below to protect against excessive heat in the home:

- Install additional insulation. Insulation helps to keep heat out in the summer as well as to keep heat in during the winter months.
- Protect windows and glass doors. Consider keeping storm windows installed throughout the year.
- Use attic fans. Because heat rises, attic fans can help clear the hottest air from the home.

PM, P. 1-A-25

Refer the group to *Excessive Heat Myths and Facts* in the Participant Manual. Suggest that the participants review these myths and facts after the session.

Ask the participants if anyone has additional questions, comments, or concerns about excessive heat.

	PM, P. 1-A-25	Excessive Heat Myths and Facts

Myth:	Stay in the home during a heat wave.
Fact:	Air conditioning in homes and other buildings markedly reduces danger from the heat. If you must stay in a home where air conditioning is not available, stay on the lowest floor, out of the sunshine. If possible, however, choose other places to get relief from the heat during the warmest part of the day.
Myth:	Beer and alcoholic beverages are best to satisfy thirst in extreme heat.
Fact:	Although beer and alcohol appear to satisfy thirst, they actually cause additional dehydration. Unless you are on a fluid-restricted diet, drink water during a heat wave, even if you don't feel thirsty.
Myth:	During extreme heat, the best time to exercise is during the late morning and early afternoon.
Fact:	Many heat emergencies occur in those who exercise or work during the hottest part of the day. Reduce, eliminate, or reschedule strenuous activities. If you must do strenuous activity, do it during the coolest part of the day, which is usually in the morning between 4 a.m. and 7 a.m.
Myth:	A sunstroke is not life-threatening.
Fact:	A heat stroke or sunstroke is life-threatening. The victim's temperature control system, which produces sweating to cool the body, stops working. The body temperature can rise so high that brain damage and death may result if the body is not cooled quickly.
Myth:	You can only get a sunburn on really hot days.
Fact:	Sunburn (and tanning) result from exposure to ultraviolet (UV) radiation, which is distinct from the light and heat emitted by the sun. You cannot see or feel UV rays, but they can be quite damaging. UV exposure has been linked to skin cancer and other skin disorders, cataracts and other eye damage, and immune system suppression. UV exposure is a year-round issue, and clouds provide only partial protection.