



# Hydration



Topic: Heat Stress – Hydration

Staying hydrated is essential for preventing heat stress when working in hot environments. As our bodies heat up, we begin to sweat, losing valuable fluids and electrolytes that are crucial for regulating body temperature. Dehydration can quickly set in, increasing the risk of heat stress and other heat-related illnesses.

## Urine Color Test

### Start Hydrating Early:

- Being hydrated when you start work makes it easier to stay hydrated through the day.
- Drink plenty of fluids, especially water.

### Hydrate During Work:

- Drink water frequently throughout the day and don't wait until you are thirsty to drink.
  - By the time you feel thirsty, you are behind in fluid replacement
- When working in the heat, drink 1 cup ( 8 ounces) of water every 15-20 minutes.
  - This translates to 3/4 to 1 quart (24-32 ounces) per hour.
  - Drinking at shorter intervals is more effective than drinking large amounts infrequently.
  - It is not recommended to drink more than 1 ½ quarts (48 ounces) per hour. Drinking too much water or other fluids (sports drinks, energy drinks, etc.) can reduce the concentration of salt in the blood and cause a medical emergency.

### Hydrate After Work:

- Most people need several hours to drink enough fluids to replace what they have lost through sweat. The sooner you get started, the less strain you place on your body from dehydration.
- Hydrating after work is even more important if you work in the heat on a regular basis. Chronic dehydration increases the risk for a number of medical conditions, such as kidney stones.

### What to Drink?

#### Water

Water will almost always maintain hydration during work in the heat, as long as you eat regular meals to replace salt lost in sweat.

#### What about salt tablets?

In most cases, salt can be replaced by eating normal meals and snacks throughout the day. Do not skip meals.

#### What about caffeine?

The amount of caffeine in tea, coffee and soft drinks probably will not have an effect on overall hydration.

#### Do I need sports drinks?

In general, eating regular meals with adequate water intake is sufficient to maintain water and electrolyte balance.

For prolonged sweating lasting several hours, sports drinks with balanced electrolytes are another option to replace salt lost in sweat.

### What NOT to drink?

#### Energy Drinks

Some energy drinks contain much more caffeine than standard servings of coffee, tea or soft drinks.

Drinking several energy drinks per day can raise your caffeine levels enough to affect your heart. High caffeine levels can be risk when added to the strain placed on your body by heat.

Many energy drinks contain as much or more sugar as soft drinks, which adds hundreds of extra calories to your diet

#### Alcohol

Alcohol can cause dehydration.

Drinking alcohol within 24 hours of working in heat can increase the risk of heat illness.

WELL HYDRATED

HYDRATED

DEHYDRATED  
Drink water!

SEVERELY DEHYDRATED  
Drink water immediately!