



©Alex Nabaum

**Bicycling**

[Original article](#)

## Stay Charged

Electrolytes keep you cool and running smoothly when the temperature rises.

By Selene Yeager

If carbohydrate is your body's fuel, electrolytes are the spark plugs, motor oil and engine coolant. These minerals, such as sodium and potassium, form electrically charged particles in the body that work together to regulate nerve transmission, muscle contraction and fluid balance. When their levels run low, your internal dash lights up with warning signals in the form of fatigue, cramping, nausea and a cadence that slows to a crawl.

"Whenever you sweat, you lose electrolytes," says Cindy Dallow, Ph.D., R.D., of Partners in Nutrition, in Loveland, Colorado. When it's hot, you easily sweat out two pounds an hour, so it's important to replenish more than just fluid. Here's how to stock up to stay strong.

**SODIUM** Salt is two electrolytes, sodium and chlorine, bound together. Sodium is the most talked about because of the volume lost during exercise--450mg, or 20 percent of the recommended daily value, per pound of sweat--but both minerals are needed to maintain fluid balance inside the cells.

**Replenish Rx:** Most sports drinks have 120 to 200mg per bottle, enough for most cyclists, says Dallow. If you end rides with salt crust on your jersey or will be out all day, take a drink such as Gatorade Endurance or PowerBar Endurance with

twice the sodium of a typical drink. "If you're on an easy ride with food available, there's no need to take a sodium-heavy drink," Dallow says.

**POTASSIUM** Potassium helps maintain the body's water balance and regulates sodium levels. Deficiency is very uncommon, but can leave you with a racing heart rate and muscle weakness.

**Replenish Rx:** Most sports drinks provide plenty, and too much can harm your heart, so doctors caution against supplementing beyond that.

**CALCIUM** It builds bone, but calcium also aids muscle contraction and helps convert stored fuel into energy. You should get at least 1,000mg a day, especially if you put in big miles: When your body doesn't have enough, it steals the mineral from your skeleton. During long, intense efforts, you blow through 150 to 300mg per hour.

**Replenish Rx:** Replacing calcium on the bike is less vital than getting it in your daily diet. Just one cup of yogurt will get you nearly a third of the way to the recommended daily value.

**MAGNESIUM** Working with calcium to enable smooth muscle contraction, magnesium also lends a hand to energy production. You lose only 10mg per pound of sweat, more during exercise.

**Replenish Rx:** Magnesium is easy to get in your daily diet. Nuts, leafy greens and whole grains are great sources.

## Drink Up

Electrolyte beverages replenish key minerals lost during exercise, as sports drinks do, but they supply few if any calories. If you're skipping the sports drink but still want a drink with electrolyte-boosting benefits, these may hit the spot.

**Elete Electro-boost:** Sodium, 125mg; potassium, 130mg; magnesium, 45mg  
Made from seawater concentrates, these drops provide no calcium. Add to water as recommended. \$35/16 oz., 192-serving bottle; [eletewater.com](http://eletewater.com)

**Hammer Nutrition Endurolytes Powder Electro-boost:** Sodium, 40mg; potassium, 25mg; calcium, 50mg; magnesium, 25mg Add a scoop (or more) to your bottle as needed. Available as capsules, too. \$19/150 servings; [hammernutrition.com](http://hammernutrition.com)

**Lyte'N Go Electro-boost:** Sodium, 5mg; potassium, 70mg; calcium, 100mg; magnesium, 8mg It's low in sodium (the company says Americans get plenty in their diet). Chew one tablet after every 20 minutes. \$30/30 tablets; [lytengo.com](http://lytengo.com)

**Nuun Electro-boost:** Sodium, 360mg; potassium, 100mg; calcium, 12.5mg; magnesium, 25mg Drop a tablet into your bottle and go. In four flavors; the Kona cola one has caffeine. \$20/36 tablets; [nuun.com](http://nuun.com)