



# Cramp on

Exertion not sweat loss is the commonest cause of cramp for UK cyclists. Sports scientist **Joe Beer** looks at how to deal with it

**C** ramp is the unconscious contracting of one or many muscles. It's something that most cyclists have suffered at some time. It's seen as being a bigger issue in summer but many riders first get cramp in spring.

That's because lots of us suddenly gear up our riding in spring after a period of low mileage riding over the winter. Maybe you're working too hard to keep up with clubmates or perhaps you're simply riding further? The result is the same: cramp, caused not by sweating and salt loss – which you'd associate with summer – but by you over-reaching.

Cramp often occurs at the end of a race or in similar high-effort conditions, such as when you're trying to sprint, climb a steep hill, or ride with a very fast cadence. Too much is demanded of the muscle-nervous system combination and it locks itself up in the muscular equivalent of a computer crash.

Cramp can also occur off the bike at almost any time of day – in the middle of the night when you're lying in bed, for example, or when you're carrying out an inconsequential daily task that you've performed a million times before. It invariably happens some hours after a tiring ride, with over-used muscles suddenly contracting long after you've stopped riding.

If it occurs in relatively unstrained muscles and after an extremely hot ride (e.g. L'Etape du Tour) it could be severe dehydration or electrolyte losses. This 'exertional heat cramp' is rarer, particularly in Britain, but can happen when riding abroad. It usually occurs in those with very salty sweat who fail to replace sufficient

electrolytes or who just go beyond their body's hot exercise time limit.

## Preventing cramp

Working to prevent the cramp depends on how you got it. So:

### 1. Over-reaching

**Symptoms:** Cramp on or off the bike due to riding longer or harder (particularly between March and May).

**Prevention:** Wait for the body to adapt to the endurance and power demands that the muscle fibres have been unaccustomed to.

**Time:** Cramps usually stop occurring over the course of one to three weeks.

### 2. Salt loss

**Symptoms:** Cramp on the bike after riding for a long time in hot conditions, so that you've sweated heavily. For example, a sportive ride in Europe in the summer.

**Prevention:** Ensure normal sodium (salt) intake in the lead up to rides and hydrate throughout the ride with electrolyte drinks – not water only.

**Time:** Usually once the sodium imbalance is made it can take hours or days to re-establish a correct balance (depending on methods e.g. IV verses normal diet)

### 3. Spontaneously, hours after riding

**Symptoms:** Cramp occurs several hours after riding, often at nighttime.

**Prevention:** The body is probably adapting to a change in your riding regime. Try regular use of tonic water.

**Time:** Usually in a matter of days the camps begin to reduce in frequency

## + Cramp checklist

**1.** Cramp often shows a new level of disturbance has occurred in the cycling muscles. See this as a chance for your muscles to adapt.

**2.** Given time, most cramp episodes will disappear. If not it's time to explore dietary causes, bike position and/or sweat loss issues.

**3.** If you never have cramps, continue what you are doing in your riding and diet. If you undertake a new challenge, be ready for possible cramp episodes.

**4.** Whilst eating lots of bananas will not stop cramps, drinking only water during exercise could increase the chances of it.

**5.** Many suffering nighttime leg cramps and hot weather cramping swear by tonic water. Quinine (in the tonic water) is a relaxant that calms cramps in 3-5 days. It is better used as a longer term policy for those who frequently suffer cramp. Im Bru also contains some quinine.