

## NEWS BRIEFS CURRENT STUDIES & FACTS



### Morbid Obesity Worsens PCNL Outcomes

Percutaneous nephrolithotomy (PCNL) is a surgery to remove large kidney stones through a one-inch incision in the back. A urologic surgeon sends a camera and instruments through this small incision directly into the kidney to break up and remove the stones.

PCNL is relatively safe in patients with a high body mass index (BMI), but morbidly obese patients (those with a BMI of 40 or more) often have a longer operative time, more minor and major complications, and a higher retreatment rate than thinner individuals, according to a study published in the *Journal of Urology*.

The Global PCNL Study involved data collected from 2007 to 2009 from 3,709 patients treated at 96 centers around the world. Among the findings, the average lengths of the procedure were 112.2 minutes for patients with a BMI of 40 and above, compared to 86 minutes for those with a BMI of 18.5 to 25 (normal weight). Furthermore, the rates of 30-day complications were 22.1% and 6.5%, respectively, and the retreatment rates were 28.1% and 12.4%, respectively.

### More Americans Are Getting Stones

The number of Americans suffering from kidney stones has almost doubled since 1994, and the obesity epidemic is one of the most likely reasons why.

About one in 11 Americans now develops kidney stones, according to researchers from the University of California, Los Angeles, and RAND Corp. In contrast, only one in 20 Americans developed kidney stones in 1994.

The substantial increase in kidney stone cases is most likely due to increases in Americans' weight, as well as in related increases in diabetes and gout, which are also risk factors for stones.

For the study, the research team used data from the US National Health and Nutrition Examination Survey to identify the rate of kidney stones. The finding was presented at the American Urological Association meeting in Atlanta and published in *European Urology*.



### This Apple Won't Keep the Doctor Away

The BBC reports research that suggest carrying excess weight around the abdomen is linked to an increased risk of kidney disease.

In a study of 300 people, researchers at the University Medical Center Groningen, Netherlands, found that those who had an "apple-shaped" body showed signs of kidney problems, whether or not they were classed as overweight or having normal weight.

Specifically, researchers noted that having a higher waist-to-hip ratio was associated with lower kidney function, reduced kidney blood flow, and higher blood pressure in the kidneys.



### Iced Tea Not Cool for Kidney Stones

One of the staples of the summer season—a tall glass of refreshing ice tea, with or without the mint leaves—should be off-limits to people who are prone to kidney stones, according to Dr. John Milner, assistant professor in the Loyola University Chicago Stritch School of Medicine Department of Urology.

Iced tea contains high concentrations of oxalate, one of the key chemicals that lead to the formation of kidney stones, a common disorder of the urinary tract that affects about 10% of the population in the US. Though hot tea also contains oxalate, it isn't as easy to consume a quantity large enough amount to encourage the formation of stones.

"For people who have a tendency to form kidney stones, it's definitely one of the worst things you can drink," says Milner.

Kidney stones are small crystals that form from the minerals and salt normally found in the urine in the kidneys or ureters, the small tubes that drain urine from the kidney to the bladder. Most of the time kidney stones are so small that they are harmlessly expelled from the body. But on some occasions, the stones grow to the point that they can become lodged in the ureters.

The most common cause of kidney stones is the failure to drink enough fluids. "People are told that in the summertime they should drink more fluids," says Milner. "A lot of people choose to drink more iced tea, thinking it's a tastier alternative. However, in terms of kidney stones, they're actually doing themselves a disservice."