



seattletimes.com

Wednesday, August 10, 2005 - 12:00 AM

Permission to reprint or copy this article or photo, other than personal use, must be obtained from The Seattle Times. Call 206-464-3113 or e-mail resale@seattletimes.com with your request.

Medical experts warn of unhealthy buzz touting energy drinks

By Ari Bloomekatz

Seattle Times staff reporter

By virtue of their name, energy drinks would seemingly provide at least one thing — energy.

Rockstar promises a better party. SoBe's Adrenaline Rush promises, well, a rush. Other drinks boast superhuman vigor with names such as Killer Buzz, Full Throttle or Rip It. Red Bull says "it gives you wings."

No way, say medical experts.

Not only do such drinks fail to offer a special boost, they say, their high caffeine and sugar content causes dehydration and could be dangerous for the young and active.

"These drinks are marketing ploys. I'm not aware of any scientific data that they do what they say they're going to do," said Mark Kantor, professor of family and consumer sciences and nutrition at the University of Maryland, who specializes in consumer education. "They don't give you more energy."

"A nutritionist defines energy as calories," said Kantor. "If you refer to energy as something that gives you pep and zip and stamina, that's just a myth. There's nothing that provides that in food."

Nonetheless, energy drinks, which have high amounts of caffeine and ingredients such as taurine and glucuronolactone, have exploded in the beverage market since 1997. There are now more than 1,000 different brands in the roughly \$1 billion industry, said John Craven, editor of the Cambridge, Mass., based beverage-review site BevNET.com, "the beverage industry's source for product reviews, news & more."

Most of the explosion has been among young people. Some guzzle down the drinks at clubs and bars, mixing them with liquor; others tank up before playing in a sports event or grab a can to prepare for the work day or to stay awake and study.

Such uses trouble doctors.

"[Energy drinks] get to be problematic when used in combination with alcohol or when used before sports or with kids," said Maher Karam-Hage, medical director of the Chelsea Arbor Addiction Treatment Center at the University of Michigan. Karam-Hage is an addiction specialist who has been



LAURA MORTON / THE SEATTLE TIMES

"These drinks are marketing ploys. I'm not aware of any scientific data that they do what they say they're going to do," said Mark Kantor, University of Maryland professor.

a vocal critic of energy drink-alcohol cocktails.

The main cause of concern, doctors say, is that the drinks cause extreme dehydration. And some governments, such as Sweden's, publish public-health recommendations that the liquids be used carefully. Recommendations such as:

- Energy drinks containing caffeine, taurine and glucuronolactone should not be used as thirst quenchers.
- The drinks should not be used for replenishing liquid when exercising.
- The drinks should not be mixed with alcohol.

In the game

Before high-energy sporting events, some athletes use energy drinks seeking an extra kick. But some doctors and medical experts say energy drinks not only don't help, they could actually hinder an athlete's performance.

Hard play alone will dehydrate a person, and Karam-Hage says the drinks can exacerbate the dehydration, forcing the muscles to work harder.

But the companies still recommend a pre-game drink.

"Try it before a workout or a sporting event and see how energized you feel!" SoBe's Web site suggests.

Suzanne Nelson, former nutritionist for the University of Washington athletic programs and now with the San Francisco 49ers, said she would never tell athletes to use the drinks.

While the high amounts of caffeine can provide the feeling of exuberance, Nelson said, athletes can also experience the negative sides of caffeine such as dehydration, a need to use the toilet and sometimes being twitchy and nervous, among others.

"That energized feeling is temporary, and it's not a substitute for usable energy in the form of carbohydrates," Nelson said.

She also worries because there's been little research about the safety of all the ingredients or on their effects during doping tests.

Craven, of BevNET.com, said he's not sure anyone in the industry has done enough research on the drinks' contents.

"These products are definitely being sort of created for marketing purposes more than actual scientific reasons. There's just nothing to back up what half these herbal ingredients do," Craven said.

SoBe spokeswoman Kristine Hinck says consumers have nothing to fear: "We believe our products are completely safe for consumption," she said. "All our ingredients are listed on the can and there's nothing going to surprise them."

If a student or trainer has any questions or concerns, such as a high sensitivity to caffeine, Hinck said, they should consult a health-care professional.

A spokesperson for the U.S. Food and Drug Administration (FDA) said manufacturers of energy drinks must be responsible for ensuring safety before their products hit the market. If the drinks pose a risk to public health or have labeling that is dishonest and misleading, the FDA will step in.

Still, anecdotal reports suggest caution may be in order: During a 2000 basketball tournament in Ireland, an 18-year-old student, who had drunk up to three cans of an energy drink, collapsed and died.

Medical examiners concluded he had died from the rare, sudden, unexplained adult-death syndrome, which could have been the result of a cardiac dysrhythmia. But witnesses had seen the man drinking the stimulant drinks.

The tragedy prompted research into the safety of energy drinks on the Irish market. And soon after the death, Ireland's Food Safety Promotion Board organized a committee that published an 84-page review of the health effects of stimulant drinks.

Some of the conclusions:

- High intakes of caffeine are unhealthy because they increase blood pressure and dehydration.
- Other ingredients in the drinks, for example guarana, an herb, are chemically similar to caffeine and produce the same effects.

At the bar

Joey Ingalls, 23, a bartender at Cowgirls, Inc. in Pioneer Square, said that about half the drinks she serves on a weekend night contain energy drinks.

It might be a round of "touchdowns" — a shot of Jägermeister mixed with an energy drink — or the new classic combo, an energy drink-vodka mix.

"On a weekend night, it's probably the majority of the drinks," Ingalls said. "Liquor or beer can make you tired."

Most people order such combinations for the perceived energy boost, but doctors say mixing such large doses of caffeine with alcohol is dangerous.

Alcohol already dehydrates a person, Karam-Hage says; when it's mixed with energy drinks "double dehydration" can occur.

"The more dehydrated you are, the higher the blood level of alcohol — the higher the danger," Karam-Hage said. And the caffeine doesn't make a person less drunk, it just makes them feel more awake.

"The end result ... is they falsely lead the person to think they can drive, operate machinery, whatever," Karam-Hage said.

Not for children

Caffeine is often considered unhealthy for kids, so many parents limit soda and carbonated drinks.

Karam-Hage said energy drinks should be no different.

The 80 mg of caffeine in a can of Red Bull is more than twice that in a can of Coke. Energy drinks warrant the same parental scrutiny as any other soft drinks, Karam-Hage said.

To be fair, the makers of Red Bull and other manufacturers do not consider their products appropriate for children.

"It is important to note that children are the only group that we specifically do not target as we believe that they do not need that extra boost of energy," a statement on Red Bull's Web site reads.

SoBe's Web site has a similar comment: "Because Adrenaline has a good amount of caffeine, we don't want our young lizards bouncing off the walls, so we recommend they wait until they get older."

There is no specific cut-off for when childhood ends, but some schools are beginning to ban all types of unhealthy food and sodas in their buildings. Some area school districts said they hadn't had energy drinks in their schools, but likely wouldn't allow them because of the high caffeine content. Students won't find energy drinks for sale in Seattle's public schools. In September, the school board adopted new junk-food policies. All drinks, except for chocolate milk, must be caffeine-free.

Ari Bloomekatz: 206-464-2540 or abloomekatz@seattletimes.com

[Copyright © 2007 The Seattle Times Company](#)