Addiction & the Humanities, Vol. 7(2) – Drink Me: Looking into the rabbit hole of anti-energy drinks

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Previous BASIS articles have discussed the increasing popularity of energy drinks (EDs) and have highlighted the risk factors (e.g., jolt and crash episodes) associated with consuming alcohol and EDs together (e.g., drinking more alcohol when co-administered with EDs) (STASH, Vol. 4(1), The DRAM, Vol. 6(8) and The DRAM, Vol. 6(10)). Forget the caffeine and sugar-packed energy drinks that can cause heart palpitations and a false sense of intoxication level, now you can sedate yourself with recently introduced to the market anti-energy drinks. Anti-energy drinks promise to slow things down instead of speeding things up.

Anti-energy drinks (e.g., Slow Cow) claim to relieve stress, help people relax, unwind, stay calm, be better able to concentrate and focus, and even "get numb" (Park, 2011). Ingredients vary from drink to drink. However, there are some distinct differences among anti-energy drinks: (a) some beverages claim to use all-natural ingredients and herbs (e.g., Mary Jane's Relaxing Soda); (b) some are infused with THC (i.e., the psychoactive ingredient in marijuana) and only stocked in medical marijuana dispensaries (e.g., Canna Cola, Keef Cola, and Dixie Elixers); (c) while others are sold as dietary supplements (e.g., Drank and Unwind).

Not infused with THC – Mary Jane's Relaxing Soda	Infused with THC – Canna Cola
	

Some common ingredients in anti-energy drinks are:

- Melatonin (i.e., a hormone that helps regulates sleep): Melatonin dietary supplements can treat insomnia and are generally safe in low doses (e.g., 0.2 to 20.0 mg). However, people have reported side-effects from Melatonin such as vivid dreams/nightmares, headaches, drowsiness/morning grogginess, stomach issues, feeling hungover, and depressed (FamilyDoctor.org, 2000; WebMD, 2008).
- Valerian root (i.e., an herb that acts like a sedative): Valerian root might be effective for treating insomnia (e.g., 300 to 900 mg), but also can cause excessive drowsiness when consumed with alcohol or other sedating herbs. Additional potential side effects include headaches, uneasiness, morning grogginess, stomach issues, and might affect the liver's ability to break down medicine (Hadley & Petry, 2003; MedlinePlus, 2010b).
- L-Theanine (i.e., an ingredient found in tea): L-Theanine might help to relieve stress without causing drowsiness. There is some support for the efficacy of a 200 to 250 mg dose as an anti-anxiety agent (drugs.com).
  Rose hips (part of perennial plant): Typically used as a natural source of vitamin C, but also used as a diuretic and laxative, and generally not associated with toxicity (familyhealthinformation.com).
- Kava (herb): Kava might treat anxiety and insomnia without effecting mental clarity (some support for 50 to 280 mg of kavalactones or 100 mg of kava extract taken 3 times/day), but can cause drowsiness that alcohol can exacerbate (Healthline; National Center for Complementary and Alternative Medicine, 2006; WebMD, 2009). The FDA warns that, although rare, the use of kava dietary supplements is associated with a potential severe risk of liver damage (U.S. Food and Drug Administration, 2002), but some research indicates that toxicity is associated with kava leaves and stems of kava, not roots (Lim et al., 2007; Nerurkar, Dragull, & Tang, 2004).
- Passionflower (herb): Passionflower (2.5 g infused 3-4 times/day) might help treat anxiety and or insomnia because its chemicals have a calming and sleep-inducing effect. However, Passionflower might cause excessive drowsiness when taken with other sedating herbs. It is considered generally safe, but side effects could include dizziness, confusion, altered consciousness, irregular muscle movements and coordination, and it might be unsafe in pregnant women (MedlinePlus, 2010a; wellness.com).

> *Please note that any item listed above that causes drowsiness might make it dangerous to drive or operate machinery after use and more research is needed to determine and regulate safe dosage.*

Although there appears to be some benefits compared to energy drinks – for example, fewer calories, less sugar, inclusion of vitamins, some natural ingredients, and the capacity to safely help people relax – little is known about the psychoactive effects of anti-energy drinks because little scientific research is available. Some critics question the safety of anti-energy drinks, especially when little is known about the sedating and drowsiness effects of some anti-energy drinks. Specifically, Dr. Ronald J. Peters questions anti-energy drink marketing. The marketing for some anti-energy drinks portrays them as a safe alternative to drugs and alcohol and that the feelings after consuming these beverages are comparative to those associated with alcohol or marijuana, but without the negative side effects (e.g., hangovers, laziness, feeling hungry etc.). However, some companies (e.g., Malava Novocaine, KOMA Unwind lists Koma Kocktails) include recipes for mixing their anti-energy drinks with alcohol. Peters is often quoted as claiming that anti-energy drinks appear to be marketed to inner city youth. Many of these beverages are sold in city convenience stores and some anti-energy drinks (e.g., Purple Stuff, Drank, Lean Slow Motion Potion) have similar names, appearance, and effects to illegal drugs that are commonly abused, specifically the abuse of codeine promethazine cough syrup. Sizzurp, lean, purple stuff, and drank are street terms for a codeine promethazine cough syrup mixture with sprite and hard candy, usually Jolly Ranchers.

Do anti-energy drinks offer an alternative to drugs and alcohol? Do people use them to self-medicate? Are some of the drinks too similar to the illegal use of codeine cough syrup mixtures? For now, there is some scientific support that people might use anti-energy drinks to self-medicate: Peters and colleagues, 2010 found that a sample of African American male youth in Houston, Texas who showed signs of post-traumatic stress following Hurricane Ike were significantly more likely to use anti-energy drinks (Peters et al., 2010). Until scientific research tests the effects of anti-energy drinks among the general population, including differences among drinks with varying ingredients (e.g., melatonin vs. non-melatonin), it is not clear if the effects of anti-energy drinks are healthier than energy-drinks.

-Tasha Chandler

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