

# Doping in sport

**Doping** is the use of banned athletic performance enhancing drugs by athletic competitors. Use of drugs in sports goes back centuries where the athletes or combatants, were fed diets and given treatments considered beneficial to help increase muscle.

This way to enhance performance is considered unethical, and therefore prohibited, by the International Olympic Committee. The reasons for the ban are mainly the health risks both physically and mentally, the equality of opportunity for athletes as well as the exemplary effect of drug-free sport for the public. Long-term effects have not been able to be pinpointed yet . Anti-doping authorities state that using performance-enhancing drugs goes against the "spirit of sport".

Nowadays doping is a global problem that follows international sporting events worldwide. Over the last 20 years the appearance of steroids in sports has been seen as an epidemic. International sports federations, led by the International Olympic Committee, attempt to stop the spread of this problem, with little effect. It was expected that, with educational programs, testing, and supportive medical treatment, this substance-abusing behavior would decrease.

Professional athletes are often the role models of adolescent and young adult populations, who often mimic their behaviors, including the abuse of drugs.

## By substance

### **STIMULANTS**

Stimulants are drugs that usually act on the central nervous system to modulate mental function and behavior, increasing an individual's sense of excitement and decreasing the sensation of fatigue. Examples of well known stimulants include caffeine, cocaine, amphetamine, modafinil and ephedrine.

### **Anabolic steroids**

Known side effects include harmful changes in cholesterol levels. Some of these effects can be mitigated by taking supplemental drugs.

### **Side effects in men**

- acne
- impaired liver function
- breast formation (gynecomastia)

- increase in estrogen
- increased sex drive
- risk of heart failure
- muscle dysmorphia

### Side effects in women

Side effects in women include:

- hair loss
- hypertrophy of the clitoris
- increased sex drive
- irregularities of the menstrual cycle
- development of masculine facial traits
- increased coarseness of the skin
- deepening of the voice



### Social pressures

Social pressure is one of the factors that leads to doping in sport. Adolescent athletes are constantly influenced by what they see on the media, and some go to extreme measures to achieve the ideal image. Examples of social pressures were given in a study done on an online bodybuilding community, where bodybuilders doped because they felt like it was a rite of passage to be accepted into the community, and to feel validated. In addition, society's embracement of the "winning is everything" spirit leads many athletes to participate in doping, hoping that they will not be caught.

### **Physical pressures**

Elite athletes have financial competitive motivations that cause them to dope and these motivations differ from that of recreational athletes. The common theme among these motivations is the pressure to physically perform. It was concluded that athletes used performance enhancement drugs for healing purposes so that they were an able competitor for the economic rewards involved with elite sports. Physical pressures often overlap with social pressures to have a certain body build. This is the case with muscle dysmorphia, where an athlete wants a more muscular physique for functionality and self- image purposes. The most popular motive for athletes to take supplements is to prevent any nutrient deficiencies and to strengthen the immune system. These factors all focus on improving the body for performance.

### **Psychological Motivations**

Psychology is another factor to take into consideration in doping in sport. It becomes a behavioral issue when the athlete acknowledges the health risks associated with doping. This has to do with the psychological thinking that the drug will make one feel invincible.



## Energy Drink

An **energy drink** is a type of drink containing sugar and stimulant compounds, usually caffeine, which is marketed as providing mental and physical stimulation. Energy drinks are supposed to do just what the name implies. They give you an extra burst of energy.

Energy drinks have the effects caffeine and sugar provide, but there is little or no evidence that the wide variety of other ingredients have any effect. Most effects of energy drinks on cognitive performance, such as increased attention and reaction speed, are primarily due to the presence of caffeine. Advertising for energy drinks usually features increased muscle strength and endurance, but there is still no scientific consensus to support these claims.

Energy drinks have been associated with health risks and excessive or repeated consumption can lead to cardiac and psychiatric conditions.



.As it turns out, most of that "energy" comes from two main ingredients: sugar and caffeine. A typical energy drink can contain up to 80 milligrams of caffeine (about the same amount as a cup of coffee). By comparison, a 2006 study found that the average 12-ounce soda contains 18 to 48 mg of caffeine.

Other than caffeine levels, how do energy drinks differ from sodas and sports drinks? Soft drinks are mainly water, sugar and flavoring. They don't do anything for your body; they're just supposed to taste good. Sports drinks are designed to replenish fluids lost during activity. They typically contain water, electrolytes and sugar. Energy drinks have added caffeine and other ingredients that their manufacturers say increase stamina and "boost" performance. They're designed for students, athletes and anyone else who wants an extra energy kick.