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Effects of Alcohol on Sports Performance and Physical Fitness

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Abstract

There are social evil almost in every society of the world. Through people know the health hazards, yet they do not think or care for their own health in life abuse of alcohol and drugs cause severe damage to the human body because these produce harmful effects on the health of people directly or indirectly. Alcohol abuse interferes with work or disturbs social or family relationship. On the other hand drugs are known for their actions and side effects. These are organic and inorganic materials. Overuse of drugs is harmful for sports performance so, we can surely say that Alcohol and drugs in our life we achieved our goals.

Keywords: Alcohol, Sports performance, Physical fitness.

1. Introduction

Alcohol is not a stimulant as is generally considered. It is depressant. It reduces body's functional activity, makes people less efficient and mental processes become dulled, when people drink it. It affects vision also. When taking in small amounts, it acts as a seductive and calms nervousness or excitement. It is for this reason people claim that alcohol is relaxing. In some cases it may even have beneficial effects of health. When it is taken in large amount, it is hypnotic, because it puts the drinker to sleep. Since it also combats pain some people consider it analgesic or pain killer. When it is taken in excessive amounts, it acts as an intoxicant or poison and has a harmful effects on the body and its functions. Alcohol abuse is at least as prevalent in the athletic community as it is in the general population; in fact, the majority of athletes have begun drinking by the end of high school. Both male and female college students have higher rates of binge drinking than non-athletes, and drinking five or more drinks on any one occasion affects the brain and body for several days. When we discuss uses of alcohol in medicine, we can briefly say that alcohol is a disinfectant, which kills bacteria when used in strong concentration, on the outside of the body. How alcohol affects a person depends on the amount consumed, the environmental context, and individual differences in capacity. While a small amount of alcohol consumed daily may have a protective effect on the cardiovascular system, chronic heavy alcohol use is associated with a wide range of physically negative outcomes, which account for approximately 100,000 deaths yearly in the United States. It is also used as a germ-killer in preparation of germicides. The alcohol should, therefore, not consume liquor and should always stay away from alcohol drinks. It detected under the influence of intoxication. It brings bad name to the athlete himself, his family, his coach his team his association or club and the country. People hate them. It further leads to disqualification and he is also debarred. The career, thus, is ruined. Sports controlling bodies have, therefore, banned use of alcoholic drinks. It is the moral duty of every sports person to stay away from intoxication. All the drugs chemical substances having potential to after the structure, function of the body, mood and behaviour. It is misused when it is not taken for the intended purpose and abuse when it is used in excess. Drug abuse creates problems of personal and social career and educational developments. In some cases it leads to damage certain body parts and in some cases there is a risk of death. The athlete take drugs (doping) for the sake of temporary enhancement of performance, power to win the game and medals to brings game at national and international levels. Sports competitions are becoming highly professional. Through the drugs are banned yet doping cases are coming to light and athlete are found guilty in certain sports competitions. The sportsmen should, therefore, stay away from drugs as its misuse and abuse, when detected, damage the prestige of a country at

national and international levels, and not only this, the sportsman is debarred for future competitions. While alcohol use to celebrate sport has long been an Australian tradition, there is increasing evidence to show what a poor partnership it really is. Good Sports identifies that alcohol can affect your sport and exercise performance in directly and indirectly way.

2. Objective of the study

To find out the effect of Alcohol and drugs on sports performance.

3. Effects of alcohol on sports performance

Alcohol has been described as a performance impairing drug. Exercise is a complex activity utilizing many of the body's organ systems; alcohol exerts an effect on most of these systems, including the central nervous system, muscle energy stores and the cardiovascular system.

3.1 Alcohol and Injury

Athletes who drink alcohol at least once per week have an elevated risk of injury or accidents as compared to athletes who do not drink. Consuming alcohol regularly depresses immune functioning and slows the healing process for sports-related injuries. Alcohol-related injuries in sports like cycling, boating, ice skating, snow skiing and swimming are likely related to a decrease in psychomotor functioning and impaired judgment. Nearly 1/3 of college students consume alcohol during participation in recreational boating or swimming, while greater than 50% of young adult drowning victims have detectable post-mortem blood alcohol levels.

3.2 Alcohol and motor skills

Alcohol decreased hand tremors slowed reaction time decreased hand-eye coordination further slowed reaction time and reduces body's functional activity and playing efficiently, balance and judgment. Decreased hand-eye coordination. Decreased accuracy and balance. Increase the risk of dehydration and impaired tracking, visual search, recognition and response skills Weakness brain and its nerves, both the extension and contraction of muscles decreases and muscles do not exert maximum force.

3.3 Alcohol and strength, power, and short-term performances

Alcohol decrease in overall performance levels lowed running and cycling times weakening of the pumping force of the heart impaired temperature regulation during exercise decreased grip strength, decreased jump height, and decreased 200- and 400-meter run performance faster fatigue during high wasters energy, strength, power, speed, endurance and causes early tiredness and fatigue leading to poor performance in play.

3.4 Alcohol and Aerobic performance

Alcohol causes dehydration and significantly reduced aerobic performance impaired 800- and 1500-meter run times increased health risks during prolonged exercise in hot environments

3.5 Medical Concerns

Alcohol has been linked to exercise-induced anaphylaxis and asthma. Acute ingestion may cause myocardial irritability, resulting in arrhythmias. Consumption before water activities increases the risk of injury. Harmful to the body systems, reduces ability to regulate body temperature, obstructs neuro-muscular co-ordination.

3.6 Heavy alcohol consumption impairs exercise performance by

- impairing the cardiovascular response to exercise
- causing nutritional deficiencies from alterations in nutrient intake, digestion, absorption, metabolism, physiological effects, turnover, and excretion of nutrients
- causing *myopathy*, or muscle damage, wasting, and weakness, in various muscles, including the heart
- changing the body's hormonal environment, making it less conducive to increasing muscle mass and strength
- compromising cardiovascular and muscular performance in people with alcoholism

3.7 Special concerns for women Athletes

- Women's muscular strength is inversely correlated with total life-time doses of alcohol.
- Women may be more sensitive than men to the toxic effects of alcohol on the heart.

3.8 How alcohol affects your physical fitness

- **Speed:** Alcohol affects you even after you've finished drinking. Alcohol affects the central nervous system and slows down the information processing ability of the brain. This in turn slows down your reaction time, hand-eye-coordination, accuracy and balance. Even a small number of drinks can affect performance.
- **Energy and stamina:** The blood sugar that your body needs for energy is produced by your liver when it releases glucose into the blood stream. Alcohol keeps the liver too busy to produce the required sugar levels to sustain an athlete's energy and stamina to perform at their peak.
- **Cramps:** While exercising, your muscles burn up glucose, producing lactic acid as a waste product. Too much lactic acid leads to muscle fatigue and cramps. Alcohol that remains in your system contributes to greater build-up of lactic acid, increasing the risk of cramping dramatically.
- **Dehydration:** The 'drys' is a term often used to describe an extreme symptom of alcohol's diuretic (increased urination) effect. This extra fluid loss added to what an athlete sweats out increases the risk of dehydration significantly.
- **Muscle cramps:** Alcohol affects the body's ability to create energy therefore it slows down reaction times, increases body heat loss and reduces endurance. After exercising, the body needs to be rehydrated. It's not helpful to drink only alcohol as it will continue to dehydrate the body further. If you sustain injury while exercising, and you have had alcohol the night before or drink any alcohol afterwards (while injured), you are likely to increase your recovery time significantly.
- **Testosterone:** Alcohol, when consumed in amount typical with brings drinkers can dramatically decrease serum testosterone levels. Decrease in testosterone are associated with decrease in aggression less muscle mass and overall athletic performance. In female athlete this may cause an increase in the production of estradiol (a form of estrogen) which may increase the risk of breast cancer.

- **Fat Storage:** Alcohol has seven calories per gram. Fat has nine calories per gram. Alcohol is much storage like fat in the body, also, alcohol, demainates (destroys) amino acids and stores them as fat. In the case of storage fat powerful energy pathways (like glycolysis) are impaired and large amount of lactic acid are produce, this results in decreased energy, decrease muscle recovery, and increase muscle soreness.

3.9 Psychological aspects

- Social damage
- Alcohol effects a daytime repercussion of alcohols effects on sleep.
- Alcohol effects attention.
- Lake of confidence.
- Alcohol use cancels outgains from your workout.
- Alcohol use hampers memory and retention.

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