



## New guidelines for sports & energy drinks

Praveen M, Physical Education Director, Government First Grade College,  
Gowribidanur Taluk, Chickballapur District, Karnataka state

### ***Abstract***

*Sports drinks are designed to help sportspersons replenish body fluids that are lost during an intense workout or a match. Electrolyte replacement promotes proper rehydration, which is the only way a sportsperson or fitness enthusiast can delay the onset of fatigue after a training session. Carbohydrates, the primary fuel utilized by exercising muscle, are important in maintaining performance in exercise and sport. This paper examines the importance of sports drinks & focuses on the need for a new guidelines for sports & energy drinks*

Key Words: Sports & energy drinks, career for sports persons, impact of heavy intakes, new policy requirement,

### **Introduction**

Sports drinks are beverages that are specially formulated to help people rehydrate during or after exercise. They are usually rich in carbohydrates - the most efficient source of energy. (Journal of the International society of sports nutrition 2014).

**Classification of sports drinks** -There are three types of sports drinks:

1. Isotonic sports drinks,
2. Hypertonic sports drinks and
3. Hypotonic sports drinks

Isotonic sports drinks are those which contain similar concentrations of salt and sugar as in the human body. Hypertonic sports drinks contain higher concentrations of salt and sugar than the body, and hypotonic sports drinks contain lower

concentrations of salt and sugar than the body. A majority of the sports drinks are moderately isotonic. A 250ml serving of a sports drink typically contains about 13 grams of salt and 19 grams of sugar. Water is the best bet for sports persons but the availability of numerous branded / unbranded sports drinks afford multiple opening for sports persons.

### **Impact of over hydration-**

Fitness experts insist that sports persons should drink water instead. However, those who consume excessive amounts of water could suffer from a rare condition called water intoxication or water poisoning. It occurs when the normal balance of electrolytes in the body crosses the safe limits. It hampers the functioning of the brain and in some cases, could even be fatal. It occurs during intense workouts, when heavy



sweating removes water and electrolytes from the body, but one drink more water than necessary in order to replace what has been lost. (Journal of the International society of sports nutrition 2014 ).

**Effects of low concentration of electrolytes-** The resulting low concentration of electrolytes adversely affects the functioning of the central nervous system. Many sports drinks reduce the risk of water intoxication by replacing fluids and electrolytes in a ratio similar to that normally found in the body. However, some sports drinks have lower concentrations of electrolytes, so care must be taken while consuming them.

**Effects of over consumption-** Over-consumption of these drinks could lead to water intoxication. People whose work or workout regimen puts them at a higher risk of developing heat illness or water intoxication should seek professional advice about proper rehydration of the body.

**Indian sports drink market** -The Gujarat Co-operative Milk Marketing Federation , which markets dairy products under the Amul brand, was among the first Indian companies to enter the sports drink market. In 2006, it launched Amul Stamina, a whey-based drink available in two flavour (orange and lime), which had failed to make much headway then. A couple of years ago, when New Delhi hosted the Commonwealth Games, there were reports that the brand would be making a comeback.

**sports drink market-** Indian sports drinks market popularly uses four multinational brands: Gatorade, Powerade, Glucon D Isotonik and Lucozade.

1. **Gatorade-** Gatorade was launched in India in 2004, is a PepsiCo product, Gatorade was invented in 1965 by the medical team for the University of Florida
2. **Power Ade** is an offering by the cola major, Coca-Cola.
3. **Glucon D Isotonik** is one of the brands in the Heinz portfolio,
4. **Lucozade** is a GlaxoSmithKline product.

#### **The benefits**

1. Longer duration workouts, it's important to get enough fluid during the session, and flavor helps you keep on drinking
2. Beverages, including those with sodium can help in restoring and maintaining our water balance.

**The market trends** -In April 2011, India's sports drink market was estimated at Rs 150 crore & in 2014 it was risen to 350 crores. Analysts with leading business newspapers claimed, "The Indian sports drinks market has been growing at about 35 per cent year-on-year since the mid-2000s." According to a source from a market research agency, "Only a quarter of the urban youth in India consume sports drink." The frequency of purchase of the same in India is not very high, but that has



nothing to do with the country's fitness culture.

### **Gatorade and cricket in India-**

Gatorade is associated with cricket, India's most popular sport by far. For the past five years, the brand has been sponsoring Gatorade Pacers, a nationwide hunt for fast bowlers. The bottled sports drink brand was the official nutrition partner for the 2011 edition of the ICC World Cup. Subsequently there were several such hosting of great sporting events through these drinks manufacturers.

### **The Challenges**

1. Firstly , the sports drink market in India is a limited market. Sports drinks are found only in supermarkets and hypermarkets in metro cities like Mumbai, New Delhi and Bengaluru.
2. secondly, sports drink are expensive. With cheaper alternatives like water and tender coconut water available everywhere, the segment of shoppers that does not visit malls is likely to miss sports drinks.
3. Sports drinks are branded & Indian youth still are not brand friendly.
4. Sports drinks cater only to urban youth & in rural areas they are almost unheard.
5. Sports drinks have restricted access to chosen sports such as cricket, hockey etc.

6. Sports drinks are not listed in the nutrition list for sport persons.
7. Sports drinks are still considered as a hi-fi energizer & Indian sports persons are unaware of global trends in energy drinks market.
8. Sports drinks are often considered as an elite drink, hence generally is not popular with sports persons / athletes /players.
9. Sports drinks are not popular in India because the sports organizations & clubs suffer from low economic funding & financial allocations. They find it difficult to sponsor the uniforms, equipments, & other such paraphernalia & provision sports drinks do not find a listing.
10. Sports drinks are often neglected in India because sports organizations & clubs do not create awareness about its usage.
11. Sports drinks are not acclimatized in Indian sports arena & sports persons often go for water , tender coconut water, milk , glucose water , baked vegetable water etc an alternative to energy drinks.

**Opportunities-**There are lot opportunities for expanding sports drinks market in India .Besides sportspersons and fitness conscious youth, new sports drink brands hoping to enter the fray in India will also be catering to the urban youth & sports related persons. Popularizing



global trends in sports drinks field is needed to be augmented. Sports organizations can make the nutrition chart by including sports drinks.

**The impact** -Hydration is an important part of health and total wellbeing of sports persons .

1. small losses of body fluid can cause headaches,
2. lack of concentration,
3. decreased reaction time,
4. lethargy which hinders sporting performance.

In very hot climates and during exercise, sweating can contribute substantially to this fluid loss. When fluid loss occurs - as in sweating - a reduction in blood volume is seen, which thickens the blood, making it harder for the heart to pump the blood around the body. To offset this effect the heart rate increases, but oxygen delivery to exercising muscles and removal of carbon dioxide and waste products from them is hindered. Fluid loss can also lead to an increased core body temperature, which impairs the activity of enzymes in the body. Research shows that the natural thirst mechanism makes individuals consume only approximately half the amount of fluid they have lost. It is thought that the thirst mechanism does not initiate the drive to drink until the body is 2% dehydrated, which is at the point where performance can be compromised. Water, diluted fruit juices and sports drinks are

commonly used for rehydration. As sodium is the major salt in sweat, some drinks contain added sodium along with carbohydrates. ( Coyle, E. F. (2004). Fluid and fuel intake during exercise for sports persons . Journal of Sports Sciences ).The global soft drinks industry increasingly finds itself at crossroads. Volume growth has become extremely hard to come by in high-income developed markets, while in emerging markets substantial investment will be necessary to sustain the strong performance seen over 2009-2014. ( Coyle, E. F.-Fluid and fuel intake during exercise for sports persons . Journal of Sports Sciences 2004 ) . Real possibilities exist in low-income markets, but fierce competition and the massive investment required in production and distribution infrastructure are likely to hamper margins in emerging markets for years to come. While winning over affluent urbanites in emerging markets will remain an important component of strategy, several categories, most notably bottled water and juice, will continue to face strong competition from unpackaged products. While consumers in the Middle East, Latin America, Africa, and India all retain a strong preference for sweet beverages, carbonated soft drinks are just one part of the puzzle, with juices in particular set to make strong inroads.

**Conclusion-** Thus sports drinks market in India is still in its infancy & needs to be expanded with meticulous planning & premeditated



expansionist policies. There are lot opportunities for expanding sports drinks market in India .Besides sportspersons and fitness conscious youth, new sports drink brands hoping to enter the fray in India will also be catering to the urban youth & sports related persons. Popularizing global trends in sports drinks field is needed to be augmented. Sports organizations can make the nutrition chart by including sports drinks. Sports drinks have been criticized for their impact on young consumers due to their high calorie and sugar content this accusation can be sorted through integrated policy on sports drinks.

#### References

1. The role of sodium in sports drinks Sports Drinks journal 2013
2. Sawka, M.N., Montain, S.J. (2000). Fluid and electrolyte supplementation for exercise heat stress. American Journal of Clinical Nutrition 72:S564-72.
3. Coyle, E. F. (2004). Fluid and fuel intake during exercise for sports persons . Journal of Sports Sciences
4. Official website sports & energy drinks market research 2014
5. Journal of the International society of sports nutrition 2014
6. Sharma J.P.-Sports dictionary , Khel sahitya Kendra new Delhi 2009
7. Sharma . J.P. – Exercise physiology & sports- Khel sahitya Kendra new Delhi 2009
8. Sharma J P - organization & management of physical education & sports; Khel sahitya Kendra , 2005