

## **WORLD'S FIRST FRUITARIC ACID PLANT**

The world's first fruitaric acid plant has been developed and commissioned by Isegen South Africa, a Durban-based manufacturer of a wide range of food acidulants, at a cost of R8 million. This will be the first stage of an expansion program to incrementally increase the capacity to manufacture fruitaric acid.

The product, which can easily replace citric acid, has been patented worldwide. It has the potential to compete in the world organic food acidulants market, presently well in excess of one million tons per annum, says Robert Fowlds, managing director of Isegen.

The unique characteristics of this invention would make it the product of choice for many niche areas of this market, where for example, citric acid suffers from certain unfavourable physical and chemical properties, added Fowlds.

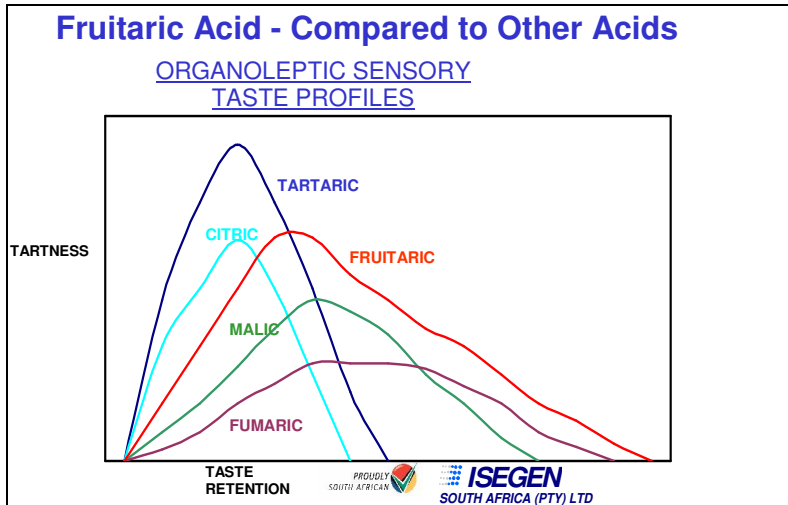
The dry powder beverage industry would be one of the major consumers, as fruitaric acid, unlike citric acid is not hygroscopic and will not pick up moisture from the atmosphere and cake. Fruitaric acid will provide tartness closer to that of natural fruits and vegetables where often more than one acidulant occurs.

Other key markets are the following:

- Liquid beverages and juices
- Food processing.
- Jellies and food dry-mixes.
- Confectionary and candies
- Canned fruit and jams.
- Chewing gums.
- Ice creams and sorbets.

The longer lasting tartness of fruitaric acid will mask the after taste from high intensity sweeteners and because it is far better able to meld with flavourants than a single acid, can result in savings in the use of the expensive flavour component.

Isegen has already achieved a number of world firsts in food acidulants, such as the commercial production of granular malic acid globally, granular cold water soluble fumaric acid, and now fruitaric acid.



The Organoleptic Sensory Taste Profiles clearly show the advantage of combining various acidulants such as tartaric acid, malic acid and fumaric acid CWS in a unique composite granule to form **Fruitaric Acid**. The unique combination provides an initial burst of tartness (acidity) similar to that of citric acid, while the fusion of the various tartness profiles build upon each other to establish a long lasting Organoleptic concept of sourness that considerably outlasts that of citric acid.

Isegen South Africa comprises two operations:

Food ingredients section, manufacturing a range of unique food acidulants, where Angela Fowlds is the director handling this part of the business; and the Plasticisers and anhydrides (P&A) section, where Mark Holtes is the director handling this business sector. This sector manufactures maleic anhydride (MA) from butane, the primary raw material used in-house in the manufacture of all the food acidulants. This section also produces phthalic anhydride (PA) and different esters as raw material plasticisers for various local industries in the plastics, paint, resins and adhesive industries.

For more information on fruitaric acid and other Isegen food acidulants, phone Angela Fowlds or Liz Hay at 031-913-3200.

**Include picture of a section of the new fruitaric acid plant, attached.**

**Caption: Section of the granulator of the new fruitaric acid plant.**