Development and standardization of recipe for jackfruit candy

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SUMMARY : To standardize a recipe for the preparation of jackfruit candy, the bulb was steeped in 4 different combinations of sugar syrup concentrations (20/30/40°B, 25/35/45°B, 30/40/50°B and 40/50/60°B) for osmotic concentration. The osmosed jackfruit bulbs were then dried at 3 different temperatures 50, 60 and 70°C. It was observed that 3 candy products processed in sugar syrup combinations of (25/35/45°B, 30/40/50°B and 40/50/60°B) and all dried at 70°C were found to be best among the prepared 12 products by organoleptic evaluation. The B:C ratio of production of jackfruit candy was estimated to be 1: 1.95 for retail marketing and 1: 1.63 for wholesale marketing.

Key Words : Jackfruit, Processing, Recipe, B: C ratio

Jackfruit (*Artocarpus heterophyllus* Lam.), an important minor fruit crop of tropics belonging to family Moraceae, is a native of India and grows wild in the rain forests of western ghats of India (Reddy *et al*., 2004). Jackfruit is a nutritious fruit, mostly consumed as a fresh table fruit. It has a short shelf-life of just one to two days after ripening and bulbs have one day shelf-life after separating from the fruit. In India, except the production of jackfruit chips from unripe fruit in some regions no commercial method of jackfruit processing is in practice. Therefore, there is a thrust in recent times, to improve the utilization of this fruit especially through product diversification.

Jackfruit consists of three important parts namely bulb,

seed and rind. Bhatia *et al*. (1955) reported that the bulbs constitute 29 per cent, seeds constitute 12 per cent and rind constitutes 59 per cent of the ripe fruit. The bulk of the crop produced is generally utilized in unripe stage as a vegetable or made into pickles, while the ripe fruit is eaten fresh or preserved in syrup. Jack fruit, a poor man's fruit, is available in plenty during the season in the market as well as on road side with push cart vendors. They are sold often in most unhygienic conditions by the vendors. It is, therefore, envisaged to find out hygienic and scientific methods to preserve the bulbs for a short time. By preserving it in sugar syrup and packaging in convenient consumer packs, it can be sold in the market. This endeavor will help not only to utilize the excess produce of jackfruit during the season, but also ensures the development of a sustained jackfruit processing industry on a cottage scale in rural areas.

In spite of its popularity for centuries in Asia, very little work has been done scientifically to extend the nutritional and agricultural potential of this crop. However, the jackfruits are being valued by the processors to make use of enormous production and glut in the market during the harvesting season. Keeping in view the above requirements and also to explore the possibility of preparing and preserving the jackfruit products in a hygienic way, the present investigation was undertaken to study physical and bio-chemical properties of

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