

Development of technology for fortification of fig (*Ficus carica* L.) fruit into its value added product- fig toffee

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SUMMARY : The new consumption trends observed in the current society forces the companies to develop new and healthier products to satisfy the consumers demand. In this sense, a new fruit toffee formulated with healthy soy protein isolate, ragi powder, papaya pulp and a high fig fruit percentage could be an interesting product to develop. The fig toffee was prepared from finely ground fig pulp and other ingredients (liquid glucose, sucrose, edible fat and skim milk powder) in appropriate proportion. The fig pulp was fortified by addition of other ingredients such as soy protein isolate, ragi powder, papaya pulp followed by concentrating to about half of its volume by heating with continuous stirring. The mass was then heated to a thick consistency (750 – 80° Brix) followed by spreading as sheet of 1 cm thickness on a smeared (with edible fat) flat aluminum tray and dried for 2 hours in a cabinet drier at 60±5°C temperature. Fig toffee is easier to handle during transportation, storage and also open further fields of application that may promote fig toffee processing and fortification at industrial scale in future. The products prepared by fortification of figs viz., fig toffees were assessed for their physico-chemical and sensory parameters and were found for cheaper and also they were rich in nutrients like protein.

KEY WORDS : Fig pulp, Papaya pulp, Fig toffee, Sensory parameters

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Fig (*Ficus carica* L.) belongs to the family Moraceae. The fig is a native of Southern Arabia. In India, its commercial production is limited to a few centers in Maharashtra

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and South India. In Maharashtra, it is cultivated on commercial scale in adjoining areas of Pune and Aurangabad (Anonymous, 2002). Figs have a great importance in nutrition due to being important source of carbohydrates. They contain essential amino acids and are rich in vitamins B₁, B₂ and C and minerals. Fresh figs are very sensitive to microbial spoilage, even in cold storage conditions; thus they must be preserved in some way (Sandhu, 1990).

Nutrient losses are found to occur during food processing and storage. Food fortification has come into picture several decades back and refers to the addition of essential nutrients which are originally deficient or lost during processing. Foods can be fortified with nutrients either in powder or liquid form (Sarojini *et al.*, 2009).

Toffee is one of the essential products largely consumed by children. The confectionary products due to its varied taste and flavour have a wide acceptance in children throughout the world. The conventional toffees are generally made from sugar, skim milk powder and other artificial colours and flavours. Efforts have been made to incorporate the natural fig pulp in