

Production and comparative analysis of nutrient enriched cheese with microorganism using natural extract treatment

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The present study was carried out to determine the enrichment in nutritional value of cheese production using *Lactobacillus spp.* and *Saccharomyces spp.* with Natural extracts. Proteolytic enzyme like rennet is used in large scale production of the cheese isolated from calf stomach which is expensive and also raises ethical issues. To overcome the problem, research is been carried out for enzyme alternatives like natural extracts from *Carica papaya* and pineapple that have been proven to have proteolytic activity. *Lactobacillus spp.* and *Saccharomyces spp.* were isolated from curd and idli batter which were used as starter cultures. Peel and pulp extract of *Carica papaya* and pineapple was used as source of proteolytic enzymes. Fermentation were initiated by starter culture and natural extract followed by separation of whey, salting, ripening, cheddaring, and maturation of cheese. These samples of cheese were analyzed for its nutritional values and physiological characters viz., texture, aroma, flavor, colour, hardness, moisture content. It could be concluded that the study provided a better alternative in cheese products by using cheaper sources to valuable and quality product. This study concludes the potential of inexpensive natural source as an alternative to this Rennet for the production of Cheese.

Biography

Asmita Jadhav is research student worked under the guidance of associate professor Dr D M Shere dept of food science and technology MKV Parbhani, he has publish many research article in renowned journals.

Value addition of bael for north-eastern region of India

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Bael (*Aegle marmelos* Corr.) fruit was processed as a preserve, candy and its by-product like syrup and their quality estimation. The bael fruit was selected as fully mature and turn up of pulp colour for processing. The product was prepared with the combination of sugar syrup, citric acid, KMS and maintained the TSS up to 65.5 oBrix. The Local cultivar of West Bengal(bael) was study in fresh condition with a large fruit size of greenish yellow to yellowish green. Its average fruit weight (723.50 g), pulp per cent (75.40), TSS (12.2 oBrix), ascorbic acid (13.12 mg/100 g pulp) and β carotene (1868.01 IU) were found during the study period. The fruit slices were dipped in alum solution (2 per cent) for two hours and blanched, the product was stored at room (25-37 °C) and refrigerated temperatures (8-10 °C). The organoleptic score 4.7 and 4.32 was found best among all treatments of local cultivar of bael in preserve and candy respectively.