Abstract No: MP-04

Development of a pomegranate based jelly

P. U. A. Senanayake* and K. K. D. S. Ranaweera

¹Department of Agriculture & Food Technology, University of Vocational Technology, Sri Lanka. ²Department of Food Science & Technology, University of Sri Jayewardenepura, Sri Lanka udanianupamap@gmail.com*

Jelly is a semi solid preserved mixture of fruit juice and sugar. Chemical and artificial ingredients were used for preparation of jelly products and it has a major health related concern. Hence, this study was aimed to develop a value added product using pomegranate which is a popular functional fruit. A pomegranate based jelly was prepared using different concentration of pomegranate juice and Gracilaria seaweeds and constant concentration of Hibiscus, sugar and citric acid as a health promoting product. Four samples of jelly were prepared, and 1st part of the sensory evaluation was done using a non-trained panel of thirty members, and the best sample was selected based on the sensory evaluation. The second part of the sensory evaluation was done comparing the selected sample with a control sample Proximate and physicochemical properties were analysed by using AOAC methods. Data were analysed with MINITAB-19 version at 0.01 significance levels. The proximate analysis of jelly sample was done to determine moisture content, protein content, fat content, ash content, total sugar content, pH value and titratable acidity. The proximate analysis of sample PJ002 revealed 43.66% moisture content, 8.36% protein content, 0% fat content, 0.38% ash content, 90.33% total sugar content, 3.07 pH value and 3.03 titratable acidity. Hence, the sample number PJ002 has the overall best acceptance. The comparison of all microbial parameters (coliform, yeast, mould and total plate count) with the SLS standards for four weeks were below the SLS standards. Hence pomegranate based jelly product has a prolonged shelf life of four weeks under refrigerator conditions below 4^oc. Finally, based on the sensory, Proximate and microbial analysis, it can be concluded that pomegranate based jelly can be proposed as a product having consumer acceptability.

Keywords: Gracilaria seaweeds, Health benefited product, Jelly, Pomegranate