

ТЕЗИ ДЛЯ КОЛОКВІУМУ 2013

The use of by-products of wine-making in creating functional confectionery

Tetyana Kalinovska, Vira Obolkina

National food technologies university, Kiev, tk_88@ukr.net

The thesis is aimed at studying the concentration of pectin and phenol substances in grapes and in processed grapes products as well as at assessing the expediency of making them part of recipe as a valuable raw material for new kinds of confectionery.

The problem of low nutritive value of confectionery production is caused by poor content of biologically active components in it. The analysis of chemical composition of confectionery manufacture raw materials proves the expediency of using phytogetic substances.

From among the plant raw materials enriched by valuable nutritive and biologically active substances the grapes and processed grapes products can be noted.

After the grapes have been industrially processed into wine and juice plenty of secondary products are left. They constitute from 10 – 20% of the total amount of grapes being processed.

For the confectionery manufacture the husks of grapes and the grapes seeds are of primary interest since they serve as sources of biologically active substances: vitamins, macro- and microelements, phenol compounds, cellular tissue, organic acids. Besides, the most important components of grapes which are of major interest for the confectionery manufacture are pectin and polyphenol.

We have initiated certain research as for the application of the processed grapes products for saccharine confections. There was developed a technology for processing the husks of grapes which results in obtaining puree with high content of pectin, owing to partial destruction of protopectin contained in the cell membranes and in the intercellular walls of a grape.

The puree and the jam obtained from the husks of grapes can be used as the boilings filler and the filling for biscuit dough, for fondant confectionery production in order to improve its organoleptic properties and to extend the confectionery consumption expiration date, for foam type confectionery mass, for fruit and jelly candy centers, marshmallow and marmalade.

Thus, according to the research results, the application of processed grapes products enables creation of a new expanded range of confectionery production by means of use of natural colors, antioxidants, with higher nutritive and biological value and with unique organoleptic properties.

Keywords: grapes, processed products, confectionery