Diversification of the technology of juice making from black berry grape varieties with the utilization of increased biologically active substances

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Abstract
Juices obtained from grapes of black berry varieties, due to their high nutritional value, are increasing in demand, showing a trend of continuous growth in consumption. Grape juice assumes important nutritional and bioenergetic properties for the human body through the content of carbohydrates, organic acids, antioxidants, antioxidants. The food and hygienic values are due to the multiple components and properties with effects on the human body: alkalizing, mineralizing, vitaminizing and therapeutic-antioxidant with phenolic compounds, resveratrol and other biologically active substances. This research is focused on studying the processes of obtaining grape must through competitive achievements: the analysis of the intensive technological regime through thermal-processing in different regimes (for 10-20 minutes), the hydraulic (pneumatic) pressing of whole grapes and the separation of the pigmented red must in the production process. The technological results are presented, and the analysis of the influence factors: temperature, titratable acidity and the role of pH, dry substance content (% BRIX), polyphenols and chromatic parameters (CIELab) that ensure the improvement of the quality parameters and the production technology in the specific conditions for the region and the category given by the juices of the grapes with black berries. The perspective of applying the technology and optimal technological parameters paves the way for ensuring quality, diversifying the assortment, and ensuring juice stabilization during storage, bottling and preservation.

Keywords: Color indices, Processing technology, Quality parameters, Therapeutic properties.