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Evaluation of the quality of ICO beers

When conducting a quality examination of beers in accordance with the interstate standard, in addition to organoleptic indicators, special attention is paid to physico-chemical indicators, and these indicators are determined. It should be noted separately that in the interstate standard presented above, the physico-chemical indicators of beer are determined not by the brand names of the beers, but by the percentage of extractive substances contained in the initial slurry (slurry). According to this standard, with an increase in the amount of extractive substances contained in the initial suslo in brewing, the volume content of alcohol in beer, sourness, nutritional value, an increase in the amount of carbohydrates, respectively. But, the same requirements are imposed on beers for their extractivity, independent Ph indicator, mass contribution of SO2 gas, foaming, as well as color indicators. It should also be noted that this newly approved standard establishes separate requirements for organoleptic and physico-chemical indicators for leaking and dark beers. Table 38 below lists the requirements for the physico-chemical indicators of flowing beers.

In beer, ethyl alcohol is determined using a distillation method for the inability to measure the amount of ethyl alcohol directly using an alcohometer. For this, 200 g of beer is taken from the beer being tested and the alcohol is expelled in the driving apparatus. Then the relative density of the expelled fluid is found picnometrically. And the amount of alcohol corresponding to the relative density found is found using a special table.

Sourness is also an important indicator for beers. Beer sourness is understood as the amount of one normal alkali solution that can be used to neutralize the acids contained in 100 ml of beer. To do this, 50 ml of the beer

obtained for testing is measured and titrated with a solution of 0.1 N NaOH. The sourness of beer is caused by multiplying by 2 the indicator spent on titration and dividing by 10.

This indicator level also increases with an increase in the initial extractivity of Susla. For example, this figure should not be more than 2.5 for beers with an initial extractivity of 8 percent of the Susla as per standard requirement, 3.6 for beers with an initial extractivity of 15 percent of the Susla, and 5.0 percent for beers with 20 percent.

The interstate standard GOST 31711-2012 specifies that the Ph of the flowing beers is 3.8-4.8 for all types of beers, not dependent on the initial extractivity of the Susla, while the mass contribution of SO2 gas is not less than 0.40 percent.

Another of the indicators that are required to be determined in the standard for beers is the intensity of the color of the beer. To determine this indicator, a solution of iodine with a norm of 0.1 is used. For this

100 ml of beer is transferred to a chemical glass. And in the second glass, 100 ml of distilled water is placed and titrated with a solution of 0.1 normal iodine until it is equal to the color of the beer in the glass containing the beer. The amount of Iodine solution spent on bringing the color of 100 ml of distilled water to the color of the beer is represented by an indicator of the colorfulness of the beer.

As beer is among the whispering drinks, another of their important physicochemical indicators is the millimeter-count height of the foam that is formed when the beer is poured into special degustation bakals, and the stability of the foam in minutes. This indicator is set to be the same for all types of beers, not depending on the initial extractivity of the sauce, i.e. the height of the foam should not be less than 40 mm, and the stability should not be less than 3 minutes.

In addition to these, the nutritional value indicator is also included in addition to the physicochemical indicators of beers under the new standard requirement. Here, the nutritional value of beer includes such indicators as 100

g of its energy-giving capacity and 100 g of its carbohydrate content. As presented in Table 38 data, with an increase in the indicator of the initial extractivity of Susla, the indicator of the energizing power of 100 g of beer and the amount of carbohydrates in it also increases accordingly. For example, for beers with an 8 percent extractivity, 100 G has been shown to have an energizing capacity of 30 kilocalories and 100 g has a carbohydrate content of less than 3.5 g, while beers with an extractivity of 15 percent have been shown to have no less than 58 and 6.2, respectively.

As we have already noted, even for dark beers, the standard for physico - chemical indicators indicates exactly the requirements for leaky beers.

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