STUDY OF THE FATTY ACIDS COMPOSITION OF APRICOT (ARMENIACA VULGARIS L.) FRUIT OF THE VARIETY SHALAKH

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Introduction. "Pineapple" is one of the most popular varieties of apricot (*Armeniaca vulgaris L.*). However, this variety was first obtained in Yerevan (Armenia), where it is called Shalakh or Yerevanian. It has been cultivated throughout Armenia for many centuries. From there it was brought to other countries of the world.

Despite its great popularity the chemical composition, pharmacological properties and use of raw materials from its historical territory and the usual conditions of germination have not been studied before. Due to these climatic conditions the fruit of the Shalakh variety are large in size, have a unique taste and prospects for use not only as a food product. The fatty acid composition of the raw material was determined by gas-liquid chromatography with a flame ionization detector on a Shimadzu GC-2014B chromatograph. Chromatography conditions: 60 m × 0.25 mm HP-225 0.25 μ m capillary quartz column, stationary phase cyanopropyl-methylsiloxane (1:1), carrier gas (hydrogen) flow rate - 0.95 ml/min; sample volume - 0.5 μ L; flow division - 1: 40; the temperature of 160 °C was maintained for 3 minutes, then increased at a rate of 4 °C/min to 220 °C and maintained for 10 minutes; injector temperature - 240 °C, detector - 250 °C; solvent - cyclohexane. **Results and their discussion.** Fatty acids profile is presented at the Picture 1.





Apricot seeds are a source for obtaining the oil, which is used as a cosmetic and medicinal product for sunburn, allergies and has anti-inflammatory and reparative effects. These effects are mainly caused by the unique composition of fatty acids, in particular the high content of unsaturated fatty acids [1,2]. Probably, fruit should also be characterized by a high content of unsaturated fatty acids.





As a result of the study, 6 saturated fatty acids (lauric, myristic, palmitic, stearic, arachinic, behenic) and 5 unsaturated fatty acids (palmitoleic, oleic, vaccenic, linoleic, α -linolenic) were found in apricot fruit. Among them oleic acid and linoleic acid the highest content 40.18% and 35.10% respectively (Pict. 2).





The aim of this study was to investigate the fatty acid profile and the content of unsaturated fatty acids in the fruit of the apricot variety Shalakh.

Materials and methods. The object of the study was dried

Conclusion. The ratio of unsaturated fatty acids to saturated fatty acids of 4.6:1 suggests that the raw materials of the Shalakh apricot variety can be potential reparative, antioxidant and rejuvenating agents.

fruit of the common apricot variety Shalakh, collected and harvested on June in 2020 in the Armavir region (Armenia).

References

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The 9th International Electronic Conference on Medicinal Chemistry 01–30 November 2023 | Online