ASSESSMENT OF THE ANTIOXIDANT POTENTIAL OF WHITE, RED AND BLACK CURRANT (*Ribes*) SAMPLES

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In recent years, oxidative stress is one of the biggest causes of various pathological conditions like inflammation, cardiovascular and some neurological diseases. Numerous studies have shown that berry fruits which include white, red and black currants are a good source of bioactive compounds such as phenolic acids, tannins, anthocyanidins,flavan-3-ols, etc. These chemical compounds are also known as potentantioxidants and play a key role in quenching free radicals and protect cells from oxidative stress. In this study, the antioxidant activity of white, red and black currant fruits has been evaluated.

Extraction agents: 80% acetone and acidified (0.1% HCl) methanol

Extraction and mesuring of the antioxidant activity of the samples by DPPH radical scavenging assay.

Table 1. Obtained results of antioxidant activity of the samples

Samples	DPPH radical inhibition of acetone extracts	DPPH radical inhibition of acidified methanol extracts
white currant	86.09% ± 0.47	86.22% ± 0.28
red currant	76.61% ± 0.76	86.90% ± 0.19
black currant	12.50% ± 4.37	84.34% ± 1.05

Based on the high values of antioxidant activity of the samples it can be concluded that the consumption of currant fruits may potentially have a beneficial effect on human health and protecting cells from oxidative stress.

Acknowledgements: This work was supported by the Ministry of Education, Science and Technological Development of the Republic of Serbia, Contract number: 451-03-9/2021-14/200116.

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