

## **Neutron activation analysis in the assessment of marine pollution**

**Inga Zinicovscaia<sup>1,2</sup>, Dmitrii Grozdov\*<sup>1</sup>**

1 Joint Institute for Nuclear Research, Dubna, Russia

2 Horia Hulubei National Institute for R&D in Physics and Nuclear Engineering, Magurele, Romania

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A wide range of pollution, from heavy metals to microplastic, affects marine ecosystems. Neutron activation analysis (NAA) along with other analytical techniques is widely applied in the assessment of marine environment pollution. For long time NAA is used to determine the elemental composition of mussels considered as one of the most important biomonitors, which reflect the state of marine environment. Examples of the technique application in the determination of elemental composition of mussels collected in different zones of South Africa will be provided. Special attention will be given to approaches applied to assess the safety of mussels' consumption. Sponges, is another type of environmental indicators of water pollution. NAA was applied to assess the prospects of using Baikal endemic sponges as bioindicators of lake pollution by toxic elements.