

## **Ecosystem services and benefits in the context of environmental-economic accounting**

Nowadays, there is a strong need to promote sustainable development, which encompasses social, economic and environmental capitals. We estimate the size and value of social and economic capital using a variety of indicators. Natural capital, however, despite a general understanding for its value, is rarely characterized by monetary measures. The current approach to measure natural capital includes ecosystem service assessment and valuation methods. These methods do not always allow for the comparison of the valuation results between the three capitals. Therefore, the standardized and detailed framework is needed to integrate the valuation results with the system of national accounts.

In this project, we aim to explore the contribution of ecosystem services and benefits to local economy using the environmental-economic accounting approach. We will use the concept of ecosystem services, combine the results of the assessment and valuation of ecosystem services to the benefits that people perceive and attempt to assign these benefits to specific products and services present in the local economy.

The project develops methods of assessment and valuation of ecosystem services which could be integrated with the national accounts. The economic methods include, among others, the production function, cost methods such as replacement method, the method of travel costs and hedonic pricing. They will help us determine what is the share of the benefits of ecosystems in existing products and services that are recognized statistically in the national accounts.

In the project, we will use the latest scientific achievements and tools in the field of the SEEA System of Environmental and Economic Accounting. In particular, we will follow the guidelines from SEEA Experimental Ecosystem Accounting (SEEA-EEA). The SEEA-EEA constitute the standard, general guidelines for building satellite environmental-economic accounts. There is still need for further research on clarification and systematization of the relationship between ecosystems, their services, and the benefits and social well-being.

The environmental-economic accounts are important in progressing the assessment of the sustainability and socio-ecological systems and, therefore, supported United Nations or European Union. The main research gaps in this field were identified by the Forum of Experts in Advancing SEEA-EEA led by the UNSD in New York (2015). Our project addresses these gaps by conducting methodological research on links between ecosystem services, benefits and economic sectors as well as advancing this research with the public participation and perceptions.