METHODOLOGY FOR COST-BENEFIT ANALYSIS OF INVESTING IN NATURE-BASED SOLUTIONS

Posted on 05/06/2024 by Naider

Planning and deciding which nature-based solutions to invest in can be complex. Cost Benefit Analysis (CBA) provides a picture of the overall benefits of nature compared to the costs of the investment, making it easier to make decisions about such projects.

CBA is based on the economic concept of Net Present Value (NPV), which discounts future benefits and costs to their present value, so that they can be added to the initial investment made in the present to obtain the net result (benefit/loss) of the intervention. In the case of NbS, the specificity lies in the need to estimate the economic value of future benefits that do not have a clear and explicit valuation method (flood risk reduction, temperature regulation, carbon sequestration or recreational value, among others).

Funded by the European Commission, the four-year (2021-2025) <u>SCORE project</u> aims to support the adaptation of ten European coastal cities to climate change. It will design and test ecosystem-based solutions, specifically an Ecosystem-based Adaptation (EbA) approach, to harness the benefits of nature to address climate change impacts on communities, livelihoods, economies and people's well-being.

As part of work package seven of the SCORE project, NAIDER, in collaboration with ENT and TERO, has developed the CBA methodology for the evaluation of implemented and potential EbA interventions. The methodology will focus on the financial costs and benefits of CBAs, as well as their impact on ecosystem services (e.g. provisioning, regulating and cultural services), and will provide the necessary methodological framework to ensure the replicability of the analysis to other coastal urban areas. In addition, WP7 will formulate a set of policy recommendations to support decision making on climate change adaptation at local, national and EU level.