

Sharing and dissemination of environmental information

Country maturity report: Republic of Moldova Executive summary

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Implementation of the Shared Environmental Information System principles and practices in the Eastern Partnership countries (ENI SEIS II East)

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This report was produced by PricewaterhouseCoopers as part of the project for developing a roadmap and identify feasible and practical means for integrating environmental information in national e-governance/open data processes and platforms. This action is done in the context of the ENI SEIS II East project 2016-2020. The report was built in 2018 and updated throughout 2019, including a review in March 2019 after the first regional meeting in Kiev, and a second review after the roundtable in November 2019. The report was reviewed by public authorities in Moldova in January 2020.

This report contains information obtained or derived from a variety of publicly available sources described within the report in more detail and does not intend to be a comprehensive analysis of environmental information, open data and e-government in the country but a collection of the main elements shaping the national environmental information landscape.



Executive summary

The methodology followed to prepare the present report is based on the 2018 and 2019 European Union reports on open data maturity in Europe. Some adjustments were made to accommodate the specific situation of Eastern Partnership countries as well as the focus on environmental information.

The report was prepared and updated between 2018 and 2020 as part of the EU funded project implemented by EEA – ‘Implementation of the Shared Environmental Information System principles and practices in the Eastern Partnership countries (ENI SEIS II East)’. National input in the preparation of the report was ensured through broad dialogue and consultation with various public authorities and other stakeholders in the Republic of Moldova, in particular those related to the environment and statistics. In addition, experts across various policy domains, including IT and e-government, have been involved through participation in national and regional events. These activities allowed an exchange of views on the future of e-government and open data in the cross-cutting domain of the environment. As a result, the document presents an overview of the national e-government framework, the maturity level of open data and dissemination of environmental information in the Republic of Moldova. The analysis included the following:

- the policy framework was reviewed to identify existing strategic directions and available tools for the dissemination of environmental information by using open data and e-government solutions;
- the legal framework was analysed to determine the existing requirements related to e-government, open data and dissemination of environmental data and information;
- the technological solutions were assessed to determine the existing technical capabilities and improvements and/or adjustments needed in the future.

Based on the above, the document proposes a roadmap that includes measures focusing on the development of e-government and open data frameworks, which would greatly support the environmental domain and even beyond. The road map is designed to be a living document throughout the implementation process and to serve as a benchmark in assessing the progress at various stages of development.

E-government

In the past decade, the Republic of Moldova has been working to improve its governance framework, public administration efficiency, public service efficiency and the use of ICT in public authorities. The first step was made in 2011, when the Strategic Modernisation Programme for Technology of Governance (e-Transformation) was adopted, establishing the main objectives and measures for e-government transformation up to 2020. As the strategic objectives were planned up



to 2020, there is a need to evaluate the progress achieved in the area of e-government and, based on the results swiftly adopt a new strategic programme for the coming decade.

One of the key strategic objectives set-up in the Strategic Modernisation Programme for Technology of Governance was the development of the interoperability system¹. The main principles of interoperability framework were defined in the 2018 Law on Data Exchange and Interoperability. The law also defines the approach for cooperation between public and private sector in this area without addressing specific aspects such as interoperability standards and procedures.

To promote the data access and exchange between public authorities and the public, the country has developed the software solution. In 2014, the Interoperability Governmental Platform MConnect was launched to facilitate the exchange of data between the authorities and to increase the efficiency and delivery quality of public services. Currently, there are up to 50 public authorities that are using the MConnect, but data exchange with the public is still to be developed.

Open data

The Republic of Moldova has a strong policy and legislative framework related to the open data. In 2014, the country has adopted the Policy Concept on the Principles of Open Government Data that defines open data principles and aims to simplify the data identification procedure and standardise the publication of public government data according to a minimum set of requirements.

The main legal acts defining open data principles in the Republic of Moldova are the Law on Access to Information and the Law on Public Information Reuse. These legal acts identify the obligation for the public authorities to publish their data and regulates the main principles for reusing data and information of public authorities or other legal entities for both commercial and non-commercial purposes.

The Republic of Moldova has launched an Open Data Portal in 2011 to provide a single point of access to the open data. Most of the published datasets are in machine-readable format. In spite of this technological advancement, the population of the portal remains modest and uneven across domains. There is no significant progress in publishing new open data as the public authorities are not actively involved in the open data initiative. The number of datasets published remains comparably low (currently around 1120 datasets are available) and should be enhanced with new data including from the environment domain.

Environmental information sharing and dissemination

The existing environmental legislation promotes the access and dissemination of environmental information held by the public authorities. In particular, under Provision on Public Access to Environmental Information that was adopted by the government in 2016, environmental

¹ <http://lex.justice.md/viewdoc.php?action=view&view=doc&id=340301&lang=2>, section 4.8 inf the Strategic Modernisation Programme for Technology of Governance



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information shall be disseminated progressively and made available to the public by the usage of the national Open Data Portal in order to maximise, as far as possible, wide and systematic access and dissemination of this information. However, practical arrangements implementing environmental data management and dissemination procedures based on open data principles should further be defined in secondary legislation.

The Republic of Moldova remains one of the leading EaP countries in regularly producing and disseminating UNECE environmental indicators. Currently, the country is producing and disseminating all the indicators related to areas such as air pollution, climate change, land and soil, but additional effort needs to be invested in other thematic areas such as biodiversity and energy.

In the recent years, Moldova developed multiple portals for environmental information management and dissemination. The most advanced information system to access the environmental statistics in the country is “Statistical Databank” which is managed by the National Bureau of Statistics.

To streamline the development and implementation of the environmental information concept, the Integrated Environmental Information System (SIIM) framework has been in development since December 2019. The framework includes key goals and tasks, the basic characteristics, the functional aspects and the conceptual architecture of the integrated environmental information system.

Suggested recommendations

Following the analysis of the current situation, the proposed roadmap outlines key areas for future development in the field of e-government, open data and dissemination of environmental information, and provides concrete measures for improvement. Additionally, to facilitate the implementation of the roadmap, a number of examples and practical recommendations are provided in the report “Open data and e-government good practices for fostering environmental information sharing and dissemination”.

The success and rapid advancement of the country in this challenging domain remain strongly dependent on clear priority-setting, multi-disciplinary teamwork and regular monitoring of progress. Furthermore, once progress is made in one or several areas proposed for consideration, readjustments and amendments of the roadmap will be needed to keep it relevant and focused on the key priorities for the country.

The measures recommended for the Republic of Moldova in the context of the roadmap have been grouped into the following categories: policy-related, legal and technical measures. They cover, in particular, the following issues:

- Policy measures: focusing, among others, to the update of an e-government strategy, enhancement of open data awareness in public authorities and supporting practical arrangements for open data collection, updating, quality control and dissemination.



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- Legal measures: setting out, among others the responsibilities of the subordinate institutions under the Ministry of Agriculture, Regional Development and Environment in managing the integrated environmental information system (SIIM), and adoption of international standards for interoperability and metadata description;
- Technical measures: developing, among others, an integrated environmental information system and a single web access point for environmental information, updating licensing terms and conditions, preparation of metadata description and enhancing the multilingual aspect of web portals and websites in the area of the environment.

All of the measures need to be seen as strongly interacting with and interdependent of each other and the impact of their gradual implementation closely monitored, as it may bring systemic changes across the whole data and information chain.

It is also strongly recommended that a multidisciplinary team should be set up to address and oversee the implementation of all the above-presented measures. The Republic of Moldova has a good experience and practice in setting up cross-sectoral teams operating horizontally at a high level of decision. This experience should be continued and applied also in the field of open data and environmental information.

A specific recommendation for the Republic of Moldova is to increase the awareness about open data framework and ensure interoperability between statistical, environmental and open data information systems in legal, technical and institutional dimensions. In practice this recommendation could be achieved by implementing relevant actions set out in the roadmap and summarised below:

- Specific policy measures, which could cover setting a clear direction to promote publishing and using of open data in strategic documents as well as detailed methodological guidelines for open data preparation cycles;
- Specific legal measures, which could define dedicated roles and responsibilities in public authorities for open data management processes;
- Specific technical measures, which could target capacity building and awareness raising activities to improve the understanding of public authorities on how to technically prepare and maintain open data as well as what the benefits of the open data are.

The present report depicts the current status of e-government, open data and environmental information management and dissemination in the Republic of Moldova. Given the exponential development of this area and its recognition as a top policy priority for the near future, a regular update and analysis of the situation is strongly recommended.

