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INDUSTRIAL DEVELOPMENT ORGANIZATION

THE INNOVATION ECOSYSTEM OF MOLDOVA

REPORT PREPARED UNDER UNIDO COUNTRY
PROGRAMME FOR MOLDOVA 2019-2023

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EXECUTIVE SUMMARY

This report presents a preliminary analysis of the research and innovation ecosystem of Moldova. The study aims to inform and fine tune the foreseen actions related to innovation and industrial competitiveness under the Country Programming Framework (CPF) signed between the Republic of Moldova and UNIDO in December 2018 and whose goal is to advance Inclusive and Sustainable Industrial Development (ISID) in the country. The report is based on an examination of relevant studies and regulatory frameworks in Moldova and semi-structured interviews conducted to representatives of national institutions.

The study reviews key indicators to provide a comprehensive overview of the composition, operation and legal framework of the research and innovation system in Moldova. The report stresses that the research and innovation system in Moldova needs significant restructuring. The number of researchers in 2019 showed a downward trend while the average age of research staff continues to grow.

The report notes that, despite the recent policy reforms enacted, the country's innovation system is still in an incipient stage of development and argues that constant monitoring and evaluation of the policy frameworks are required to enhance the impact of the research and innovation on the industrialization and economic development of the country.

The analysis presented in this report allows identifying crucial national, regional and sectoral stakeholders in the innovation ecosystem as well as the functioning and orientation of the main support mechanisms and instruments in place for promoting industrialization and business development in Moldova such as Free Economic Zones, Industrial Parks, Clusters, Scientific and Technological Parks and business incubators.

Based on the key findings from the interviews process and a SWOT analysis conducted in Chisinau, Balti and Cahul, this report discusses regional and national challenges and opportunities for promoting an innovation-driven economy. It determines that there are inadequate communication and information sharing between key actors of the system; insufficient skills among the workforce for meeting the international labour market demands; and that there are still limited institutional capacities for promoting research and innovation.

An examination of the statistics and current trends in the adoption of digital technologies in Moldova shows that the country still has a low transition level towards the Fourth Industrial Revolution (4IR). However, the study also reveals that Moldova has good adoption readiness spearheaded by infrastructure developments such as the extensive fibre optic and mobile networks coverage. The report concludes with a series of recommendations to maximize the country's innovation potential.

LIST OF ABBREVIATIONS

● FOURTH INDUSTRIAL REVOLUTION.....	4IR
● ADVANCED PRODUCTION TECHNOLOGIES.....	ADP
● ASSOCIATION OF INFORMATION AND COMMUNICATION TECHNOLOGY COMPANIES.....	ATIC
● ARTIFICIAL INTELLIGENCE.....	AI
● COUNTRY PROGRAMMING FRAMEWORK.....	CPF
● FREE ECONOMIC ZONE.....	FEZ
● INFORMATION AND COMMUNICATION TECHNOLOGIES.....	ICT
● INTERNET OF THINGS.....	IoT
● MINISTRY OF AGRICULTURE, REGIONAL DEVELOPMENT AND ENVIRONMENT.....	MARDE
● MOLDOVA COMPETITIVENESS PROJECT.....	MCP
● MINISTRY OF EDUCATION CULTURE AND RESEARCH.....	MECR
● MINISTRY OF ECONOMY AND INFRASTRUCTURE.....	MEI
● NATIONAL AGENCY FOR RESEARCH AND DEVELOPMENT.....	NARD
● ORGANIZATION FOR DEVELOPMENT OF SMALL AND MEDIUM ENTERPRISES.....	ODIMM
● SMALL AND MEDIUM-SIZED ENTERPRISE.....	SME
● SCIENCE, TECHNOLOGY, ENGINEERING, AND MATHEMATICS.....	STEM
● SCIENCE AND TECHNOLOGY PARKS.....	STP
● STRENGTHS, WEAKNESSES, OPPORTUNITIES AND THREATS.....	SWOT
● RESEARCH AND DEVELOPMENT.....	R&D
● VALUE ADDED TAX.....	VAT
● VIRTUAL REALITY.....	VR

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1. INTRODUCTION

*“UNIDO is determined to make the CPF for Moldova a success,
building on past achievements in the country”*

LI Yong, Director General of UNIDO

On December 21st 2018, the Republic of Moldova signed with UNIDO the first Country Programming Framework (CPF) for inclusive and sustainable industrial development covering the period 2019-2023. The CP had been developed to contribute to the achievement of the inclusive and sustainable industrial development agenda of Moldova through dedicated development activities, addressing three components:

- I Enhanced industrial competitiveness, market access, innovation and investment promotion;
- II Productive employment for rural communities and entrepreneurship development;
- III Sustainable energy and environmental management.

The CPF is fully aligned with the priorities set out in Moldova’s National Development Strategy and builds on the achievements of previous projects and programmes. As industrialization is a long-term endeavour involving many stakeholders, the focus is set to be on strengthening synergies by collaborating with development cooperation partners, state and non-state actors, including the private sector.

With the CPF for Moldova, UNIDO aims to provide support for the Government’s efforts towards improving the overall competitiveness of the economy, increasing industrial productivity, stimulating entrepreneurship, and encouraging knowledge and innovation through capacity development and the adoption of international standards as well as the use of best practices. The overarching goal is full integration of Moldova into the European Union’s market and global value chains.

The CPF aims to enhance industrial competitiveness, market access, innovation and investment promotion. Through this component, it is expected that priority industry subsectors be well integrated into the European and global value chains.

In November and December 2019, a UNIDO mission to Moldova was organized that saw extended consultations with representatives of the Ministry of Economy and Infrastructure (MEI) and other stakeholders regarding the launch of CPF. During the discussions, the development of a project proposal aiming to strengthen the linkages between research and industry has been identified as a priority for the country.

Therefore, a project concept note has been prepared by UNIDO with the overall objective of increasing industrial competitiveness, creating jobs and promoting innovation-driven economic development in

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