



## North Macedonia Public Sector Energy Efficiency Project (P149990)

EUROPE AND CENTRAL ASIA | North Macedonia | Energy & Extractives Global Practice |  
IBRD/IDA | Investment Project Financing | FY 2020 | Seq No: 5 | ARCHIVED on 22-Jun-2022 | ISR51462 |

Implementing Agencies: Ministry of Finance, North Macedonia

### Key Dates

#### Key Project Dates

Bank Approval Date: 30-Jan-2020

Effectiveness Date: 12-May-2021

Planned Mid Term Review Date: 16-Oct-2023

Actual Mid-Term Review Date:

Original Closing Date: 30-Sep-2025

Revised Closing Date: 30-Sep-2025

### Project Development Objectives

Project Development Objective (from Project Appraisal Document)

The Project Development Objectives are to: (i) reduce energy consumption in the public sector; and (ii) support the development and implementation of a sustainable financing mechanism for energy efficiency in the public sector.

Has the Project Development Objective been changed since Board Approval of the Project Objective?

No

### Components Table

Name

Energy efficiency investments in the public sector:(Cost \$19.80 M)  
Technical assistance and implementation support:(Cost \$2.10 M)  
Initial capital for the proposed Energy Efficiency Fund.:(Cost \$5.50 M)

### Overall Ratings

Name	Previous Rating	Current Rating
Progress towards achievement of PDO	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Satisfactory
Overall Implementation Progress (IP)	<input type="checkbox"/> Moderately Satisfactory	<input type="checkbox"/> Moderately Satisfactory
Overall Risk Rating	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate

### Implementation Status and Key Decisions

The first Call for Proposals (CfP) was advertised by the PIU on May 14, 2021, and the deadline for applications was July 14, 2021. After the closing date of the first CfP, The PIU received applications for 65 subprojects from 17 municipalities. The PIU has completed the screening of for these projects.

On April 8, 2021, the Ministry of Health (MOH) submitted to the PIU a list of 30 health buildings that were most dilapidated and had higher energy consumption. After screening this initial list, 27 buildings were shortlisted that meet the project criteria. Following a seismic screening by the Institute of Earthquake Engineering and Engineering Seismology (IZIIS), 18 buildings were further shortlisted to proceed with project preparation.

Furthermore, the PIU signed a contract with a consulting firm in February 2022, to support the government in the establishment and operationalization of the Energy Efficiency Fund.



**Risks**

**Systematic Operations Risk-rating Tool**

Risk Category	Rating at Approval	Previous Rating	Current Rating
Political and Governance	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Macroeconomic	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Sector Strategies and Policies	<input type="checkbox"/> Substantial	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Technical Design of Project or Program	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Institutional Capacity for Implementation and Sustainability	<input type="checkbox"/> Substantial	<input type="checkbox"/> Substantial	<input type="checkbox"/> Substantial
Fiduciary	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Environment and Social	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate
Stakeholders	<input type="checkbox"/> Low	<input type="checkbox"/> Low	<input type="checkbox"/> Low
Other	<input type="checkbox"/> Moderate	<input type="checkbox"/> Substantial	<input type="checkbox"/> Moderate
Overall	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate	<input type="checkbox"/> Moderate

**Results**

**PDO Indicators by Objectives / Outcomes**

Reduction of energy consumption in the public sector and establishment of EE Fund				
► Establishment and operationalization of an EE Fund (Text, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	No Energy Efficiency Fund for public sector	No Energy Efficiency Fund for public sector	No Energy Efficiency Fund for public sector	EE Fund is established and operationalized
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator aims to track progress in operationalization of the EE fund including: (i) establishment of a legal entity and institutional setup of the EE fund; (ii) Operating procedures, investment and staffing plan adopted by the Fund's Board of Directors and approved by the Bank, fund operation unit established; and (iii) development of pipeline, initial audits and technical design etc.			
► Projected lifetime energy savings from EE investments in the public sector (Mega Joules (MJ), Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	2,454,434,000.00



Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator monitors projected energy savings achieved from all subprojects in the lifetime period of 20 years. Baseline value is zero.			

### Intermediate Results Indicators by Components

Energy efficiency investments in the public sector				
▶ Associated CO2 emissions reductions as a result of the energy savings (Metric ton, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	235,896.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator projects lifetime GHG emissions that are avoided by energy efficiency measures supported under the project. the savings are calculated for the number of subprojects commissioned each year, based on the technical M&E reports and using the CO2 content of the fuel used. baseline value is zero.			
▶ Energy cost saving from EE measures (EURO) (Number, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	3,851,705.00
Date	31-Dec-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator projects annual energy cost savings (in EURO) resulting from EE investments made under the project.			
▶ Associated particulate matter (PM) emission reductions as a result of the investments (Metric ton, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	69,997.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	The total lifetime avoided PM emissions equivalent from EE investments made under the project, using the grid emissions factor in North Macedonia for electricity and particle content for other fuels saved (e.g., light fuel oil, firewood, coal).			
▶ Number of subprojects completed (Number, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	103.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator measures progress in selecting and implementing subprojects.			



► Number of buildings renovated with energy performance certificates of class C or higher (Number, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	101.00
Date	31-Dec-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	As per North Macedonian building regulations, all renovated buildings must be certified in compliance with energy performance certificates of class C. As with all building renovation projects in ECA region, subproject baselines are adjusted to account for heating of buildings to meet national norms of 20 -22 Celsius degree.			
► Direct project beneficiaries (Number, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	96,892.00
Date	31-Dec-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	Direct beneficiaries are people or groups who directly derive benefits from a renovated building subproject.			
► Female beneficiaries (Percentage, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	50.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	Based on the assessment and definition of direct project beneficiaries, specify what proportion of the direct project beneficiaries are female. This indicator is calculated as a percentage.			
► Increase in enduser satisfaction in renovated buildings (Percentage, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	90.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator measures change in end-user satisfaction before and after retrofitting of selected municipality buildings through targeted social surveys among direct project beneficiaries. the change is measured as percentage increase in the number of survey respondents that are satisfied with overall comfort levels in the building.			

Technical assistance and implementation support				
► Number of energy auditors, technical designers, constructors, supervisors trained (Number, Custom)				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	100.00



Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator measures the increase in capacity of technical staff for municipal energy efficiency subprojects.			
<b>► Number of female technical staff trained (Number, Custom)</b>				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	50.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	Specify what proportion of the trained energy auditors, technicians, construction supervisors are female.			
<b>► Female staff hired under service contracts for technical and design work under the Project (Percentage, Custom)</b>				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	20.00	20.00	20.00	30.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator tracks the progress of female staff hired under service contracts for technical and design work			
<b>► Users committee members satisfied with the renovation consultation processes (Percentage, Custom)</b>				
	Baseline	Actual (Previous)	Actual (Current)	End Target
Value	0.00	0.00	0.00	90.00
Date	31-Oct-2019	22-Nov-2021	24-May-2022	31-Dec-2025
Comments:	This indicator tracks the progress on citizen engagement during construction and post construction phases of the subprojects user committee will be formed prior to the selection of buildings and stakeholder consultations will be carried out via the committee to monitor and provide feedback to subprojects.			

### Performance-Based Conditions

#### Data on Financial Performance

##### Disbursements (by loan)

Project	Loan/Credit/TF	Status	Currency	Original	Revised	Cancelled	Disbursed	Undisbursed	% Disbursed
P149990	IBRD-90380	Effective	USD	27.40	27.40	0.00	0.43	27.00	1.6%

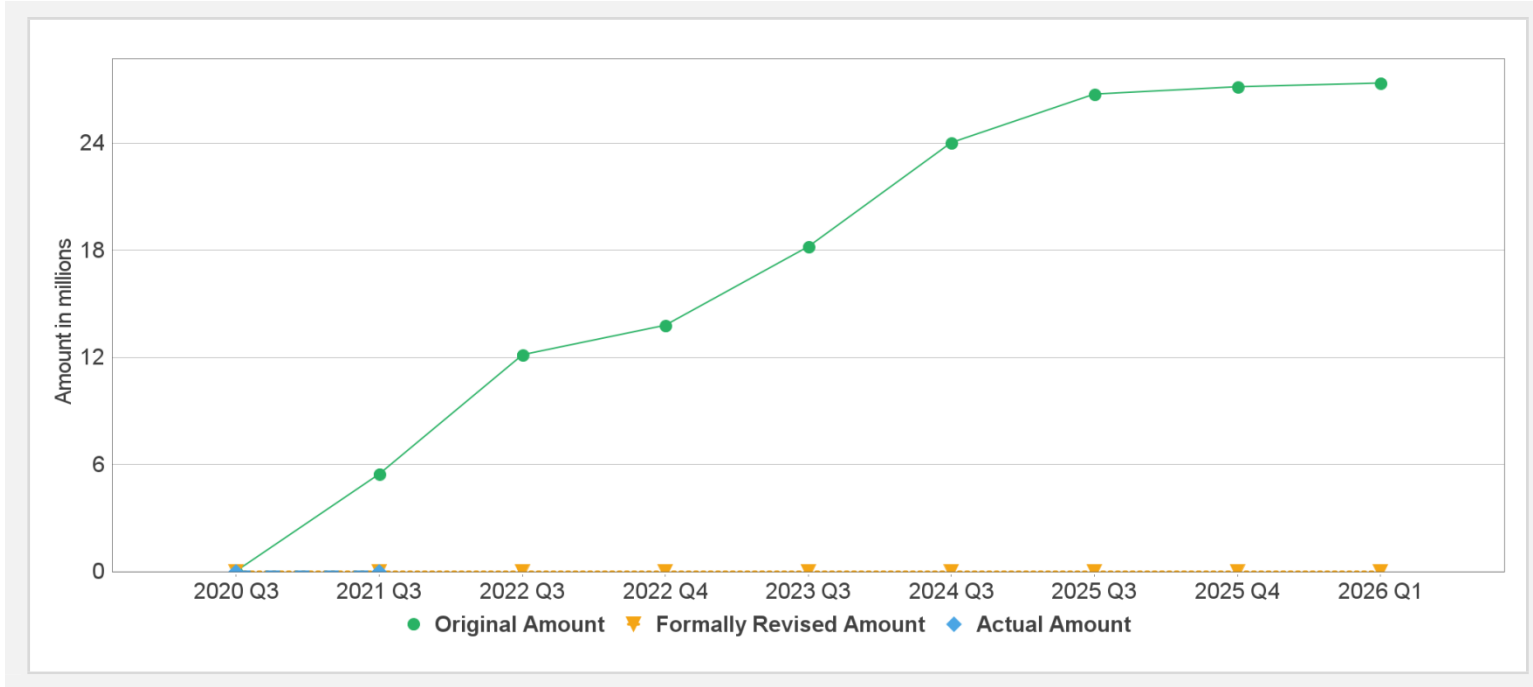
##### Key Dates (by loan)

Project	Loan/Credit/TF	Status	Approval Date	Signing Date	Effectiveness Date	Orig. Closing Date	Rev. Closing Date
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P149990	IBRD-90380	Effective	30-Jan-2020	27-Apr-2021	12-May-2021	30-Sep-2025	30-Sep-2025
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**Cumulative Disbursements**



**Restructuring History**

There has been no restructuring to date.

**Related Project(s)**

There are no related projects.