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CENTRAL & EASTERN EUROPEAN SUSTAINABLE ENERGY NETWORK · CEESEN-BENDER

CEESEN-BENDER

Building intErventions in vulNerable Districts against Energy poveRty

Deliverable 3.1

Report on building renovation barriers in regulatory framework in Slovenia

Dissemination Level: Public

WP3 Tackling the barriers hindering building related interventions in vulnerable districts

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Table of contents

1. Background of the CEESEN-BENDER project 1
2. Relevance of this deliverable 1
3. Introduction 3
4. Methodology 4
5. Regulatory and policy barriers to energy renovations of MABs in Slovenia 5
5.1 Targets 8
5.2 Measures 9
5.3 Implementation and monitoring 10
6. Barriers related to public calls to energy renovations of MABs in Slovenia 13
6.1 Efficiency of public calls 14
6.2 Application processes and eligibility criteria 15
6.3 Renovation activities and co-financing rates 16
6.4 Energy poverty 17
7. Policy recommendations for improvements of national regulatory framework 18
Annex 1 21
Annex 2 23
Annex 3 25

1. Background of the CEESEN-BENDER project

The main goal of "Building intErventions in vulNerable Districts against Energy poveRty" (i.e. CEESEN-BENDER) project, launched on September 1, 2023, is to empower and support vulnerable homeowners and renters living in Soviet-era multi apartment buildings in 5 CEE countries: Croatia, Slovenia, Estonia, Poland, and Romania. The project will help them through the renovation process by identifying the main obstacles and creating trustworthy support services that include homeowners, their associations, and building managers.

Coordinated by Society for Sustainable Development Design (DOOR), the CEESEN-BENDER project brings together leading European researchers and experts in the field from six countries: Croatia (Society for Sustainable Development Design / DOOR, Medjimurje Energy Agency Ltd. / MENEA, EUROLAND Ltd. / Euroland, GP STANORAD Ltd. / GP STANORAD), Estonia (University of Tartu / UTARTU, Tartu Regional Energy Agency / TREA, The Estonian Union of Co-operative Housing Associations / EKYL), Slovenia (Local Energy Agency Spodnje Podravje / LEASP), Romania (Alba Local Energy Agency / ALEA, Municipality of Alba Iulia / ALBA IULIA), Poland (Mazovian Energy Agency / MAE, Housing Cooperative "Marysin Wawerski" / SM Marysin Waw), Germany (Climate Alliance) in addition to Central Eastern European Sustainable Energy Network (CEESEN).

The CEESEN-BENDER project is carried out from September 2023 until August 2026 and has a total budget of €1,85 million, of which €1,75 million is funded from the European Union's Programme for the Environment and Climate Action (LIFE 2021-2027) under grant agreement n° LIFE 101120994. The project is being carried out by internationally recognized researchers and partners from Society for Sustainable Development Design, University of Tartu, Local Energy Agency Spodnje Podravje, Alba Local Energy Agency, Climate Alliance, Medjimurje Energy Agency Ltd., Mazovian Energy Agency, Tartu Regional Energy Agency, Municipality of Alba Iulia, Central Eastern European Sustainable Energy Network. In addition, associated partners of the project include Housing Cooperative "Marysin Wawerski", EUROLAND Ltd., GP STANORAD Ltd. and The Estonian Union of Co-operative Housing Associations.

2. Relevance of this deliverable

This policy brief summarises the results of the analysis of relevant national regulations regarding the building renovations related to the energy poor households in Slovenia. This analysis of Slovenia regulatory and policy frameworks regarding the renovation of multiapartment buildings is a crucial step among many needed to enhance energy efficiency of Slovenia's building stock and alleviate energy poverty in the country. By critically studying the content and achievements of national policies and regulatory measures, this analysis provides insights into how Slovenia can better align with broader EU goals and enhance its contribution to reducing energy consumption and greenhouse gas emissions in the residential building sector. Given that a significant portion of the residential sector in Slovenia is made up of MABs, improving their energy performance is essential in contributing to the achievement of EU energy efficiency targets. This policy brief aims to highlight the successes and shortcomings of existing policies and regulations, offering guidance for future legislative, policy and financial efforts to ensure renovations in Slovenia are both widespread and impactful.

Considerations stemming from such evidence-based recommendations are vital for addressing the specific challenges of energy renovations and energy poverty in Slovenia. The findings of the analysis were the basis of specific policy recommendations for policy actors and relevant decision-makers in Slovenia to improve future programs, policies, and legislation, ensuring efficient and targeted resource allocation and priority setting. Moreover, while improving energy performance in MABs can reduce overall energy consumption and emissions, it also significantly enhances living conditions for a large segment of the population. Addressing energy poverty in these buildings supports social equity in the country and improves the quality of life for vulnerable households, contributing to Slovenia's social and economic resilience.

CEESEN-BENDER partners identified the following barriers to energy renovations of MABs and the consequential energy poverty alleviation in MABs in Slovenia.

Summary of **REGULATORY AND POLICY BARRIERS:**

- Although financial incentives and programs are available, navigating these options can be complex and not all residents may be eligible or aware of them
- While the law sets out energy efficiency standards, enforcement mechanisms may be weak, leading to inconsistent compliance across MABs
- The policy instruments may not provide enough incentives or support for residents and homeowners to invest in energy efficiency improvements, especially when immediate financial benefits are not apparent
- There may be technical and regulatory limitations on the grid's capacity to accommodate distributed renewable energy generation from MABs
- The regulation may lack clear guidelines on how maintenance work should be carried out in MABs, particularly concerning energy efficiency upgrades and renewable energy system installations.

Summary of **BARRIERS RELATED TO PUBLIC CALLS FOR ENERGY RENOVATIONS OF MABS:**

- Insufficient data and transparency
- Complex application processes
- High initial costs and limited financial incentives
- Eligibility and co-ownership requirements
- Lack of targeted support for energy-poor households
- Insufficient focus on renewable energy integration

Based on these barriers, CEESEN-BENDER partners identified the following **policy recommendations** for greater energy renovations and energy poverty alleviation in MABs in Slovenia:

1. Establish a Centralized Energy Data Platform;
2. Simplify and Streamline Application Procedures for MABs in Slovenia;
3. Support Collective Financing Mechanisms;
4. Weighted Voting Systems;
5. Outreach and Awareness Campaigns;

6. Enhance Focus on Renewable Energy Integration.

3. Introduction

Globally, buildings account for a significant portion of energy consumption and greenhouse gas (GHG) emissions, making their renovation a critical component in the transition to a low-carbon economy. According to the Intergovernmental Panel on Climate Change, in 2019, the building sector accounted for 12 GtCO2-eq of greenhouse gas emissions, representing 21% of global emissions. These emissions comprised 57% from indirect CO2 sources like electricity generation, 24% from direct on-site CO2 emissions, and 18% from cement and steel production for building construction. Considering only CO2 emissions, buildings contributed 31% globally. Energy use in buildings, with residential and non-residential sectors contributing 70% and 32% respectively to global final energy demand, highlighted a significant increase in global CO2 emissions and energy demand from 1990 to 2019, particularly in electricity, which rose by 161%.[1]

In the context of GHG emissions reduction, the EU has set binding targets under the Climate Target Plan 2030 and the Fit for 55 package. The aim is to reduce GHG emissions by at least 55% by 2030 compared to 1990 levels. Buildings are responsible for approximately 40% of the EU's energy consumption and 36% of its GHG emissions, and according to 2020 data, a staggering 75% of the total housing stock, of which over a third (35%) was built before 1970, is classified as energy inefficient.[2] Thus, energy renovations[3] of multi apartment buildings (MABs) are central to achieving the EU's energy efficiency targets, addressing energy poverty, and contributing to the broader climate change mitigation and adaptation efforts. Official EU strategies and documents, such as the Renovation Wave strategy, the Climate Target Plan, and the Fit for 55 package, outline the pathways and targets for building renovations and their role in the EU's climate and energy policies.

Renovating existing buildings could reduce overall energy consumption in the EU by 5-6% and lead to a decrease in carbon dioxide emissions by approximately 5%. Despite this potential, the average annual renovation rate of the EU building stock is less than 1%, with member states' renovation rates ranging from 0.4% to 1.2%. Furthermore, households or the residential sector accounted for 27% of final energy consumption in the EU in 2021, which is 18.6% of the EU's gross inland energy consumption. The EU's Renovation Wave strategy, part of the European Green Deal, aims to at least double the annual energy renovation rate of residential and non-residential buildings by 2030. This initiative targets the renovation of 35 million buildings over the next decade, with a particular focus on improving the energy performance of MABs where energy poverty

[1] IPCC, Chapter 9: Buildings, accessed 10.07.2024, https://www.ipcc.ch/report/ar6/wg3/chapter/chapter-9/

[2] *European Commission – Department: Energy – In focus*, accessed 10.7.2024., https://commission.europa.eu/document/download/65660913-cecb-4f2f-b34c-c9bbf9bed1af_en?filename=in_focus_energy_efficiency_in_buildings_en.pdf

[3] Energy renovation of a building involves various technical operations and processes aimed at enhancing the building's energy efficiency. This includes conducting an energy audit and obtaining an energy certificate, creating project documentation to demonstrate energy savings, improving thermal insulation of external parts like walls and roofs, and replacing external joinery. It also involves upgrading technical systems, such as heating, cooling, ventilation, air conditioning, hot water preparation, and lighting systems. Additionally, the process may include integrating renewable energy sources, such as solar panels and heat pumps.

is often pronounced. Energy poverty affects millions of EU citizens, leading to inadequate heating, cooling, and overall poor living conditions. Countries of Central and Eastern Europe (CEE) face unique challenges in this regard, including older building stock, lower energy performance, and higher rates of energy poverty.

In Slovenia, multi-apartment buildings (MABs) make up a significant portion of the housing stock, with around 30-35% of the total residential buildings falling under this category, based on the usable area of heated sections. Approximately 55% of these MABs are located in central and eastern Slovenia, where the climate is more continental. A significant portion of these buildings, nearly 60%, were constructed before 1980, before the enforcement of comprehensive energy consumption standards for buildings. These older buildings typically consume 180-220 kWh/m² of thermal energy annually for heating. However, implementing energy efficiency measures can reduce this consumption to around 50-70 kWh/m². Available data also suggests that over 80% of these buildings do not comply with the post-1985 energy regulations, leading to substantial heat loss and making MABs among the least energy-efficient structures in the country. Furthermore, nearly 35% of all owner-occupied dwellings were constructed before 1960, and about 55% were built before 1970. From the point of view of the building stock with the worst energy efficiency, more than 40 % (around 100.000) are single-apartment buildings with an energy class F or G. These buildings were built mostly before 1980. The proportion indicates the scale of households with high energy consumption for heating and related costs. The share of such MABs is about 8% or about 24,000 households.

4. Methodology

The purpose of this policy brief is to provide evidence-based guidelines that support a more targeted and widescale energy renovations of MABs in the national context while simultaneously tackling issues of energy poverty of households living in these buildings. This is to be achieved through greater understanding of existing regulatory and policy barriers concerning these overarching goals. Evidence-based policy recommendations based on such an analysis has considerable potential to support decision makers in future improvement of regulatory frameworks and to better support building related interventions in vulnerable districts. Thus, **the aim of this analysis is to identify and analyse relevant national regulations regarding the building renovations related to the energy poor households** in pilot countries. This policy brief will aid in the assessment of such barriers in the wider context of the CEESEN-BENDER project, on the national level, and in the context of CEE countries through a synthesized CEE report.

To understand said regulatory and policy barriers the CEESEN-BENDER project partners first identified publicly available national documents (strategies, policies, laws, statues of cooperatives, etc.) which are most relevant for defining the existing policy and regulatory framework of energy renovations of MABs and energy poverty alleviation in MABs within their country. Also, all previous public calls related to energy renovations of MABs in each country were also identified, along with the conditions, results, and other key aspects of these public calls contained in separate documentation that was publicly available. The content of these documents was analysed by the project partners through three separate research instruments developed and shared by the TL, along with the instructions on how to utilize said instruments for data collection.

Concerning the policy and regulatory framework analysis, two instruments were developed, while one instrument was developed exclusively for the purpose of collecting data referring to the afore mentioned public calls for renovations of MABs.

The first out of the two instruments regarding policy and regulatory barriers included a total of 27 questions. Specifically, it contained 14 close-ended questions with predetermined multiple-choice answers defined by the TL, and 13 open-ended questions were the researcher had to provide a list in the form of bullet-points or had to input a specific numeric or qualitative value. The questions were structured into the following four segments: General information; Energy renovations of MABs; Energy poverty in MABs; Citizen's energy in MABs. This instrument, collecting more basic and descriptive information was supplemented with an instrument containing a total of ten questions and additional sub question grouped into three distinct segments of said barriers and which can most broadly be defined as: Targets; Measures; and Implementation & Monitoring. This second phase of the analysis has been conducted by collecting the requested data in the form of answers to questions provided by the TL. This resulted in qualitative data in the form of written answers to the questions on topics relevant for identifying legislative and policy barriers on a national level. Such answers represented broader reflections on the findings in the first phase and their synthesis with previous understandings and experience of the researcher regarding the energy renovation of MABs and energy poverty alleviation in MABs.

5. Regulatory and policy barriers to energy renovations of MABs in Slovenia

This policy and regulatory framework analysis covered the total of five official publicly available documents that were deemed as more or less relevant for defining the current national regulatory and policy framework for energy renovations of MABs in Slovenia and energy poverty alleviation in MABs in Slovenia. Some general information gathered within this first step of the analysis sheds light on the recency of these legislations and policies, as well as their status, overall summations of their primary and secondary subject areas, and key stakeholders of the policy or regulation which are explicitly mentioned within the document itself or indirectly referred to. Table 1. brings an overview of these documents with the previously mentioned general information and a hyperlink to each of the analysed documents.

Table 1. **General information** on the analysed documents outlining Slovenia's regulatory and policy framework for energy renovations of MABs.

Legislation/policy	Year of publication	Subject area (Primary & Secondary)	Source	Version	Key stakeholders
Energy Act (EZ-2)	2024	Energy & energy renovations	https://pisrs.si/pregledPredpisa?id=ZAKO8855	Final	Low-income population groups or households
Law on Effective use of energy (ZURE)	2020	Energy & buildings	https://pisrs.si/pregledPredpisa?i	Final	Energy market actors

			d=ZAKO8136		
Act on the Promotion of the Use of Renewable Energy Sources (ZSROVE)	2021	Renewable resources & energy renovations	https://pisrs.si/pregledPredpisa?id=ZAKO8236	Final	Beneficiaries of financial incentives for the use of renewable energy sources are natural persons and legal entities, including public sector persons, with the exception of direct users of the state budget
Electricity Supply Act (ZOEE)	2021	Energy & energy poverty	https://pisrs.si/pregledPredpisa?id=ZAKO8141	Final	Citizens
Act on Aid to the Economy to Mitigate the Consequences of the Energy Crisis (ZPGOPEK)	2022	Energy & energy crises	https://pisrs.si/pregledPredpisa?id=ZAKO8737	Final	Citizens

In Slovenia, the adoption of energy efficiency and renewable energy solutions in MABs faces several challenges. Although financial incentives and programs are available, their complexity and the lack of awareness among residents limit their effectiveness. Additionally, weak enforcement of energy efficiency standards and insufficient incentives for investment hinder consistent compliance and adoption, while technical and regulatory constraints on the grid and unclear maintenance guidelines further complicate the integration of renewable energy systems. Addressing these barriers is crucial for advancing sustainable energy practices in MABs.

In Table 2. The collected data is displayed concerning various aspects of energy renovations of MABs regarding the analysed legislative and strategic framework. Specifically, the results bring an overview of defined **quantitative targets**, renovation **measures** and **financial sources** for the implementation of such measures defined in the analysed documents. Additionally, the analysis ascribed a self-assessed ranking of relevance concerning each reviewed document so that the displayed results could be put into a wider legislative and policy context and their (lack of) legislative or policy impact on that specific aspect evaluated accordingly. The table brings a summation of identified targets in their corresponding units, measures to achieve those goals, financial resources needed to achieve them and sources of such financing. The assessed documents assessed with (current) low impact to the energy renovations are excluded from Table 2.

Table 2. Overview of quantitative targets, measures, financial scope, and sources of financing of measures concerning **energy renovation of MABs in Slovenia** within the analysed documents.

Legislation/policy	Targets (unit)	Measures	Financial scope (EUR)	Financial source	Impact
Action plan for the reduction of energy poverty for a period of three years (2024 – 2026)	Reduction of the share of energy-poor households to a maximum	(financial)Implementing subsidies and grants for energy efficiency upgrades in homes of low-income families, such as insulation, efficient heating systems, and energy-efficient appliances.	48 million EUR 33,8 mio. EUR for 2024-2026 14,2 mio. EUR for 2027 -2029	Climate Change Fund and ERDF	High

	value between 3.8 and 4.6%.	approximately 1 million euros from the EE contribution (the amount of the contribution changes with the definition in the NEPN) for joint measures in the energy renovation of multi-apartment buildings			
Act on Aid to the Economy to Mitigate the Consequences of the Energy Crisis (ZPGOPEK)	No	No	No	National and EU Funds	Medium
A long-term strategy to promote investments in the energy renovation of buildings – DSEPS 2050	74% energy renovated by 2050 single-apartment and 91% MABs and 16.914 m2 MABs will be renovated.	(technical) Reduction of greenhouse gas emissions in buildings by at least 70 percent by 2030 compared to 2005	565.7 million EUR.	Eco Fund.	Medium

All the identified policy and legislation were also analysed regarding measures, financial scope and sources of financing for energy poverty alleviation in MABs. Table 3. displays the collected data regarding these aspects. Again, the documents with self-assessed low relevance on the energy alleviation in MABs are excluded from Table 3.

Table 3. Overview of measures, financial scope and sources of financing of measures concerning **energy poverty alleviation in MABs in Slovenia** within the analysed documents.

Legislation/policy	Measures	Financial scope (EUR)	Financial source	Impact
Law on Effective use of energy (ZURE)	(financial) Implementation of state policy in the field of energy efficiency.	No	Eco Fund, National Funds	High
Energy Act (EZ-2)	(technical) Ensure a competitive, safe, reliable and accessible supply of energy and energy services, taking into account the principles of sustainable development.	No	No	Medium
Electricity Supply Act (ZOEE)	(technical) Grid Infrastructure Improvements: Enhancing the efficiency and reliability of the electrical grid.	No	No	High
Act on Aid to the Economy to Mitigate the Consequences of the Energy Crisis (ZPGOPEK)	(financial) The government prescribes criteria for defining and evaluating the number of energy-efficient households, such as material vulnerability, a large share of energy expenditure from disposable income, exceeding the average share of energy expenditure	No	National and EU Funds	Medium
Action plan for the reduction of energy poverty for a period of three years (2024 – 2026)	Main measures: - Investment incentives for EE measures and the use of RES for the energy poor - Energy consulting for the energy poor	The necessary funds for the implementation of the action plan for the period 2024–2026 are	Climate Change Fund and ERDF	High

	- Informing and raising awareness of the energy poor - Other measures - Cooperation in energy communities	estimated at 33.8 million euros		

The last segment within this phase of the analysis refers to citizens energy in MABs. When looking at only those policies and legislation that reference establishing a citizen energy initiative in any form (e.g. energy communities or RES communities), only three documents mention such initiatives in the context of MABs. Table 4. Identifies these documents as well as the types of citizen energy initiatives mentioned.

Table 4. Overview of collected data on the type of **citizen-led energy initiatives in the context of MABs** referenced in the analysed documents.

Legislation/policy	Types of citizen-led energy initiatives referenced	Impact
The Law on Effective use of energy (ZURE)	One stop shop for RES projects is the activity of the electricity market operator, which includes the tasks of the commercial public service of the market operator's activities, as determined by the law governing the supply of electricity;	High
Electricity Supply Act (ZOEE)	Citizen's Energy Communities	High
Regulation on self-sufficiency in electricity from renewable energy sources	Energy communities	Medium
Action plan for the reduction of energy poverty for a period of three years (2024 – 2026)	One of the proposed measures within the action plan is the involvement of energy poor households in energy communities	High

The three following sub-sections represent the findings of the second phase of the analysis. Given the nature of the collected data, these findings are structured in a way that they narratively address the three pre-defined and presupposed areas of challenges concerning legislative and policy frameworks in the field of energy renovations of MABs and energy poverty alleviation in MABs on a national level. These sections also provide summaries and key takeaways of these broader reflections which highlight positive aspects as well as opportunities for improving the existing legislative and policy framework in Estonia regarding energy renovations of MABs and energy poverty alleviation in MABs.

5.1 Targets

Slovenia, like many other European Union (EU) member states, has been working to improve the energy efficiency of its building stock, including both residential and non-residential buildings. To achieve the overarching goal of energy efficiency, a quarter of the existing building stock will need to be energy renovated, which represents around 22 million m2 of building surface. This will reduce energy consumption in buildings by almost 10%. Comprehensive, above all energy renovation of buildings, or sustainable construction, is a government strategic project, the implementation of which enables the start of construction, enables the loan activity of commercial banks, and the financing models used for energy renovations also enables the use of EU funds.

Given the significant potential for energy savings and emissions reductions, energy building renovations should be a high priority in national planning for the energy transition in Slovenia. Efforts should be made to set ambitious targets, provide adequate support and incentives for renovation projects, and ensure that renovations are carried out efficiently and effectively. This may involve a combination of regulatory measures, financial incentives, technical support, and public awareness campaigns to encourage building owners and residents to undertake energy renovations. In general, this is well reflected but there is also a potential for improvement especially in the area of MABs in combination with energy poverty.

Summary and identified barriers

The first area of potential legislative and policy barriers refers to targets for energy renovations of MABs and energy poverty alleviation in MABs on a national level. In this sense it was important to determine whether the national targets are:

- Sufficiently **ambitious and prioritised** in the national planning for the energy transition;
- Based on **comprehensive data and appropriate methodologies** for the widescale baseline analysis and tracking of the national building stock and energy poverty on a national level;
- **Coherent** across the relevant legislation and policies **and compatible** with other targets relevant to the energy transition in the country.

Summary: Slovenia aims to significantly improve the energy efficiency of its building stock, with a target to renovate a quarter of existing buildings, reducing energy consumption by nearly 10%. Energy renovations are crucial for Slovenia's energy transition and should be prioritized in national planning. This involves ambitious targets, adequate support, and incentives, alongside efficient implementation. The targets for energy building renovations in MABs are set based on an analysis of the national building stock, particularly in regions like Podravje, which includes both urban and rural areas. However, these targets do not appear to be based on housing condition and energy poverty analysis. There is coherence between the targets in different legislative documents regarding energy building renovations. However, energy poverty, particularly with a focus on MABs, is not discussed further.

Identified barriers regarding the TARGETS for energy renovations and energy poverty alleviation in MABs:

1. Insufficient prioritization and ambition in national planning for energy building renovations.

2. Lack of consideration of housing conditions and energy poverty in setting renovation targets.

3. Lack of comprehensive discussion on energy poverty, especially in the context of MABs, within legislative documents.

5.2 Measures

Measures to increase the energy efficiency of buildings and the use of renewable resources are adequate, but they mainly focus on public sector buildings or single-

family buildings. There are very few measures specifically aimed at energy renovation of multi-apartment buildings compared to other buildings or sectors.

Regarding the specific measures: as part of the preparation of Strategy LONG-TERM STRATEGY FOR PROMOTING INVESTMENTS IN THE ENERGY RENOVATION OF BUILDINGS (DSEPS) 2050, an analysis of the seismic hazard of buildings was made. This one showed that a detailed earthquake analysis should be done for 61 % of buildings and in the case of renovations to provide public funds in the range of 139.9–271.5 million euros. Apartment owners in multi-apartment buildings will be obliged to demonstrate identification card of the building energy, fire and earthquake aspect. It provides guidelines for a (gradual) wider renovation. It has to be introduced by 2024, by which time the appropriate legislation and financial instruments must be prepared.

Summary and identified barriers

The second segment of potential barriers refers to national measures for energy renovations of MABs and energy poverty alleviation in MABs. Regarding this topic we were interested in whether said measures are:

- **Suitable and comprehensive** enough given the specific national context, and, for that purpose, **created inclusively** as a result of social dialogues with key stakeholders;
- Sufficiently addressing the importance of energy renovations of MABs and energy poverty alleviation in MABs on a **local and/or regional level** in Slovenia;
- **Recognizing vulnerable social groups** at all levels in Slovenia and specifically addressing **energy poverty in residential, multi-apartment buildings**.

Summary: The analysed documents only generally mention energy poverty and vulnerable groups without detailing specific measures. The connection between energy renovation of MABs and reducing energy poverty is acknowledged, highlighting the importance of improving energy efficiency to lower energy costs for low-income households. Specific measures by the Slovenian ECO Fund do target energy poverty, including those focusing on MABs.

Identified barriers regarding the MEASURES for energy renovations and energy poverty alleviation in MABs:

1. Lack of specific measures for vulnerable groups in main legislation.

2. Energy poverty is addressed at a general level without differentiation by vulnerable groups or building types.

5.3 Implementation and monitoring

Key bodies that oversee the implementation and monitoring of the measures for energy renovations of MABs defined in the analysed documents include:

Ministry of Infrastructure: This ministry is responsible for the development and implementation of policies in the fields of construction, spatial planning, energy and transport. It oversees the implementation of legislation and national programs relating to the energy renovation of buildings, including the MAB.

ECO Fund - Slovenian Environmental Public Fund: Eco Fund is a financial institution that manages various financial incentives and subsidies for the energy renovation of

buildings, including MAB. He is responsible for allocating funds, monitoring spending and the effectiveness of measures, and reporting on the results achieved.

Ministry of the Environment and Space: This ministry participates in the formulation of policies for sustainable energy use and environmental protection, and monitors the implementation of measures to reduce the carbon footprint and increase energy efficiency, including the energy renovation of buildings.

Municipalities: Local authorities play an important role in the implementation and monitoring of MAB energy renovation measures at the local level. They are responsible for issuing building permits, supervising and monitoring the implementation of projects, and providing local support and incentives for energy renovation.

We believe that the transparency and efficiency of these processes can be improved by greater public availability of information, participation of stakeholders in decision-making, regular reporting on achieved results, and effective control and review of project implementation.

Procedures and conditions surrounding the acquisition of financial incentives for MAB energy renovations may sometimes lack clarity or appear convoluted. This lack of transparency can result in confusion and hesitancy among building owners or managers, ultimately hindering the effective utilization of available resources.

According to the analysed documents, the obvious institutional competence for the implementation and monitoring of measures for the energy renovation of buildings of multi-apartment blocks (MAB) and the reduction of energy poverty in MAB in Slovenia is dispersed among several different institutions. Some of these institutions are:

Ministry of Infrastructure: The Ministry of Infrastructure plays an important role in the formulation of policies, programs and legislation in the field of construction, spatial planning and energy efficiency of buildings, including MAB. It is also responsible for monitoring and controlling the implementation of these measures.

ECO Fund - Slovenian Environmental Public Fund: The ECO Fund is a key institution for providing financial incentives and subsidies for energy renovations of buildings, including MAB, and reducing energy poverty. His role is focused on managing available financial resources and monitoring the effectiveness of implemented projects.

Municipalities: Local authorities play an important role in the implementation of energy renovation measures for buildings at the local level, including MAB. They are responsible for issuing building permits, carrying out inspections, providing local incentives and working with building owners and managers.

It could be useful to increase the exchange of information and experience and to coordinate policies and programs between different institutions for more effective implementation of measures for the energy renovation of MAB buildings and the reduction of energy poverty in Slovenia.

To varying degrees, the analysed documents recognize and include the principles of just transition and social inclusion in the planning and implementation of energy renovation measures for multi-apartment buildings (MAB) and the reduction of energy poverty in MAB. In general, many of these documents are aware of the need for equity and inclusion in energy renovation and energy poverty reduction processes, but the level of their emphasis and concrete measures may vary. The analysed documents

often recognise the principles of just transition, which means that they are aware of the need to ensure equal opportunities and benefits for all social groups in the process of energy renovation. They are also aware of the importance of social inclusion, which includes ensuring access to energy renovations for all, including vulnerable groups and households in poverty.

Summary and identified barriers

In the last segment we were interested in potential barriers in the process of implementing and monitoring the above-mentioned measures for energy renovations of MABs and energy poverty alleviation in MABs. This mainly refers to the assessment of:

- **Governing bodies** overseeing the implementation and monitoring of the measures and the **transparency and efficiency** of the implementation and monitoring processes;
- Available national **financial instruments and mechanisms** in your country and the perceived **gaps between the necessary and available public resources** for the implementation of measures;
- **Just transition and social inclusion** elements in the planning and implementation of measures and the role of **citizen energy initiatives** energy building renovations of MABs and energy poverty alleviation in MABs;

Summary: Key bodies overseeing the implementation and monitoring of energy renovations for MABs in Slovenia include the Ministry of Infrastructure, the ECO Fund, the Ministry of the Environment and Space, and local municipalities. The transparency and efficiency of these processes could be improved by enhancing public information availability, stakeholder participation, regular reporting on results, and effective project control and review. The acquisition procedures and conditions for financial incentives for MAB energy renovations in Slovenia can lack clarity and appear convoluted, leading to confusion and hesitancy among building owners or managers, which hinders the effective utilization of available resources. The institutional competence for implementing and monitoring measures for the energy renovation of MABs and reducing energy poverty in MABs in Slovenia is dispersed among several key institutions, including the Ministry of Infrastructure, ECO Fund, and Municipalities. Improved coordination and information exchange between these institutions could enhance the effectiveness of these measures. The analysed documents generally recognize and include the principles of just transition and social inclusion in the planning and implementation of energy renovation measures for MABs and the reduction of energy poverty in MABs. While there is awareness of the need for equity and inclusion, the emphasis and concrete measures vary across documents.

Legislative and policy barriers:

Identified barriers regarding the IMPLEMENTATION AND MONITORING processes for energy renovations and energy poverty alleviation in MABs:

1. Need for improved transparency and efficiency through better public information availability, stakeholder participation, regular reporting on results, and effective project control and review.

2. Lack of clarity and transparency in the procedures and conditions for acquiring financial incentives, causing confusion and hesitancy among building owners or managers.

3. Dispersed institutional competence, which necessitates better coordination and information exchange for more effective implementation of energy renovation measures and energy poverty reduction.

4. Variability in the emphasis and concrete measures for just transition and social inclusion, leading to inconsistent application of these principles in energy renovation and energy poverty reduction processes.

6. Barriers related to public calls to energy renovations of MABs in Slovenia

Analysing Slovenian "Public call - Non-refundable financial incentives for new joint investments of greater energy efficiency of older buildings with three or more individual parts of the building (2023)" the conclusion is as follows. The public call for non-refundable financial incentives in 2023 demonstrates a significant investment of €6,000,000 aimed at enhancing energy efficiency in older buildings. The grant structure, which provides varying levels of financial support based on the scope of measures implemented, encourages comprehensive renovations. This strategic approach, including up to 100% coverage for vulnerable groups, highlights an inclusive policy designed to support broader participation in energy-saving initiatives. The application processes, while inclusive and flexible, require at least 50% co-owner agreement and offer both electronic and postal submission options.

This dual approach ensures accessibility, though the complex application and approval procedures could deter participation. Simplifying these processes could boost application rates, particularly among small property owners. The program's emphasis on specific energy-saving activities like thermal insulation and heating system optimization aims to maximize impact. The co-financing rates, ranging from 20% to 100%, cater to different financial capabilities, promoting inclusivity. However, the high standards for energy savings (50% for heating and 30% for primary energy) set ambitious targets, ensuring substantial improvements in energy efficiency. A notable gap in the available data, such as the number of applied and approved projects and the involvement of energy-poor households, hampers the ability to assess program effectiveness. Enhanced data collection and transparency are crucial for better program evaluation and strategic adjustments. The current focus is primarily on traditional energy-saving measures, with limited emphasis on renewable energy integration. Expanding the scope to include renewable energy solutions could further enhance sustainability and reduce energy costs.

1. Insufficient data and transparency

There is a lack of detailed data on the number of applied and approved projects. This absence of information hinders the ability to assess the effectiveness and uptake of the public calls. Without accurate data, it is challenging to identify trends, evaluate the success of the programs, and make informed decisions for future improvements. It also

reduces the ability to hold the program accountable and ensure that funds are being used efficiently.

2. Complex application processes

The application processes are lengthy and complex, which can deter potential applicants who may lack the necessary administrative skills or resources. Complex processes can result in lower participation rates, particularly among small property owners and those who lack professional support, leading to underutilization of available funds.

3. High initial costs and limited financial incentives

High upfront costs for energy renovation projects can be a significant deterrent, and the current incentive structure might not be sufficient to cover these costs adequately. This financial barrier can prevent many potential applicants, especially those with limited financial resources, from undertaking necessary renovations. The suggestion is to increase the percentage of costs covered by the grants, particularly for comprehensive renovation projects.

4. Eligibility and co-ownership requirements

At least 50% of co-owners must agree to proceed with the application, which can be difficult to achieve in multi-apartment buildings due to varying interests and priorities. This requirement can delay or prevent the initiation of renovation projects, particularly in buildings with a large number of co-owners or where there is disagreement among them.

5. Lack of targeted support for energy-poor households

There is a lack of specific data on the number of energy-poor households involved in the calls and the total grants used to support them. Without targeted support and detailed data, energy-poor households may not receive the necessary assistance, exacerbating energy poverty and inequality.

6. Insufficient focus on renewable energy integration

The current program appears to primarily focus on traditional energy-saving measures, with limited emphasis on integrating renewable energy solutions. This can result in missed opportunities for further reducing energy costs and enhancing sustainability through renewable energy adoption.

6.1 Efficiency of public calls

Table 5 presents the efficiency and effectiveness of public calls in Slovenia emphasizing total value of the Call, the highest and lowest amounts of grants that can be awarded to an individual project, number of applied and approved projects.

Table 5. Efficiency and effectiveness of public calls in Slovenia

Public Call	The total value (available financial resources)	The highest and lowest amounts of grants that can be awarded to an individual project	Number of applied projects that have been approved	Number of projects applied to the Call
Public call - Non-refundable financial incentives for new	6.000.000,00 EUR	Up to 20% of recognized investment costs	No info.	No info.

joint investments of greater energy efficiency of older buildings with three or more individual parts of the building (2023)		when it comes to the implementation of individual measures A, B, C or D; Up to 30% of recognized investment costs when three or more measures are implemented simultaneously; Up to 100% of recognized investment costs for the implementation of any aid measure (for recipients of social or welfare allowance in the amount of their added share of investment financing).		

The public call for non-refundable financial incentives aimed at enhancing the energy efficiency of older buildings (with three or more individual parts) had a total financial resource of €6,000,000. This indicates a significant investment in energy renovation, reflecting the increasing prioritization of energy efficiency in policy and funding. The grants could cover different percentages of recognized investment costs depending on the scope and combination of measures implemented. This variability indicates a strategic approach to encourage comprehensive renovations by providing higher financial incentives for projects that incorporate multiple energy-saving measures. The provision of up to 100% coverage for recognized investment costs for recipients of social or welfare allowances suggests an inclusive approach. This aims to support the most financially vulnerable groups in participating in energy renovation projects. The absence of information on the number of applied and approved projects in the 2023 call highlights a gap in the available data, which is crucial for assessing the effectiveness and uptake of the program.

6.2 Application processes and eligibility criteria

Table 6 presents a comparison of the requirements of public calls in Slovenia regarding the eligibility, ways of submitting the project, deadlines of revision, resolving the complaint, and signing the agreement.

Table 6. Comparison of application processes and eligibility criteria.

Criteria	Details
Criteria for Multi-Apartment Buildings	The amount of non-refundable financial incentives is determined for each eligible person on the basis of co-ownership shares, which can be seen from the prescribed form, which is part of the tender documentation.
Eligible Applicants	Any natural person who is an investor in: owner or co-owner/flat owner/co-owner of the building/part of the building where the measure that is the subject of public urges

Percentage of Interested Co-Owners Required	50%
Manner of Application Submission	Electronically and by post
Duration of Application Revision Process and Resolving Complaints	Applications are processed in the order in which they arrive.
Duration for Resolving Complaints and Signing the Agreement	Complaints are processed in the order in which they arrive. You can send the signed contract at any time after the previous decision, but no later than 2 months after the deadline for concluding the investment.

The financial incentives are allocated based on co-ownership shares. This indicates a trend towards encouraging collective responsibility and investment in energy efficiency within shared housing structures. Each co-owner's incentive is proportionate to their ownership share, suggesting an equitable distribution of funds to ensure fair access to the benefits of renovation. The eligible applicants include natural persons who are owners or co-owners of multi-apartment buildings or parts of buildings where renovation measures are applied. This reflects a trend towards inclusivity, allowing a broad range of stakeholders within a building to apply for incentives. This inclusivity promotes a wider engagement and participation in energy efficiency initiatives. At least 50% of co-owners must be interested to proceed with the application. This emphasizes the importance of collective decision-making and shared interest in undertaking energy renovation projects. It ensures that a majority consensus is reached, promoting a collaborative approach to energy efficiency improvements. Applications can be submitted both electronically and by post. This dual approach highlights a trend towards flexibility and accessibility in the application process, catering to different preferences and ensuring that applicants with varying levels of digital access and proficiency can participate. Applications are processed in the order they are received, reflecting a trend towards a first-come, first-served policy. This trend likely aims to streamline the process and provide a transparent, orderly approach to handling applications, encouraging timely submissions. Complaints are also processed sequentially as they are received, and the signing of agreements must occur within two months after the deadline for concluding the investment. This shows an effort to manage disputes efficiently and to ensure a timely follow-up on applications, promoting a sense of urgency and commitment among applicants.

6.3 Renovation activities and co-financing rates

Table 7 presents data on various aspects of these programs, including the acceptable project activities, co-financing rates, the number of square meters included, obligatory energy savings, and included renewable energy sources (RES).

Table 7. Renovation activities.

Acceptable project activities	General part for measures A, B, D: − Annex 1A Title page of the project documentation − Annex 1B Participating experts in design − Annex 1C Title page of the plan − Annex 2B Statement of the designer and design manager in the PZI

	A - thermal insulation of the facade, external wall/floor or wall facing the ground, B - thermal insulation of a flat roof, pitched roof or ceiling against an unheated room/ attic, C - thermal insulation of the floor in the field or the floor above an unheated room/basement, D - optimization of the heating system."
The minimum and maximum rates of co-financing measures for the same activities.	20 – 100 % (based on the number of measures and if the person is the recipient of social or welfare allowance)
Number in square meters in total that were included in the call / program	No info.
Obligatory annual minimum energy savings for heating compared to the condition before renovation.	50%
Obligatory annual primary energy savings compared to the situation before the renovation.	30%
Included RES in the Call / Program	No info.
RES co-financing rate	No info.

Specifying detailed acceptable activities such as thermal insulation and heating system optimization suggests a targeted approach to energy efficiency. By focusing on key areas where energy losses are significant, the program aims to maximize the impact of renovations on energy savings. The co-financing rates range from 20% to 100%, depending on the number of measures implemented and whether the recipient is a social or welfare allowance beneficiary. This broad range indicates a flexible approach to funding, allowing for varied levels of financial support based on specific conditions. It suggests a trend towards inclusivity and support for vulnerable populations, aiming to ensure that even those with limited financial resources can benefit from energy renovation initiatives. Setting a high standard for energy savings (50%) reflects a commitment to substantial improvements in energy efficiency. This indicates that the program prioritizes significant reductions in heating energy consumption, which can lead to lower energy bills and reduced environmental impact. The requirement for at least 30% primary energy savings annually underscores the importance of comprehensive energy savings across all energy types, not just heating. By setting this threshold, the program encourages extensive energy efficiency improvements that can contribute to broader sustainability goals. The lack of information on RES suggests that the program may primarily focus on energy efficiency measures rather than renewable energy generation. This trend indicates a prioritization of reducing existing energy consumption rather than transitioning to renewable energy at this stage. It also could imply that renewable energy projects are either not a significant part of this program or are handled separately. The focus seems to be on traditional energy-saving measures rather than integrating renewable energy systems.

6.4 Energy poverty

There is no information about the number of energy-poor households involved in the call and total grants used for energy-poor. There is defined criteria for energy-poor households: "Households that face challenges related to high energy costs compared

to their disposable income." The lack of detailed data on energy-poor households and specific grant allocations reveals a gap in program monitoring and reporting. This suggests that there may be a need for enhanced data collection and transparency to ensure that the programs are effectively reaching and supporting energy-poor households. Addressing this data gap could help policymakers and program administrators better understand the program's reach and effectiveness, and potentially adjust strategies to more effectively target and support those in need. The defined criterion for energy-poor households focuses on the burden of energy costs relative to disposable income, indicating a clear prioritization of those who are most economically vulnerable. This approach underscores a commitment to social equity by identifying and providing support to households that spend a significant portion of their income on energy, which can help alleviate energy poverty and improve overall living conditions. The absence of specific data on the number of energy-poor households and the amount of grants allocated to them suggests a potential area for improvement in how funds are targeted and allocated. Enhancing the focus on and reporting of how funds are used to support energy-poor households could improve the effectiveness of the programs. It would ensure that the most vulnerable populations receive the assistance they need to make energy efficiency improvements, ultimately reducing their energy costs and improving their quality of life.

7. Policy recommendations for improvements of national regulatory framework

The proposed general recommendations outline broad guidelines for public policies aimed at improving the process of achieving energy efficiency goals, particularly focusing on the energy renovation of MABs in Slovenia and energy poverty alleviation in MABs. Energy inefficiency of multi-apartment buildings remains one of the key infrastructural barriers to sustainable management of renewable energy and the overall transformation of energy production and consumption systems in Slovenia. Apart from the major role that the transformation of the residential sector plays in the overall energy transition in Slovenia, ensuring the energy efficiency of residential buildings through comprehensive energy renovation is a crucial initial step toward unlocking the significant potential of citizen energy in MABs in Slovenia. This effort also greatly contributes to the overall decarbonization of the housing sector and the attainment of the goals[4] of transforming the European building stock into (nearly) zero-emission buildings.

These recommendations stem from previously displayed analysis of previous public calls for energy renovations of MABs in Slovenia, and the barriers identified in the analysis of the regulatory and policy framework outlining energy renovations of MABs and energy

[4] In March 2023, the European Parliament adopted a draft of measures aimed at increasing the rate of energy renewal and reducing energy consumption and greenhouse gas emissions. The proposed revision of the Energy Performance of Buildings Directive (EPBD) aims to significantly cut greenhouse gas emissions and energy consumption in the EU building sector by 2030, with the goal of achieving climate neutrality by 2050. Starting in 2028, all new buildings are required to be zero-emission and equipped with solar technologies, while residential buildings undergoing major renovations must meet these requirements by 2032. "Nearly zero-energy building" means a building a building with very high energy efficiency, i.e. a very low amount of energy required for operation, whereby the required energy is largely produced from renewable sources on site or nearby (Energy Act EZ-1, Official gazette RS, nr. 60/19 and Action plan for almost zero-energy buildings until 2020 (ANsNES)).

poverty alleviation in Slovenia. Implementing elements of these policy recommendations into the current procedures, policies and legislation could significantly enhance the effectiveness, inclusiveness, and sustainability of energy renovation calls in Slovenia, leading to improved energy efficiency and ultimately result in reduced energy poverty across the country.

RECOMMENDATION 1: **Establish a Centralized Energy Data Platform.**

To address the lack of detailed data and transparency regarding energy efficiency projects in Slovenia. This recommendation aims to improve the collection, management, and dissemination of data related to public calls for energy efficiency projects, thereby facilitating better assessment, accountability, and decision-making. Create a centralized platform for collecting, managing, and sharing energy consumption data across Slovenia, with specific modules for MABs. This platform should include data on energy use, energy efficiency levels, building characteristics, and socio-economic data of residents. Access should be granted to policymakers, building managers, and residents, ensuring transparency. Centralized data will allow for better monitoring of energy consumption patterns, identification of buildings at risk of energy poverty, and more informed decision-making regarding energy efficiency measures. Transparency in data will also empower residents and stakeholders to participate actively in energy-saving initiatives.

RECOMMENDATION 2: **Simplify and Streamline Application Procedures for MABs in Slovenia.**

Simplify the application forms and procedures for energy efficiency grants, subsidies, and other related programs. This can be achieved by reducing the paperwork required, eliminating unnecessary steps, and providing clear, precise instructions. The process should be digitized where possible, allowing for easy online submissions. Simplified procedures will make it easier for all applicants, especially those in MABs, to access financial assistance and participate in energy efficiency programs. This is particularly important for low-income households that may otherwise be deterred by complex bureaucracy.

RECOMMENDATION 3: **Support Collective Financing Mechanisms.**

To facilitate and promote collective financing mechanisms that enable residents of multi-apartment buildings (MABs) to pool resources and share the financial burden of energy efficiency projects. This recommendation aims to overcome the financial barriers that individual residents might face, making large-scale energy upgrades more feasible and equitable. Group loans involve multiple residents in a MAB coming together to apply for a single loan that covers the cost of energy efficiency upgrades, such as insulation, window replacement, or the installation of solar panels. The loan is distributed across all participating households, with repayment terms tailored to their collective financial situation.

The government can facilitate partnerships with financial institutions to offer special group loan products for MABs. These loans could feature lower interest rates and longer repayment periods, made possible through government-backed guarantees or subsidies. Financial institutions could assess the combined creditworthiness of the building's residents rather than individual credit profiles, lowering the risk and making approval more likely.

RECOMMENDATION 4: **Weighted Voting Systems.**

To streamline decision-making processes and address the challenges posed by the requirement that at least 50% of co-owners must agree to proceed with energy efficiency projects. This recommendation aims to facilitate quicker and more equitable decision-making in multi-apartment buildings (MABs), where diverse interests and priorities among co-owners can delay or prevent essential renovations.

Implement a weighted voting system where votes are based on the ownership shares (e.g., larger apartment owners have more say) rather than the number of individual co-owners. This system ensures that those with greater financial stakes have a proportionate influence on decisions. Introduce legal provisions that allow for weighted voting systems in MABs, particularly for decisions on energy efficiency projects. This may require revising current co-ownership laws to allow such systems to be adopted with a simple majority vote among co-owners. Weighted voting can help overcome situations where a small minority of co-owners, who may own only a small portion of the building, can block important decisions. This system aligns decision-making power more closely with financial responsibility.

RECOMMENDATION 5: **Outreach and Awareness Campaigns.**

Launch targeted outreach campaigns to raise awareness among energy-poor households about available support programs and how to access them. These campaigns should be culturally sensitive and use multiple channels to reach different segments of the population. Collaborate with local governments, NGOs, and community leaders to design and disseminate information. Campaigns could include door-to-door visits, community meetings, and partnerships with social services to ensure wide reach.

Many energy-poor households may be unaware of the support available to them or may face barriers in accessing information. Proactive outreach ensures that these households are informed and empowered to participate in energy efficiency programs.

RECOMMENDATION 6: **Enhance Focus on Renewable Energy Integration.**

To expand the scope of Slovenia's energy efficiency programs by increasing the emphasis on integrating renewable energy solutions in multi-apartment buildings (MABs). This recommendation aims to reduce energy costs, enhance sustainability, and promote the transition to a low-carbon economy by making renewable energy a central component of energy efficiency initiatives. Develop and promote financial products specifically tailored to renewable energy projects in MABs, such as green bonds, low-interest loans, and leasing options for solar installations and other renewable technologies. Tailored financial products can help overcome the high initial costs associated with renewable energy installations, making them more accessible to MABs and encouraging broader adoption of renewable technologies.

Annex 1

Instrument "T3.1 National regulatory framework analysis"

GENERAL INFORMATION

Q.1 Country

- Croatia
- Slovenia
- Romania
- Estonia
- Poland

Q.2 Document title (English)

(Open-ended question)

Q.2.1. Link to the document (if available)

(Open-ended question)

Q.3 Year of publication

(Open-ended question)

Q.4 Main subject area (eg., energy, buildings, ownership, etc.)

(Open-ended question)

Q.5 Secondary subject area (if applicable)

(Open-ended question)

Q.6 Version of the document

- Final
- Draft

ENERGY RENOVATIONS OF MABs

Q.7 Key STAKEHOLDERS (e.g. building owners, tenants, citizens, energy agencies etc.) specified by the document

(Open-ended question)

Q.8 The document sets quantitative TARGETS for energy renovations of multi-apartment buildings (y/n)

- Yes
- No

Q.9 If YES, insert target(s) in corresponding units

(Open-ended question)

Q.10 The document specifies MEASURES for energy renovations of multi-apartment buildings (y/n)

- Yes

- No

Q.11 If YES, provide a list (without description) of specified measures. Please copy & paste measures from the referenced document.

(Open-ended question)

Q.12 The document specifies FINANCIAL SCOPE for implementation of measures (y/n)

- Yes
- No

Q.13 If YES, insert the financial scope of each measure (if available) in EUR

(Open-ended question)

Q.14 The document specifies FINANCIAL SOURCES for implementation of measures (y/n)

- Yes
- No

Q.15 If YES, provide a list (without description) of specified financial sources. For each identified measure please copy & paste the financial source (if available) from the referenced document.

(Open-ended question)

Q.16 Overall self-assessed RELEVANCE of the document for the ENERGY RENNOVATIONS OF MABs

- Low
- Medium
- High

ENERGY POVERTY IN MABs

Q.17 The document ADDRESSES energy poverty alleviation in MABs, in general (y/n)

- Yes
- No

Q.18 The document specifies concrete MEASURES for energy poverty alleviation in MABs (y/n)

- Yes
- No

Q.19 If YES, provide a list (without description) of specified measures. Please copy & paste measures from the referenced document.

(Open-ended question)

Q.20 The document specifies FINANCIAL SOURCES for implementation of measures (y/n)

- Yes
- No

Q.21 If YES, provide a list (without description) of specified financial sources. For each identified measure please copy & paste the financial source (if available) from the referenced document.

(Open-ended question)

Q.22 The document specifies FINANCIAL SCOPE for implementation of measures (y/n)

- Yes
- No

Q.23 If YES, insert the financial scope of each measure (if available) in EUR

(Open-ended question)

Q.24 Overall self-assessed RELEVANCE of the document for ENERGY POVERTY ALLEVIATION IN MABs

- Low
- Medium
- High

CITIZENS ENERGY IN MABs

Q.25 The document defines the conditions for establishing citizen energy initiatives in MABs, e.g. energy communities or RES communities (y/n)

- Yes
- No

Q.26 Which types of citizen-led energy initiatives are referenced?

(Open-ended question)

Q.27 Overall self-assessed RELEVANCE of the document for CITIZENS ENERGY IN MABs?

- Low
- Medium
- High

Annex 2

Instrument "T3.1 National regulatory framework analysis_Open form"

Q1. Based on the reviewed national regulations and other official documents concerning energy building renovations, please describe the overall current level of ambition of your country for energy building renovations of MABs as they relate to specific national targets (if there are any) and those set by the EC. How well or poorly do current national targets reflect the necessity of wide scale energy building renovations of private households in your country? In your opinion, how important is the energy building renovations of MABs in the overall energy transition in your country, and/or is it prioritised in national planning of energy transition?

(Open-ended question)

Q3. Is there a coherency of identified targets across the relevant legislation and official documents? Are there any sectoral or any other discrepancies as they relate to the planning of energy building renovations of MABs and/or energy poverty alleviation of MABs? If so, please provide a brief description of them.

(Open-ended question)

Q4. Based on the reviewed national regulations and other official documents concerning energy building renovations, please briefly assess the suitability of identified measures for energy building renovations of MABs for the existing national context. If applicable, please describe the process of inclusion of key stakeholders in the (co-)creation of said measures and/or public discussion of defined measures. Are there any specific measures that are lacking in the national planning that should be implemented in your country regarding its specific infrastructural, institutional, socio-economic, and cultural background?

(Open-ended question)

Q5. How do the existing measures address the regional and/or local level in your country? Are there specific measures for cities and regions and how well or poorly do they reflect the actual needs and capabilities of sub-national units to implement said measures? Are there any inconsistencies regarding the conceptualisation of measures for energy building renovations of MABs between the national and local/regional level and, if so, please provide a brief description of them.

(Open-ended question)

Q6. How well or poorly do these measures recognize vulnerable social groups at the national and local levels in your country? Which social groups are, and which ARE NOT identified within the analysed legislation and official documents but are potentially especially vulnerable in your country? How well or poorly is energy poverty in MABs addressed in said documents considering existing measures? When considering the analysed documentation, is there a clear connection (in terms of main benefits, obstacles, etc.) between energy renovation of MABs and national and/or regional energy poverty alleviation?

(Open-ended question)

Q7. Which governing bodies oversee the implementation and monitoring of the measures for energy rennovantions of MABs defined in the analysed documents in your country? Please briefly assess the transparency and efficiency of these processes or entities in the implementation and monitoring processes.

(Open-ended question)

Q9. When considering the analysed documents, is there an obvious institutional jurisdiction for the implementation and monitoring of measures of energy building renovations of MABs and energy poverty alleviation of MABs? Which (types of) institutions are accentuated the most in this regard in your country and how? How well or poorly are various national institutions coordinated within the existing planning, if at all, and how do you assess their role in the implementation?

(Open-ended question)

Q10. To what extent do the analysed documents recognize and incorporate principles of just transition and social inclusion in the planning and implementation of measures of

energy building renovations of MABs and energy poverty alleviation of MABs? Do the analysed documents recognize the need for wider social dialogue and public participation in these processes, as described in the analysed documents? In this regard, how are these processes described? Which social actors are highlighted and given priority, and which ones ARE NOT, but should be, considering the wider social context? To what extent and how well or poorly is the concept of citizen energy initiatives incorporated within the analysed documents and how is its role defined regarding energy building renovations of MABs and energy poverty alleviation in MABs?

(Open-ended question)

Annex 3

Instrument "T3.1 Analysis of previous public calls"

Q.1 Country

- Croatia
- Slovenia
- Romania
- Estonia
- Poland

Q.2 What year was the Call published?

(Open-ended question)

Q.3 What is the name of the Call?

(Open-ended question)

Q.4 What is the criteria for a multi-apartment buildings? (e.g. Percentage of the total usable area that is used for housing; Minimum number of residential units; has a building manager, and other criteria)

(Open-ended question)

Q.5 Who are eligible applicants?

(Open-ended question)

Q.6 What is the (majority) percentage of interested co-owners required to initiate a project application for this Call?

(Open-ended question)

Q.7 How is the application submitted on this Call (e.g. electronically, by post)?

(Open-ended question)

Q.8 How long does the application revision process last, on average? (e.g. by calculating the time difference between the date of the application and the date of the notification of approval). Please specify in months, weeks, or days.

(Open-ended question)

Q.9 How long does it take for the complaint to be resolved?

(Open-ended question)

Q.10 What is the deadline for the signing of the Agreement from the date of adoption of the Funding decision?

(Open-ended question)

Q.11 How long is the maximum project's implementation period in this Call?

(Open-ended question)

Q.12 Please specify the total value (available financial resources) of the Call, in EUR?

(Open-ended question)

Q.13 Please specify the highest and lowest amounts of grants that can be awarded to an individual project? (in EUR)

(Open-ended question)

Q.14 Please provide a short list (in bullet points) of acceptable project activities (e.g. creation of project documentation, energy renovation)?

(Open-ended question)

Q.15 What are the minimum and maximum rates of co-financing measures for the same activities? (in EUR)

(Open-ended question)

Q.16 How many projects applied to the Call?

(Open-ended question)

Q.17 How many applied projects have been approved?

(Open-ended question)

Q.18 How many square meters in total were included in the energy renovation in this Call?

(Open-ended question)

Q.19 Are energy poor households also included in the Call?

- Yes
- No

Q.20 If YES, how many energy-poor households were involved in energy renovation?

(Open-ended question)

Q.21 Please provide a short description of the criterion for the energy poor households?

(Open-ended question)

Q.22 How much of the total grant for this Call was used? (in percentage points)

(Open-ended question)

Q.23 What are the obligatory annual minimum energy savings AS DEFINED IN THE TEXT OF THE CALL for HEATING compared to the condition before renovation? (kWh/year and/or percentage)

(Open-ended question)

Q.24 What is the obligatory annual primary energy savings AS DEFINED IN THE TEXT OF THE CALL compared to the situation before the renovation? (kWh/year and/or percentage)

(Open-ended question)

Q.25 Is RES co-financing included in the Call?

- Yes
- No

Q.26 Which RES are included in the Call (e.g. photovoltaic systems for the production of electricity)?

(Open-ended question)

Q.27 What was the RES co-financing rate in this Call?

(Open-ended question)

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