Investment guide

Overview of financing programs and promising investment projects in the energy sector

January 2025

DEVELOPMENT OF THE ENERGY SECTOR.

Financing programs and investment projects

KSE Kyiv School of Economics
MINISTRY OF ECONOMY OF UKRAINE
Ministry of Energy of Ukraine
KPMG

Disclaimer

The Energy Sector Investment Guide has been prepared by KSE Institute in cooperation with the Ministry of Economy of Ukraine, the Ministry of Energy of Ukraine, the Office for Support of Recovery and Reforms of the Ministry of Energy of Ukraine and KPMG in Ukraine. It is an informational publication focusing on significant investment opportunities in electricity generation and distribution and biogas production and provides information on potential sources of financing for investment projects in these sectors. The analysis is intended to provide insights to potential investors and banking institutions on promising areas for investment, and to project initiators on existing and effective mechanisms to support investments in the Ukrainian energy sector.

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Our joint cooperation in mapping possible energy sector financing programs, putting together practical recommendations for preparing investment projects, and structuring the investment teasers included in this guide was essential to ensure the accuracy, depth, and relevance of the information presented. We highly appreciate your commitment to Ukraine's economic development and are sincerely grateful for your significant contribution to this important initiative.

Thank you for your unwavering support and fruitful partnership!

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Introduction

Dear colleagues and partners,

The Ministry of Energy of Ukraine presents the guide "Development of the energy sector. Financing programs and investment projects". This document is a key tool in our joint efforts to restore and modernise Ukraine's energy sector.

The energy sector is the foundation of our country's economic recovery, especially in the regions affected by Russian aggression. We recognise that rebuilding the destroyed energy infrastructure is not only a technical challenge, but also an opportunity to implement innovative solutions and transition to sustainable development.

In this handbook, we consider:

- Challenges and opportunities in developing investment projects in the post-war context
- Prospects for the introduction of renewable energy sources to ensure energy independence
- Mechanisms of cooperation between the government, private investors and local communities

Our goal is to create a stable and favourable environment for investment that will ensure not only recovery but also sustainable economic growth. We are confident that, through our joint efforts, we can turn challenges into opportunities and build a strong foundation for Ukraine's energy security.

We invite you to actively participate in the development of our country's energy future.

Respectfully,
Ministry of Energy of Ukraine

Introduction

The energy sector is a cornerstone of Ukraine's economy, underpinning the operations of thousands of businesses and the daily well-being of every citizen. As a vital driver of sustainability and economic growth, it plays a critical role in the nation's prosperity. Recognizing its importance, the restoration and modernization of the energy system has become a top priority, uniting the efforts of the Government, international partners, and Ukrainian businesses.

The recovery of the energy sector is also a key focus of the EU's Ukraine Facility program, with the Ministry of Economy of Ukraine serving as the National Coordinator for its implementation. This program incorporates measures outlined in the Ukraine Plan to enhance the business environment and offers financing opportunities for private and public projects through the €7.9 billion Ukraine Investment Framework (Pillar II). Funding for energy projects is facilitated via instruments from international financial institutions (IFIs) and Ukrainian partner banks.

Our goal is to provide clear, actionable recommendations to help secure financing for the development and implementation of investment projects. This Guide serves as a valuable resource for companies working to strengthen Ukraine's energy sector and meet their own energy needs, as well as for potential investors seeking ready-made opportunities in this critical field.

This Guide offers practical solutions for financing projects in electricity generation, energy storage, energy efficiency, and other key areas. It highlights the significant investment potential of Ukraine's energy sector and includes examples of well-prepared projects ready for implementation.

We hope this resource equips you with the information needed to realize your own projects and make a meaningful contribution to advancing energy sustainability and driving Ukraine's economic recovery.

Respectfully,
Ministry of Economy of Ukraine

Table of Contents

ACKNOWLEDGEMENTS 3

INTRODUCTION 5

Ministry of Energy 5

Ministry of Economy 6

ABBREVIATIONS AND ACRONYMS 8

CHAPTER 1.
Electricity Generation in the Context of War: Critical Consequences and Areas of Recovery **10**

1.1. Current state of the power system 11

1.2. Prospects for the development of electricity generation 13

SECTION 2.
Improving the legal framework for attracting investment in electricity generation **15**

SECTION 3.
Sources of financing for energy projects **20**

3.1. EFI funding programs and project areas in the energy sector 22

3.2. Financing programs from Ukrainian banks for the energy sector 24

3.3. DFIs financing projects in the energy sector 36

SECTION 4.
Practical recommendations for preparing investment projects **39**

CHAPTER 5.
Investment opportunities in the energy sector **44**

5.1. General list of investment projects 45

5.2. Examples of promising projects 46

5.3. Examples of project profiles with a high degree of readiness 50

Abbreviations and acronyms

AC	Alternating Current
BGK	Bank Gospodarstwa Krajowego (Polish development bank)
BP	Banking Product
BSTDB	Black Sea Trade and Development Bank
CB	Corporate Business
CBA	Cost-Benefit Analysis
CHP	Combined Heat and Power
CMU	Cabinet of Ministers of Ukraine
DC	Direct Current
DCFTA	Deep and Comprehensive Free Trade Area
DDGS	Dried Distillers Grains with Solubles
DFC	U.S. International Development Finance Corporation
DFI	Development Financial Institutions
EBITDA	Earnings Before Interest, Taxes, Depreciation, and Amortization
EBRD	European Bank for Reconstruction and Development
ECA	Export Credit Agency
EDF	Entrepreneurship Development Fund
EE	Energy Efficiency
EFI	Eligible Financial Institutions
EFSE	European Fund for Southeast Europe
EIB	European Investment Bank
EIF	European Investment Fund
ENTSO-E	European Network of Transmission System Operators for Electricity
ESCO	Energy Service Company
ESF	Energy Storage Facilities
ESG	Environmental, Social, and Governance
ESIA	Environmental and Social Impact Assessment
EU	European Union
FS	Feasibility Study
GGF	Green Growth Fund
HC	Housing Cooperative
HOA	Homeowners Association
HPGS	Solar-Wind Hybrid Power Generation System
HPP	Hydroelectric Power Plants
HWRZ	High War Risk Zone
IDPs	Internally Displaced Persons
IE	Individual Entrepreneur
IFC	International Finance Corporation
IFI	International Financial Institution

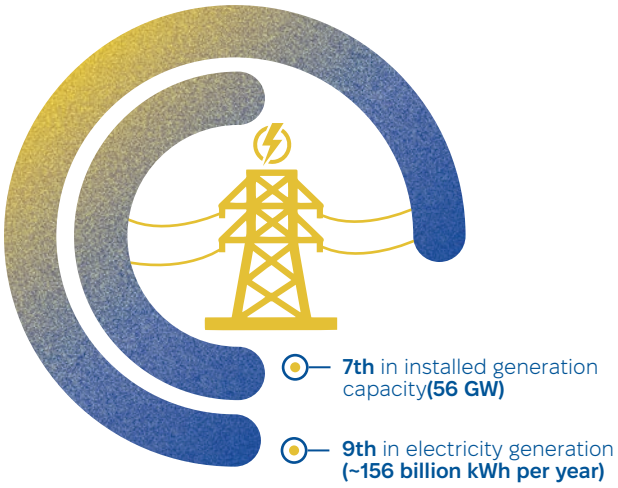
IFRS	International Financial Reporting Standards
IRR	Internal Rate of Return
ISA	International Standards on Auditing
JSC	Joint Stock Company
KfW	Kreditanstalt für Wiederaufbau (German development bank)
KSE	Kyiv School of Economics
KYC	Know Your Client
LE	Legal Entity
LNG	Liquefied Natural Gas
MSME	Micro, Small, and Medium-sized Enterprises
NBU	National Bank of Ukraine
NEURC	National Commission for State Regulation of Energy and Public Utilities
NPP	Nuclear Power Plants
NPV	Net Present Value
PJSC	Private Joint Stock Company
PSPP	Pumped Storage Power Plants
PTL	Power Transmission Line
REG	Renewable Energy Generation
REMIT	Regulation on Wholesale Energy Market Integrity and Transparency
RES	Renewable Energy Sources
ROI	Return On Investment
SME	Small, and Medium-sized Enterprises
SOE	State-Owned Enterprise
SPP	Solar Power Plants
SPV	Special-Purpose Vehicle
TPP	Thermal Power Plants
UIF	Ukraine Investment Framework
UIRD	Ukrainian Index of Retail Deposit Rates
UNDP	United Nations Development program
UNIDO	United Nations Industrial Development Organization
URC	Ukraine Recovery Conference
USAID	United States Agency for International Development
WPP	Wind Power Plants

CHAPTER 1

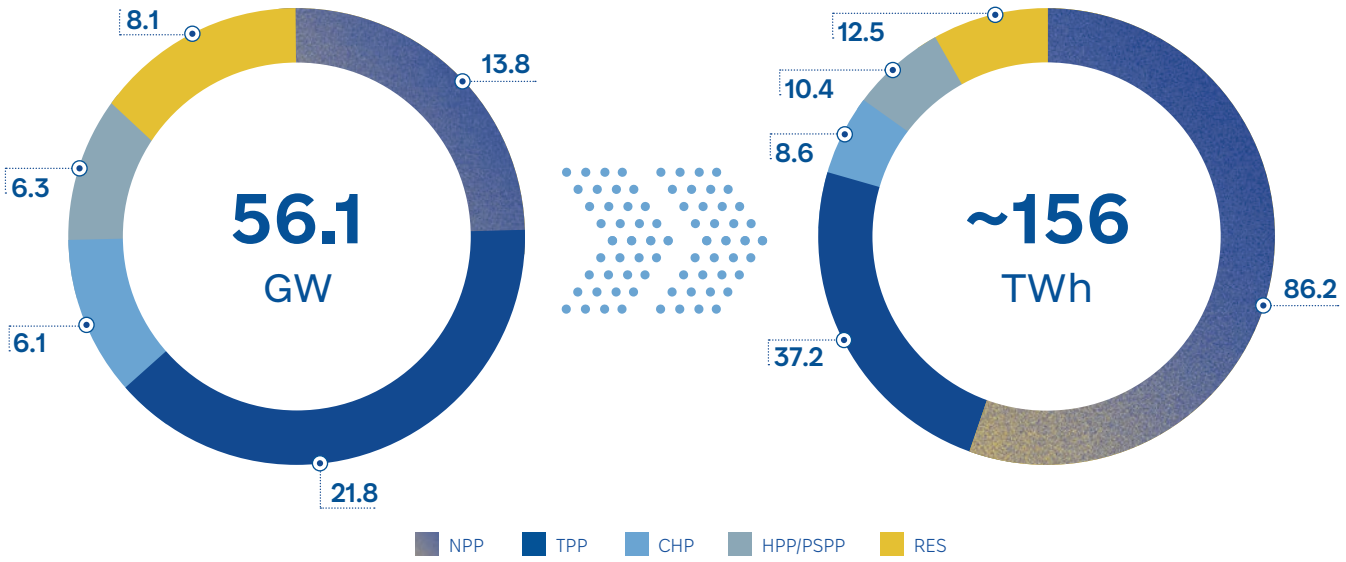
Electricity Generation in the Context of War: Critical Consequences and Areas of Recovery

1.1. Current state of the power system

Before the full-scale invasion, **Ukraine's energy system was one of the largest among European countries** and ranked 9th in terms of electricity generation, approximately 156 billion kWh per year. The basis of Ukraine's energy mix was nuclear generation - 13.8 GW of installed capacity (24.6% of total) accounted for over 55% of electricity generation in 2021. Thermal generation using coal and natural gas played a significant role - 27.9 GW of installed capacity (49.8% of total) provided 29.1% of generation. RES developed dynamically - in 2021, the installed capacity of RES amounted to 8.1 GW (14.4% of total) and the volume of electricity generated by RES was 8.1% of the total generation.



Installed capacity, GW, and electricity generation, TWh in 2021



Ukraine's energy sector has suffered some of the biggest losses as a result of the war, in particular due to massive shelling and destruction of power generation facilities. **As of September 2024, the total loss of generating capacities due to Russian attacks, which began in March of the same year, exceeded 9 GW.** In addition, approximately 18 GW of generation capacity has been occupied by Russian forces, including HPP, TPP, RES, and the largest nuclear power plant in Europe — Zaporizhzhya NPP (6 GW).

$16.1bn

Direct losses to Ukraine's energy sector due to Russia's full-scale invasion

$50.5bn

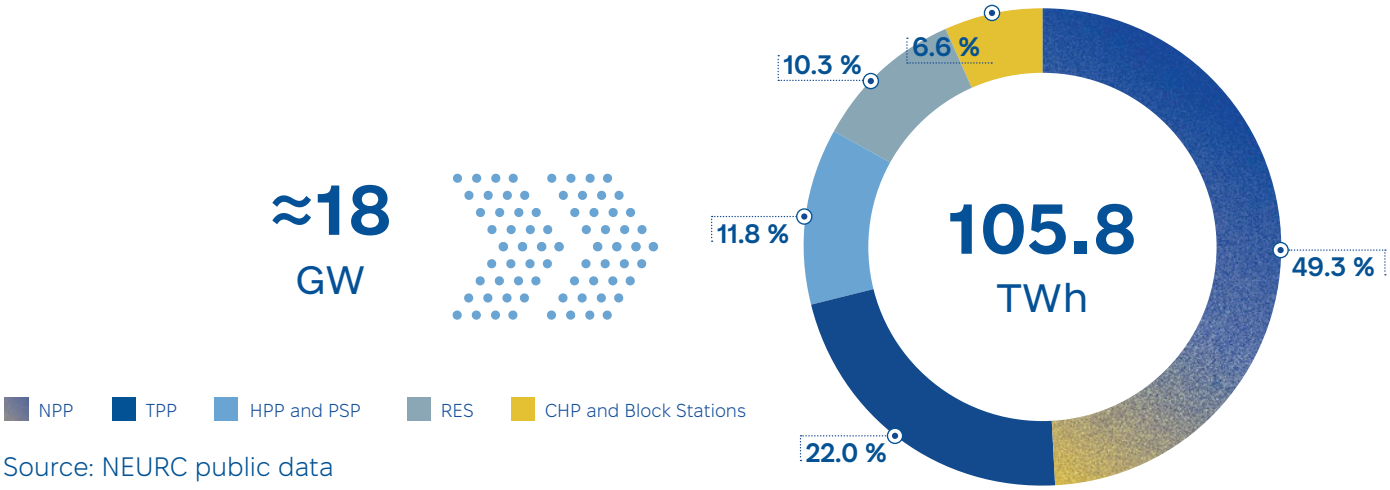
Energy sector rehabilitation needs, which include the complete reconstruction of destroyed facilities based on the principle of "rebuilding better than before"

Detailed information on the destruction of Ukraine's energy sector as a result of Russia's full-scale invasion is available in the KSE analytical report **https://kse.ua/wp-content/uploads/2024/06/KSE_Impact-of-the-war-on-energy_ENG-1.pdf** (May 2024).

Electricity production in Ukraine is dominated by NPPs, which generate stable volumes of electricity, and RES, which depend on weather conditions. **This energy mix does not ensure a balance between generation (supply) and consumption (demand), as seasonal and daily weather variations significantly increase the risk of imbalances in the energy system.** Previously, thermal and hydropower generation served as stabilizers, allowing the system to handle peak loads. Now, to address the deficit, Ukraine relies on electricity imports from ENTSO-E or balances consumption through power outages. This is one of the key challenges that must be resolved.

CHALLENGE: Balancing the power system, considering seasonal and daily fluctuations and regular massive Russian attacks

Total available installed capacity (GW) and structure of electricity generation (TWh), 2023



Source: NEURC public data

Despite the ongoing hostilities as the energy sector remains one of the main targets of Russia's military aggression, Ukraine is conducting **the largest repair campaign of energy facilities in the history of its independence and is commissioning new generation facilities.**

Further recovery of Ukraine's energy sector is expected to become the foundation for the development of the country's economy as a whole. The cornerstones of this effort are the full **integration of Ukraine's energy markets with European ones and the attraction of foreign private capital to the Ukrainian energy sector.**

The government and the private sector, together with international partners, are focusing their efforts on restoring and developing energy infrastructure:

- In 2022, about 312 MW of new RES capacities were built, and in 2023, about 350 MW were commissioned (SPP, WPP, biogas plants and small HPP[1]);
- In 2023, DTEK invested about $300 million in energy infrastructure, and USAID provided $475 million in emergency assistance to strengthen Ukraine's energy sector;
- During the Ukraine Recovery Conference in Berlin (URC-2024), 12 cooperation agreements were signed with financial institutions and energy companies, including memoranda of understanding with Siemens Energy AG, Deutsche Bank AG, GE Vernova, Voith Hydro and Ukrainian companies to develop the production and supply of energy equipment[2].
- In addition, several important financial commitments were made during URC-2024 to support Ukraine's energy system[3]:
  - The United States and Germany agreed to provide $824 million and €30 million respectively to support Ukraine's energy infrastructure;
  - The World Bank provided an additional grant of $47 million for the purchase of thermal equipment for Kharkiv, including 1,000 generators and solar panels.

[1] - https://www.kmu.gov.ua/news/herman-halushchenko-ukrainska-enerhetyka-naroshchuie-potuzhnosti-vde-i-stane-klimatychno-neitralnoiu
[2] - https://www.mev.gov.ua/novyna/urc-2024-za-koordynatsiyi-minenerho-ukladeno-12-uhod-pro-spivpratsyu-z-partneramy-dlya
[3] - https://www.kmu.gov.ua/news/na-konferentsii-z-vidnovlennia-ukrainy-bulo-ukladeno-bilshe-100-mizhnarodnykh-uhod-premier-ministr

1.2. Prospects for the development of electricity generation

Despite the challenges facing Ukraine's energy system, its capacity losses as a result of the Russian criminal attacks and the resulting destruction of infrastructure, Ukraine is working to ensure that its consumers have electricity now and in the future. Although the war is ongoing, Ukraine is fulfilling its international obligations and not abandoning its climate goals. The green recovery in the energy sector aims to create a new architecture of the energy system based on **sustainability, green transition principles, and energy affordability.**

An important element of building a sustainable and resilient energy system is the **development of distributed generation capabilities,** which reduce the system's dependence on centralised electricity and decrease the vulnerability of heat suppliers to enemy attacks. In addition, generating energy closer to the point of consumption minimises electricity and heat losses during transportation, making energy supply more efficient.

During the war, **nuclear power generation has demonstrated its foundational role in Ukraine's energy system.** Despite the ongoing attacks on energy infrastructure with missiles and drones, nuclear power plants have not been directly targeted. As of the second half of 2024, nuclear generation produces about 60% of Ukraine's electricity and remains the base source for power generation. Its criticality in stabilizing the system reflects that **Ukraine needs to implement nuclear power development projects now to meet the growing need for affordable and low-carbon energy, as it rebuilds its economy after the war.**

At the same time, **RES remains one of the most promising areas for the development of the domestic energy sector,** as they not only contribute to the green transition of Ukraine's economy, but also simultaneously increase energy security and resilience of the entire energy system. Additionally, RES are important for the gradual integration of Ukraine's energy market with the EU market (EU Green Deal), which prioritises green energy production while reducing CO_2 emissions within the framework of the Fit for 55 package[4].

In 2024, the Government approved the National Energy and Climate Plan until 2030[5] and the National Renewable Energy Action Plan up to 2030[6]. Among its other objectives, the plan aims to achieve **a RES contribution of at least 27% in the gross final energy consumption structure by 2030.**

According to the National Renewable Energy Action Plan until 2030, Ukraine plans to increase its total RES capacity by **21.1 GW** of installed capacity, namely:

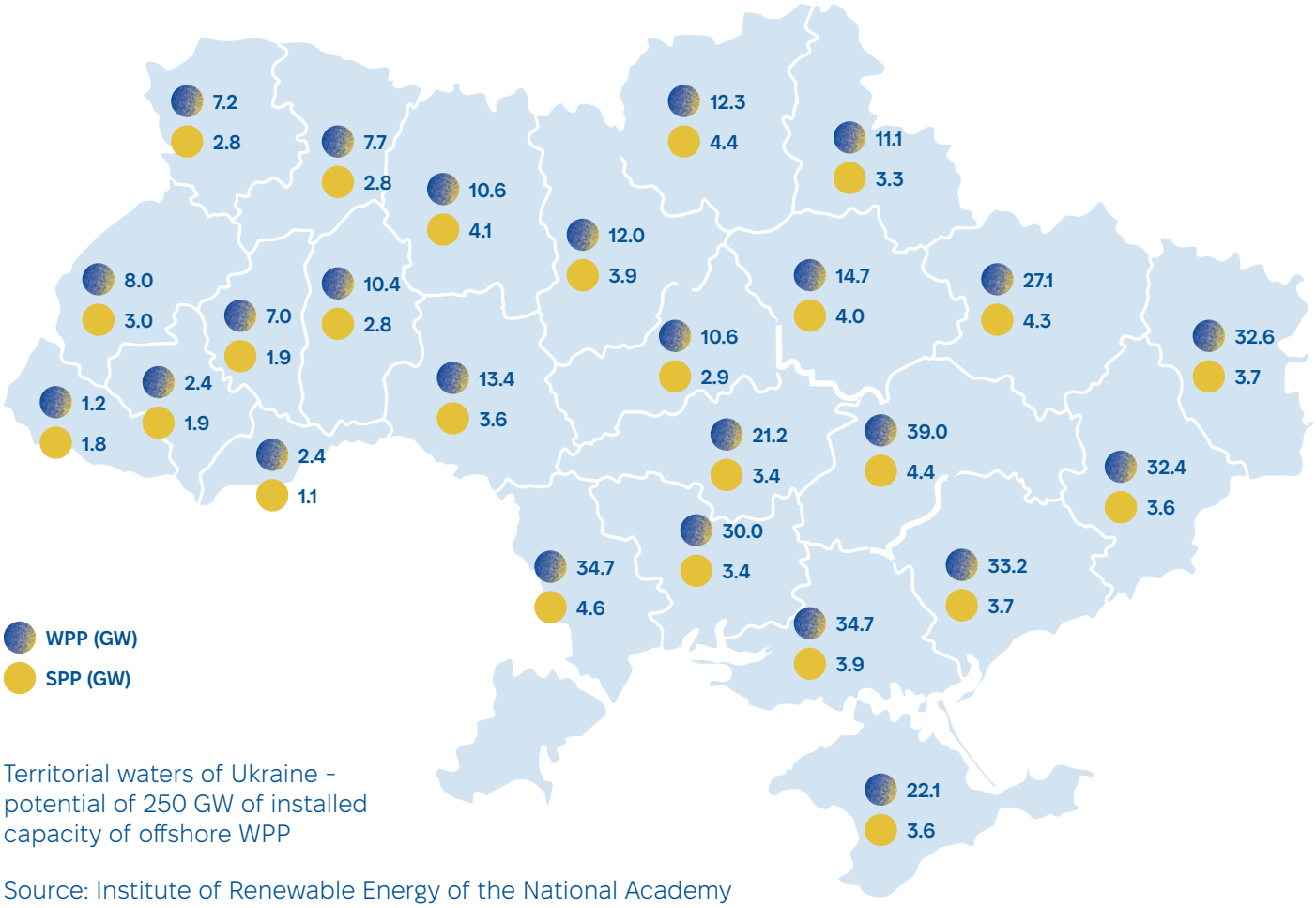
WPP	total capacity of 6.2 GW with the ability to generate up to 17.455 billion kWh
SPP	total capacity of 12.2 GW with the ability to generate up to 13.471 billion kWh
Small HPP/PSPP	up to 10 MW) (total capacity of 0.243 GW with the ability to generate up to 0.6 billion kWh
Bioenergy	total capacity of 0.88 GW with the ability to generate up to 3.85 billion kWh
Geothermal energy	total capacity of 0.04 GW with the ability to generate up to 0.21 billion kWh
High maneuverability capacity with the ability for quick start-up and shutdown	total capacity of 0.906 GW
Energy storage facilities (ESF)	total capacity of 0.656 GW

[4] - https://commission.europa.eu/strategy-and-policy/priorities-2019-2024/european-green-deal/delivering-european-green-deal
[5] - https://me.gov.ua/Documents
[6] - https://zakon.rada.gov.ua/laws/show/761-2024-%D1%80#Text

Ukraine is one of the most promising countries in Europe for the development of RES **- the potential for the construction of RES throughout Ukraine is more than 750 GW of installed capacity[7]:**

- more than 83 GW for SPP;
- more than 680 GW for WPP.

Geography of RES energy potential



Territorial waters of Ukraine - potential of 250 GW of installed capacity of offshore WPP

Source: Institute of Renewable Energy of the National Academy of Sciences of Ukraine

These capacities are sufficient to produce more than 2,200 TWh of electricity annually, which is equal to ~80% of the annual electricity consumption of all EU countries. This makes Ukraine an important partner for the EU's green transition and the decarbonisation of the European economy, through the export of green energy and green hydrogen.

[7] - https://www.ive.org.ua/wp-content/uploads/atlas.pdf

CHAPTER 2

Improving the legal framework for attracting investment in electricity generation

Improving the legal framework for attracting investment in electricity generation

In recent years, Ukraine has adopted a number of legislative changes to increase the investment attractiveness of power generation projects and simplify their implementation.

01

In 2023, the Verkhovna Rada of Ukraine adopted **Law of Ukraine №3220-IX dated 30 June 2023 "On Amendments to Certain Laws of Ukraine on the Restoration and Green Transformation of the Energy System of Ukraine"** in order to facilitate the development of the renewable energy sector in Ukraine. To this end, the Law introduced a number of **new mechanisms to support the development of a competitive RES market framework.** These include:

The introduction of the so-called Corporate PPAs, which offer the possibility to conclude long-term direct electricity purchase and sale agreements between a RES producer and a consumer, electricity supplier or trader

(Article 9-5 of the Law of Ukraine "On Alternative Energy Sources"). These agreements are virtual financial contracts and provide for the possibility of long-term fixing of the price of electricity produced by RES facilities. The physical purchase and sale of electricity is carried out separately in different market segments, while the counterparties settle the difference between market and contract pricing in cash. That is, if the price of electricity on the market is lower than the price specified in the contract, the consumer pays the difference to the RES producer, or, on the contrary scenario, the RES producer compensates the difference to the consumer.

The establishment of a mechanism for issuing guarantees of origin for electricity produced from RES, with the NEURC being designated as the authorised body for issuing guarantees of origin

to ensure their recognition in the European Union (Article 9-7 of the Law of Ukraine "On Alternative Energy Sources"). This is an important development for consumers, especially exporters, in view of the upcoming introduction of the carbon border adjustment mechanism (CBAM) with the European Union, as well as for the effective implementation of direct contracts.

Furthermore, the Government has approved the Procedure for Issuing Guarantees of Origin and the Procedure for Determining the Environmental Value of Electricity from RES[8]. Since October 2024, the register of guarantees of origin has been successfully operating while the first guarantees of origin have been issued and are being traded. The average price of a guarantee of origin is about UAH 13 per 1 MWh.

The improvement of the so-called "green" auctions, namely the mechanism for conducting auctions for the distribution of support quotas, taking

into account the world's leading experience (Article 9-3 of the Law of Ukraine "On Alternative Energy Sources"). A model of contracts for difference was introduced instead of a fixed tariff, and the list of documents for participation in the auction was simplified.

The winners of the auctions will receive a long-term contract with the State Enterprise "Guaranteed Buyer" for a period of 12 years. The maximum price bid from 2025 will be 8 euro cents per 1 kWh for SPP and WPP and 12 euro cents per 1 kWh for other types of RES (biomass, biogas, small HPP). The auctions will be held in accordance with the Procedure for conducting auctions for the allocation of support quotas[9].

The Government announced pilot auctions in 2024, with a total capacity of 110 MW (11 MW of solar, 88 MW of wind and 11 MW of other energy sources[10]). The first auction was held for 11 MW from other energy sources, attracting 2 participants. By the end of 2024, the Government must approve the decision to hold auctions in 2025 and determine the volume of quotas for 2026-2029.

[8] - https://zakon.rada.gov.ua/laws/show/227-2024-%D0%BF#Text
[9] - https://zakon.rada.gov.ua/laws/show/1175-2019-%D0%BF#Text
[10] - https://zakon.rada.gov.ua/laws/show/757-2024-%D1%80#Text

The creation of conditions for attracting investments in RES on the consumer side, in particular through the introduction of the Net Billing Model, a self-production mechanism

(Article 9-6 of the Law of Ukraine "On Alternative Energy Sources"). Household and non-household consumers have the right to acquire the status of an active consumer and install generating and/or ESF to cover their own consumption with the possibility of selling surplus electricity to electricity suppliers on market terms.

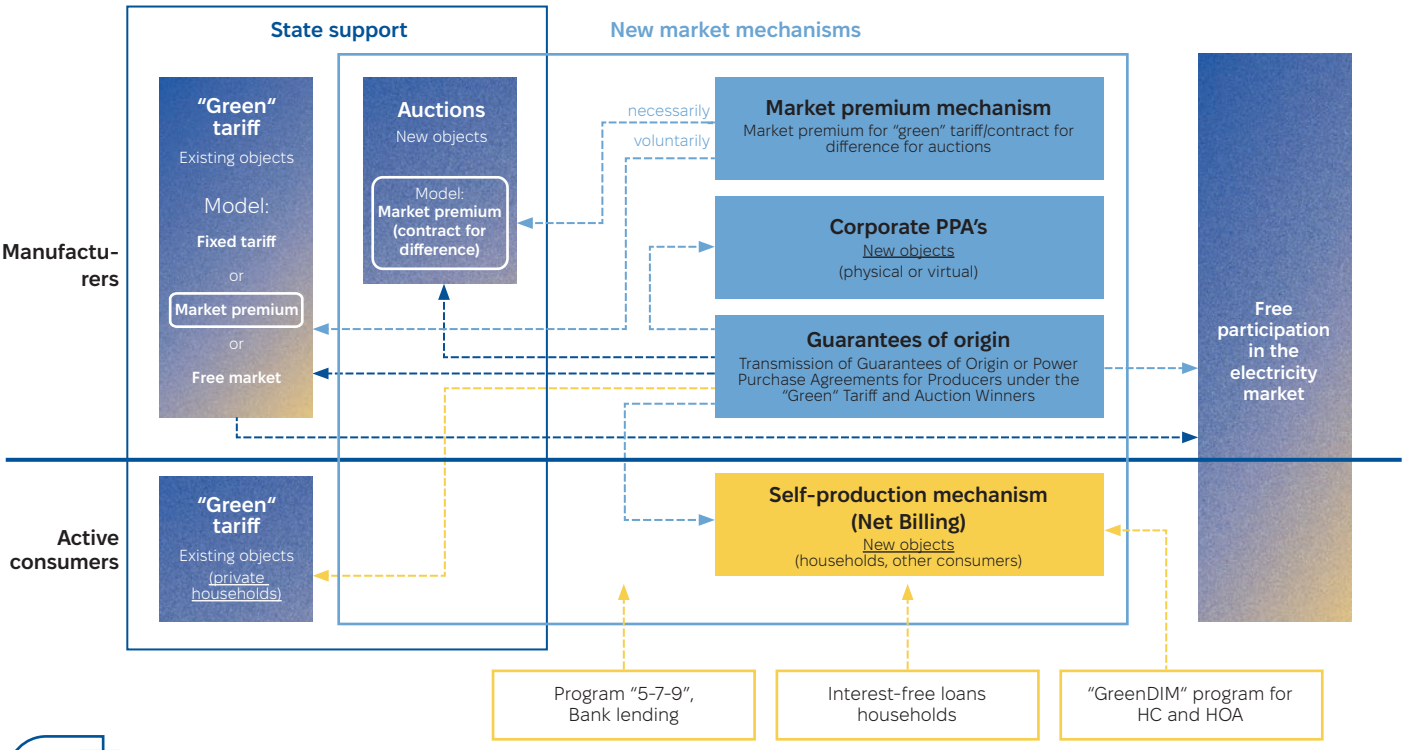
These market-based support models are expected to help attract investment in new RES projects.

At the same time, a recent NEURC resolution[11] provided existing RES facilities that received support under the "green" tariff model with the option to leave the balancing group of the Guaranteed Buyer, sell electricity independently on the electricity market and receive a market premium (feed-in premium model).

The development of a mechanism to resolve the issues with the debts incurred by the Guaranteed Buyer to producers under the "green" tariff model.

In particular, the Ukraine Facility 2024-2027 plan envisages eliminating the causes of the current debt by developing a roadmap for unbundling the renewable energy surcharge from the transmission tariff and further liberalising/reforming the energy market.

Simplifying and stimulating the implementation of distributed generation projects



02

Deliberate destruction of the energy infrastructure by the aggressor state has led to a shortage of generating capacity and necessitated a revision of plans for the development of Ukraine's energy sector. Thus, in July 2024, the Government approved **the Distributed Generation Development Strategy for the period up to 2035[12].**

The Strategy outlines the pathways and measures for the development of distributed generation, identifying private business entities as the main group for its implementation.

[11] - https://zakon.rada.gov.ua/laws/show/v0641874-19
[12] - https://zakon.rada.gov.ua/laws/show/713-2024-%D1%80#Text

03

In 2024, **a number of important legislative and organisational steps** were taken to develop distributed generation in Ukraine, in particular by private investors. These included:

- The provision of tax[13] and customs[14] benefits for the import of energy equipment into Ukraine;
- Simplification of the conditions for the construction and/or placement of gas piston and gas turbine plants (including cogeneration plants[15],), as well as the procedure for environmental impact assessment[16];
- Simplification of the procedures for procuring equipment and connecting to distribution systems[17], gas distribution networks[18] and heating networks[19];
- The establishment of a legislative framework and the holding of long-term special auctions for the procurement of ancillary services (various types of reserves) with a 5-year fixed price contract linked to the euro has been announced[20].

  On 15 August, Ukrenergo held a long-term special auction for the procurement of frequency maintenance reserves, with 11 winners financially guaranteeing the construction of 99 MW of power generation. These facilities are expected to start operations by October 2025. In addition, on 22 August, Ukrenergo held an auction for automatic frequency restoration reserve services, which allocated 240 MW of reserves for the load service (41% of the required volume), and 260 MW of symmetrical reserve (62% of the need)[21].
- The CMU has announced a tender for the construction of 700 MW of generating capacity and determined its terms and conditions[22]. The tender will follow the statutory procedure approved by the CMU on tenders relating to installation of generation capacity and implementation of demand management measures[23].

04

The Verkhovna Rada of Ukraine registered and adopted in the first reading the draft law on simplification of the business environment № 11392 dated 02.07.2024[24]. The draft law, which is currently awaiting its second reading, was **developed to significantly simplify the business environment** in terms of:

- Connecting customers to electricity, gas, heating and centralised water supply networks;
- Reducing time spent by customers on connection and eliminating barriers in the procedure for connection to utility networks;
- Launching the process of creating a nationwide geodetic information and technical system with accessible information on all utility networks;
- Creating favourable conditions for attracting investment in the development of energy and utilities markets;
- Ensuring the protection of the customers' rights, in terms of receiving high quality, timely and reasonably priced connection services.

[13] - https://zakon.rada.gov.ua/laws/show/3853-20#n2
[14] - https://zakon.rada.gov.ua/laws/show/3854-20#n2
[15] - https://zakon.rada.gov.ua/laws/show/1320-2023-%D0%BF#Text
[16] - https://zakon.rada.gov.ua/laws/show/1010-2017-%D0%BF#n12
[17] - https://zakon.rada.gov.ua/rada/show/v0352874-22#n13
[18] - https://zakon.rada.gov.ua/rada/show/v0355874-22
[19] - https://zakon.rada.gov.ua/rada/show/v1823874-23#n10
[20] - https://www.nerc.gov.ua/storage/app/uploads/public/667/d19/6fd/667d196fd62b6077612409.pdf
[21] - https://ua.energy/dopomizhni-poslugy/#1724134294973-419ecfbb-7d12
[22] - https://zakon.rada.gov.ua/laws/show/756-2024-%D1%80#Text
[23] - https://zakon.rada.gov.ua/laws/show/677-2019-%D0%BF#n42
[24] - https://itd.rada.gov.ua/billInfo/Bills/Card/44521

05

In order to address the problematic issues of the electricity market and advance integration with the EU, the draft law on the **unification of the electricity markets of Ukraine and the European Union** №12087 dated 02.10.2024 has been prepared[25]. The purpose of the draft law is to establish integrated European spot electricity markets (day-ahead and intraday), as well as to create a single market to implement exchanges of balancing services through pan-European platforms. This unification of markets will help to increase market liquidity.

06

In addition, to improve payment discipline in the electricity market, draft law №11301-d of 18.07.2024[26] is being developed to ensure that **certain market participants open current accounts with a special regime of use.** The draft law will introduce an algorithm for the distribution of funds from such accounts and will increase liability for unauthorised electricity withdrawals. Currently, the draft law is awaiting a second reading.

07

Lastly, the state has taken significant steps to **implement the REMIT Regulation,** a set of European rules and practices aimed at preventing abuse in wholesale energy markets and establishing liability for manipulation of the market. This allows NEURC to better supervise the wholesale energy market, including by adopting all necessary secondary legislation and implementing organisational, IT and data protection requirements. In particular, the regulator has established the Register of Wholesale Energy Market Participants and adopted a number of bylaws aimed at implementing the provisions of the Regulation.

[25] - https://itd.rada.gov.ua/billinfo/Bills/Card/44974
[26] - https://itd.rada.gov.ua/billInfo/Bills/Card/44584

CHAPTER 3

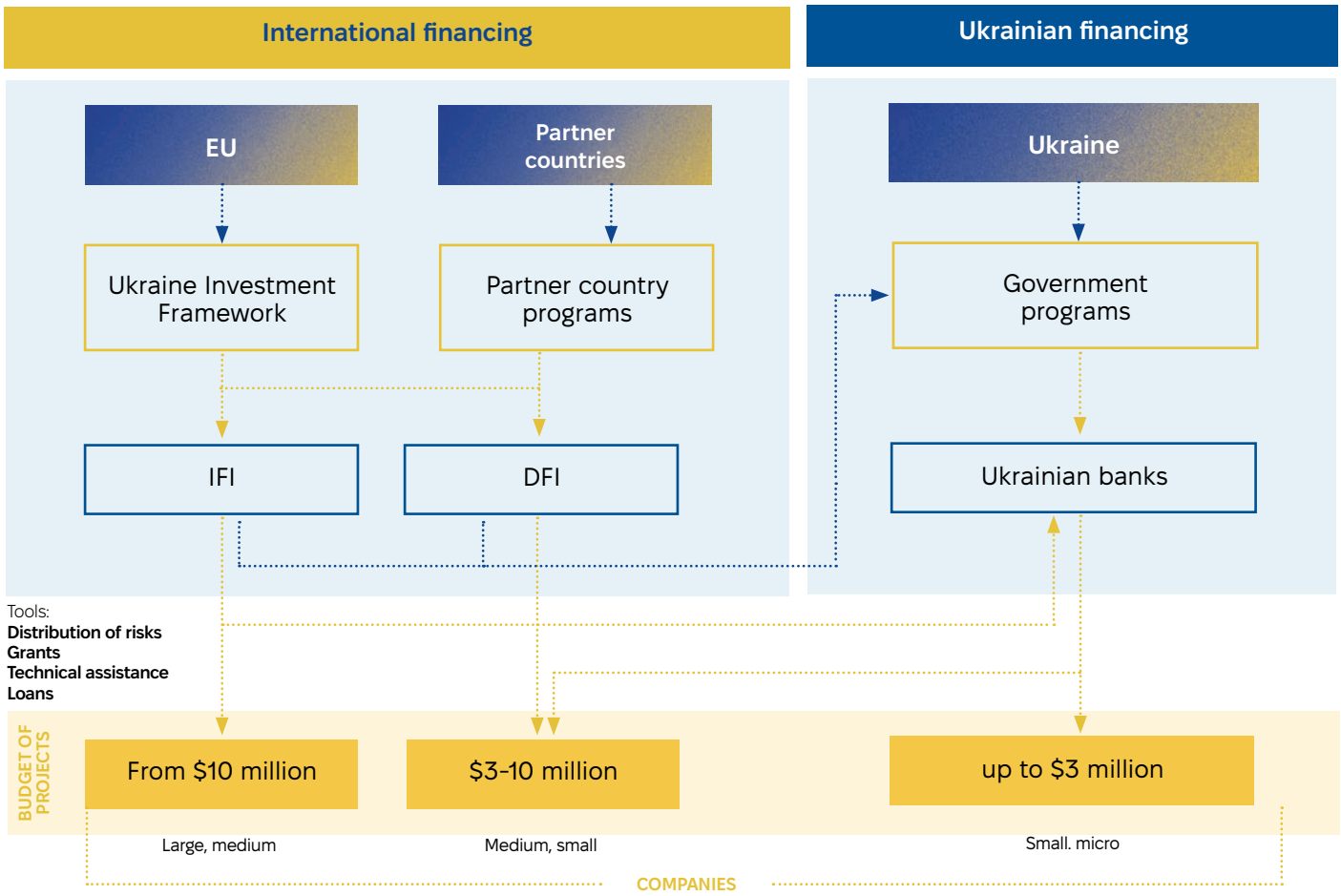
Sources of financing for energy projects

Ukraine has faced a major challenge in the form of significant losses of energy capacity as a result of Russia's regular missile attacks on key energy infrastructure. **Restoring and diversifying electricity and heat generation capabilities is one of the most important tasks for Ukraine today.** To implement this task, it is necessary to attract significant financial resources and effectively use the tools and programs of both IFIs and Ukrainian banks.

The largest existing program intended to finance Ukrainian businesses is the **€9.3 billion Ukraine Investment Framework (UIF)** from the EU, which is part of the Ukraine Facility (Pillar II). As supporting and developing the energy sector is one of the top priorities of the Government of Ukraine, companies can use UIF funding to implement energy projects in the country.

For **large projects** with a budget of **more than $10 million,** companies can attract financing from IFIs/DFIs. For **medium-sized projects** with a budget **of $3 to $10 million,** companies can seek funding from DFIs and, partially, from Ukrainian banks. Finally, for **small projects** with a budget of **up to $3 million,** companies can use financing from Ukrainian banks.

Map of financing programs for Ukrainian business, including projects in the energy sector



For more information on the UIF and available financing programs, please refer to the Practical Guide "Financial Instruments for Business in Ukraine" prepared by the KSE Institute in cooperation with the Ministry of Economy of Ukraine, available at **https://investportalua.com**

3.1. EFI funding programs and project areas in the energy sector

UIF financing is already available to Ukrainian companies through 5 Eligible Financial Institutions (EFIs) - 3 IFIs and 2 DFIs. This financing is available under Phase 1 of the UIF **(€1.4 billion)** and includes:

- **Provision of guarantees** (lowering collateral requirements, and enabling more companies to obtain larger amounts of funding and mitigate the high risks or collateral impairment).
- **Grants for mixed financing** (reducing the cost of loans).
- **Technical assistance.**

All financial products under the UIF program, which are implemented through Ukrainian banks, **can be combined with other programs and products** (grants, 5-7-9 program, etc.). This provides companies with more favourable conditions for obtaining financing.

Under Phase 1 of the UIF, the EIB, EBRD, IFC, KfW and BGK, which are funding projects in Ukraine either directly (for projects with budgets over $10 million) or through the Ukrainian banking sector.

All of these EFIs identify **the energy sector as one of their priorities for investment** and, depending on their strategic goals, finance both public and private sector projects[27].

EFI priority areas in the energy sector under UIF Phase 1

EFI	Priority areas in the energy sector	Historical funding structure
European Bank for Reconstruction and Development	Investing to stabilise and restore Ukraine's electricity grid and promoting RES	
European Investment Bank	Investing to stabilise and modernise Ukraine's electricity grid, as well as support RES and EE	
International Finance Corporation	Supporting critical infrastructure, including RES	
KFW Bank aus Verantwortung	Investing to stabilise and restore Ukraine's electricity grid and developing RES initiatives	
BGK Polski Bank Rozwoju	Investing in energy security, primarily in RES installations that meet the needs for reliable and sustainable energy in Ukraine, as well as the installation of RES onshore and offshore, and supporting the development of sustainable energy in Ukraine	

financing of private sector projects financing of public sector projects

Source: KSE Institute analysis

Most of the approved programs under Phase 1 of the UIF are primarily focused on energy sector financing. Combining these programs with the products of Ukrainian banks could assist in accumulating

up €1.7 billion

of potential funding in the coming years.

[27] - https://proifi.gov.ua

Potential funding from the implementation of UIF Phase 1 programs (guarantees, blended finance, grants)

EFI	Program name	Areas/projects in the energy sector	Potential funding for projects, € million
EBRD	**Financial Inclusion**	· Financing SME energy security and RES projects through Ukrainian banks	**160** (2024-2025)
EBRD	**Hi-Bar**	· WPP (120-150 MW) · Solar energy projects (150 MW) · Battery storage (~20 MW) · Biofuel production plant	**549** (2024-2025)
IFC	**Better Future Program**	· WPP (215 MW) and ESF · 150 MW WPP in western regions of Ukraine · 40 MW ESF project for wind generation	**370** (2024) **400** (2025)
KfW	**Green Growth Fund (GGF)**	· Financing SMEs through Ukrainian banks (Oschadbank, Ukreximbank) for the purchase of energy equipment · 94 MW of distributed SPP in western regions of Ukraine · More than 2 GW of WPP, SPP, ESF · 44 MW SPP	**40** (2024) **100** (2025)
KfW	**Reconstruction and rehabilitation of the electricity transmission infrastructure**	· Restore/replace damaged equipment at substations · Protective structures for substations · Emergency measures / equipment supply	**100** (2024)
GENERALLY available for private and public projects in the energy sector			**up to 1 719** (2024-2025)

Source: EFI data, analysis by the Ministry of Economy of Ukraine, KSE Institute analysis

It is worth noting that most IFIs are actively engaged in **direct lending to Ukrainian companies** and support projects related to sustainable development, particularly in the energy sector. EFI's requirements for attracting direct lending partially coincide with the requirements set by Ukrainian banks for borrowers, but there are certain key differences.

Basic criteria and requirements of leading EFIs for Ukrainian borrowers to receive direct lending

Criteria	Basic requirements			
	EBRD	EIB	IFC	KfW
Project type	Projects in the private sector, as well as some public sector projects that promote private sector development	Projects in the state and private sectors that meet the EIB's eligibility criteria	Private sector projects that are technically sound, beneficial to the local economy and in line with environmental and social standards	Projects that meet the development priorities of the partner country and the German government
Typical loan amount	Loans from €3 million to €250 million, average size loan - €25 million	Loans For the public sector, from €25 million for a single project and from €100 million for investment programs of framework loans	Transactions of at least $10 million	Each project is assessed individually to determine appropriate financing conditions
Financial reporting standards and audit requirements	Prepared in accordance with IFRS and audited by an independent auditor in accordance with the ISA			
Other important requirements		Has industry-specific compliance criteria and carries out in-depth credit risk assessment	Does not lend directly to SMEs or IEs, but supports small businesses through local banks	Does not provide grants or loans to private companies directly, but only through intermediaries such as EFSE, GGF or the EDF

Importan

BGK is currently considering an instrument to provide direct loans for investment projects for both European and Ukrainian private partners under EU guarantees, so the relevant requirements are still being developed.

3.2. Financing programs from Ukrainian banks for the energy sector

In June 2024, supported by the NBU, 20 banks with a share of more than 85% of the sector's net assets signed **a Memorandum on Bank Lending for Energy Infrastructure Rehabilitation Projects.**

Signatory banks:

- JSC "A-Bank",
- JSC "BANK CREDIT DNIPRO",
- JSC "CREDIT AGRICOLE BANK",
- JSC "KREDOBANK",
- PJSC "MTB BANK",
- JSC "OTP BANK",
- JSC "Oschadbank",
- JSC "PIRAEUS BANK ICB",
- JSC "PRAVEX BANK",
- JSC CB "PrivatBank",
- JSC "FUIB",
- JSC "Raiffeisen Bank",
- JSC "SENSE BANK",
- JSC "Ukrgasbank",
- JSC "Ukreximbank",
- JSC "Ukrsibbank".

The areas of financing may include projects for the construction of solar, wind, biogas, bioenergy, gas turbine and gas piston power plants, production of industrial batteries, highly maneuverable, accumulating cogeneration systems, etc. For MSMEs (including IEs), this extends to projects such as energy-saving doors/windows, solar panels, etc.

Results of the joint energy lending initiative:

During the period from June to October 2024, banks received 2,927 applications from businesses for loans to restore energy infrastructure projects totalling UAH 66.2 billion. Applications for infrastructure projects amounting to UAH 11.7 billion have already been approved. These include loan agreements already signed and agreements prepared for signature as of end October 2024 . Meanwhile, the total gross portfolio of loans related to the energy needs of legal entities has reached UAH 3.4 billion.

In general, Ukrainian banks offer various financing programs for energy sector projects, combining their own products with UIF instruments such as guarantees, blended finance and grants, **providing more favourable conditions for Ukrainian companies to attract financing.**

Ukrainian banks offer both specific programs with a focus on the energy sector and business entities (SMEs, CB, HOA) and general programs that also include financing energy projects.

The typical requirements of Ukrainian banks to borrowers, which may vary slightly depending on the institution, are as follows:

- Profitable activities;
- Compliance with ESG requirements;
- Positive business reputation;
- Debt / EBITDA ratio, usually no more than 3.5;
- Equity / Debt ratio is usually not less than 0.5;
- Debt Service Coverage Ratio is estimated to be above 1.2.

Important

The final decision to provide financing rests with the banks, which take into account the company's financial position, credit history and ability to meet its obligations.

Below is a list of Ukrainian banks' programs with a focus on the energy sector that are involved in the implementation of UIF Phase I.
The information presented in this section has been compiled and structured on the basis of publicly available information and data obtained from bank representatives.

Energy project financing programs in Ukrainian banks

Ukrgasbank. Financing Programs for the Energy Sector (1/4)

Program name	Renewable Energy Generation (REG) loans (CB, SMEs)	Available Loans 5-7-9% (CBs, SMEs)	Energy Independence of Individual Household Owners	Energy-Independent (individuals)
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds	State budget	Bank's own funds, state budget	Bank's own funds
Financial instruments	Credit	Credit, compensation, guarantee	Credit, rate compensation	Credit
Program amount	Not defined	Not defined	Not defined	Not defined
Program duration	Not defined	Not defined	Not defined	Not defined
Conditions for the bank's clients: · interest rate (%) · loan term · maximum loan amount · equity participation (%) · collateral requirements · regions	· up to 13.5% per annum; · up to 7 years; · up to €25 million; · >10% equity participation; · 100% of purchased equipment, no collateral for loans UAH 1 million for 36 months; · the government-controlled territory of Ukraine.	· up to 9% per annum (investment projects), 1% p.a. for the first 2 years for projects in the high war risk zone; · up to 10 years; · up to UAH 150 million; · >10% equity participation; · 100% of purchased equipment, no collateral for loans < UAH 1 million for 36 months; · the government-controlled territory of Ukraine.	· up to UIRD 3M UAH + 7 p.p., compensated by the EDF up to 0%; · up to 10 years old; · up to UAH 1 million for SPP/WPP/HPGSs, up to UAH 250 thousand for heat pump systems; · >15% equity participation; · 100% of the purchased equipment; · the government-controlled territory of Ukraine.	· up to 21.5% per annum; · up to 5 years; · up to UAH 500 thousand; · >10% equity participation; · without collateral; · the government-controlled territory of Ukraine.
Terms of financing and other important information	The terms and conditions are defined by the Memorandum on Lending for REGs initiated by the NBU.	RES (including biogas), energy storage, gas turbines and gas piston plants.	SPP and WPP from 1 kW to 10 kW, including hybrid inverters.	SPP, WPP, heat pumps and solar collectors, energy storage.

Ukrgasbank. Financing Programs for the Energy Sector (2/4)

Program name	Program of Support for EE and RES	State Program to Support the Financing of Energy-Efficient Investments by SMEs	Guarantee Mechanism under the Eastern Partnership DCFTA	UNIDO Credit Guarantee Fund
Source of funding (name of the IFI, state budget, etc.)	NEFCO	State budget	Bank's own funds with EIB guarantee facility	Bank's own funds with a guarantee from a first-class bank
Financial instruments	Loans	Loans	Loan with the use of a guarantee mechanism	Loan with 100% risk coverage guaranteed by a first-class bank
Program amount	€5 million	UAH 155.3 million	€40 million	$1.5 million
Program duration	December 2025	December 2024	December 2031	October 2025
Conditions for the bank's clients: · interest rate (%) · loan term · maximum loan amount · equity participation (%) · collateral requirements · regions	· the current bank's rate with the possibility of a reduction for eco-projects; · up to 7 years of age; · up to €1 million (or equivalent); · >20% equity participation ; · 100%; · the government-controlled territory of Ukraine.	· no more than UIRD (3 months) + 5 p.p. + loan fee up to 1.5% of the loan amount; · up to 5 years; · up to €500 thousand; · >10% equity participation; · 100% of the purchased equipment, up to UAH 1 million for 36 months, no collateral required; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 10 years; · up to €5 million (or equivalent); · >20% equity participation; · <65% of the loan amount; · controlled territory of Ukraine.	· the current bank's rate is reduced by the guarantee coverage; · up to 1.5 years; · up to $500 thousand;. · >20% equity participation; · without collateral; · the government-controlled territory of Ukraine.
Terms of financing and other important information	EE and RES projects.	Targeted use: investment purposes, working capital financing. EE and RES projects.	SME clients as defined by the EU.	EE, energy management, ESCO. A LE of private ownership or an IE.

Ukrgasbank. Financing Programs for the Energy Sector (3/4)

Program name	SME Competitiveness Program in the Eastern Partnership	Resilience and Livelihoods Programs (energy efficiency and security support mechanism)		Loan Program to Finance Sustainable Development
		Private, municipal and state-owned enterprises	HOAs and individuals	
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds with EBRD risk sharing facility	Bank's own funds with EBRD risk sharing facility		IFC
Financial instruments	Loan with risk sharing instrument, grant	Loan with risk sharing instrument, grant		Loan
Program amount	€50 million	€135 million	€15 million	€30 million
Program duration	October 2030	December 2032		January 2026
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· the current bank's rate; · up to 5 years; · up to €3 million (or equivalent); · >20% equity participation; · 100% of the loan; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 7 years; · up to €15 million; · >20% equity participation · >30% of the loan, no collateral for loans < UAH 1 million for 36 months; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 7 years; · up to €500 thousand for HOAs; €100 thousand for individuals; · >20% equity participation; · 100% of purchased equipment; · the government-controlled territory of Ukraine.	· the current bank's rate with the possibility of a reduction for eco-projects; · up to 7 years; · up to $8 million (or equivalent); · in accordance with the standard banking product; · in accordance with the standard banking product; · the government-controlled territory of Ukraine.
Terms of financing and other important information	SME clients as defined by the EU. Possibility of receiving a grant of up to 15% (up to 30% for veterans and IDPs).	Support for sustainable investments in Ukraine's energy security. Possibility to receive a grant of up to 15% (up to 30% for veterans and IDPs).	Support for sustainable investments in Ukraine's energy security. Possibility to receive a grant of up to 15% (up to 30% for veterans and IDPs).	EE, RES, sustainable development projects.

Ukrgasbank. Financing Programs for the Energy Sector (4/4)

Program name	The Program aims to provide access to finance for MSMEs	New Warranty Mechanism	New Loan Program as part of Finance in Motion	New Loan Program as part of Finance in Motion
Source of funding (name of the IFI, state budget, etc.)	BSTDB	Bank's own funds using the EIB guarantee facility	EFSE	GGF
Financial instruments	Loan Leasing	Loan with the use of a guarantee mechanism	Loan, grant	Loan, grant
Program amount	€15 million	€40 million (at the stage of approval)	Up to €20 million (at the stage of approval)	Up to €20 million (at the stage of approval)
Program duration	December 2025	(at the stage of approval)	December 2029	December 2029
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· the current bank's rate; · up to 7 years; · up to €1.5 million (or equivalent); · >30% of the project amount; · in accordance with the standard banking product; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 10 years; · not determined; · >20% equity participation; · not determined; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 5 years; · up to €1 million (or equivalent) for SMEs, up to €0.5 thousand for micro businesses; · >20% equity participation; · >100% of the loan; · the government-controlled territory of Ukraine.	· the current bank's rate; · up to 5 years; · up to €10 million for large private businesses; up to €0.5 million for SMEs, · >20% equity participation; · >100% of the loan; · the government-controlled territory of Ukraine.
Terms of financing and other important information	SME clients as defined by the EU.	SME clients as defined by the EU.	SME clients as defined by the EU. To finance working capital and investment projects. The possibility of receiving a grant.	To finance projects aimed at reducing energy consumption and CO_2 emissions. The possibility of receiving a grant.

Kredobank. Financing Programs for the Energy Sector

Program name	Energy Loan for Business	Resilience and Facilities Program the Existence of the EBRD (Resilience Program)	A framework program aimed at program coordination, funded by the EU to support for the development of MSMEs in the Eastern partnerships (EU4Business Guarantee Facility)	Competitiveness Program SME Competitiveness and Inclusion Program in the Eastern Partnership Countries
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds,, state budget (in case of combination with the program "Affordable loans 5-7-9%")	EBRD	BGK	EBRD
Financial instruments	Loans	Warranty	Warranty	Grants
Program amount	No restrictions	Not defined	Not defined	€20 million
Program duration	No restrictions	26 July 2023 – 8 September 2024 (The term will be extended for the following 12 months)	until January 2033	September 2024 – September 2025
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· 13.5% p.a. for the first 12 months, starting from the 13th month - UIRD 12m+3.5%. In the case of financing under the "Affordable Loans 5-7-9%" Program - in accordance with the terms of the program; · up to 5 years; · in accordance with the creditworthiness of the client and the collateral provided; · not less than 20%; · up to UAH 5 million, the collateral can only be the financed object; for amounts exceeding UAH 5 million, provision of additional hard collateral from 30% to 100% of the financing amount is required; · conducting business activities and registration in the territory controlled by Ukraine.	· from 15.5% per annum In the case of financing under the "Affordable Loans 5-7-9%" Program, in accordance with the terms of the program; · up to 2 years for working capital loans, up to 5 years - for investment financing; · €3 million; · not less than 30%; · providing security from 30% to 100% of the financing amount; · controlled by the Government of Ukraine territory.	· from 15.5% per annum In the case of financing under the "Affordable Loans 5-7-9%" Program, in accordance with the terms of the Program; · up to 2 years for working capital loans, up to 5 years - for investment financing; · €1 million; · not less than 30%; · provision of security from 0% to 100% of the financing amount; · controlled by the Government of Ukraine territories, including regions close to military operations.	· from 15.5% per annum In the case of financing under the "Affordable Loans 5-7-9%" Program, in accordance with the terms of the Program; · up to 2 years for working capital loans, up to 5 years for investment financing; · 10-15% - standard projects up to 30% - projects aimed at support for affected customers military operations and veteran business; · not less than 30%; · provision of collateral from 30% to 100% of the financing amount; · conducting business activities and registration in the territory controlled by Ukraine.
Terms of financing and other important information	Special terms and conditions for financing power generating equipment, including SPP, HPP, WPP, gas turbine, gas piston and biogas generating plants. Lending can be combined with the bank's existing guarantee Programs from IFIs (if necessary).	Available, including for the energy sector. Coverage of EBRD credit risk amounts to 50% of the financing amount.	Available, including for the energy sector. Coverage by the European Commission credit risk in the amount of 90% of the funding amount.	Supporting MSMEs through partial reimbursement of the cost of equipment that facilitates the transition to a "green" economy. Available, including for the energy sector.

Oschadbank. Financing Programs for the Energy Sector (1/2)

Program name	Loans of 5-7-9% for the Purchase and Installation of Power Generating Equipment	Loans of 13.5% for the Purchase and Installation of Power Generation Equipment	Affiliate Programs for the Purchase and Installation of Power Generation Equipment
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds	Bank's own funds	Bank's own funds
Financial instruments	Loans	Loans	Loans
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· 5-7-9%; the WACC is 1% for the first two years, then 5%; · up to 7 years; · up to UAH 150 million total limit per group of companies; · from 0%; · equipment (up to 12 months of deferred registration is possible); · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· the first year 13.5% fixed, from the second year - UIRD 3M+3%; · up to 7 years; · without restrictions (in accordance with the bank's credit policies); · from 0%; · equipment (up to 12 months of deferred registration is possible); · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· from 0.01% rate matrix; · up to 10 years; · without restrictions (in accordance with the bank's credit policies); · from 0%; · equipment (up to 12 months of deferred registration is possible); · territories controlled by the Government of Ukraine and outside the area of active hostilities.
Terms of financing and other important information	For own needs, sale of electricity without applying the "green" tariff and market premium'.	For own needs, the sale of electricity is unrestricted.	For own needs, the sale of electricity is unrestricted.

Oschadbank. Financing Programs for the Energy Sector (2/2)

Program name	EBRD Resilience and Livelihoods Program[1]	EBRD SME Competitiveness and Inclusion Program[2]	Loan under EIB and EIF agreements[3]
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds, EBRD	Bank's own funds, EBRD	Bank's own funds, EIB, EIF
Financial instruments	Guarantees	Business loans with a grant component	Guarantees
Program amount	€40 million	€10 million	n/a
Program duration	October 2029	October 2029	December 2031
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· interest rate in accordance with the terms and conditions of the BP under which the loan is granted; · from 9 to 66 months - for the purchase of fixed assets and from 9 to 30 months - for working capital; · up to €5 million or the equivalent in UAH/USD; · in accordance with the terms and conditions of the BP; · 50% of the loan amount is movable and/or immovable property; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· interest rate in accordance with the terms and conditions of the BP under which the loan is granted; · from 12 to 66 months (provided that the final date of lending does not exceed 18.10.2029); · up to €53 million or the equivalent in UAH/USD; · in accordance with the terms and conditions of the BP; · 50% of the loan amount is movable and/or immovable property; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· from 7% per annum (depending on the terms of the BP under which the loan is granted); · from 6 to 60 months - revolving credit line and from 24 to 98 months - non-revolving credit line; · up to €5 million or the equivalent in UAH/USD; · in accordance with the terms and conditions of the BP; · 70% of the loan is secured by the EIB guarantee, 30% of the loan amount is secured by collateral/mortgage of movable and/or immovable property; · territories controlled by the Government of Ukraine and outside the area of active hostilities.
Terms of financing and other important information	Objectives: working capital financing and financing of investment projects. The energy security sector is on the list of economic sectors eligible for funding.	The amount of the grant is up to 10% of the loan amount, but not more than €300,000 in equivalent. Objectives: financing working capital (for the purpose of carrying out core business activities), financing investment projects (acquisition of fixed assets). The energy security sector is on the list of economic sectors eligible for funding.	Objectives: creation/acquisition of fixed assets, capital expenditures, replenishment of working capital. The energy security sector is not prohibited from financing.

[1] - https://www.oschadbank.ua/msb/credit/programa-stijkosti-ta-zasobiv-isnuvanna-vid-ebrr
[2] - https://www.oschadbank.ua/msb/credit/programa-konkurentospromoznosti-ta-inkluzivnosti-msb-vid-ebrr
[3] - https://www.oschadbank.ua/msb/credit/eib-i-eif

Ukrsibbank. Financing Programs for the Energy Sector

Program name	Credit Risk Allocation Programs (EBRD Resilience and Livelihoods Program, Programs with IFC and DFC)
Source of funding (name of the IFI, state budget, etc.)	EBRD, IFC, DFC [new Programs are expected to be signed and existing ones expanded]
Financial instruments	Guarantees
Program amount	New Programs are expected to be signed and existing ones expanded
Program duration	up to 7 years
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· preferential; · 5-7 years; · is considered individually; · 20-30%; · a flexible approach, a combination of different assets is possible; · the territory of Ukraine, except for areas of active hostilities and frontline areas.
Terms of financing and other important information	Having group relations at the BNP Paribas level is an advantage for multinational companies. ESG projects are a priority.

Bank Lviv. Financing Programs for the Energy Sector (1/2)

Program name	Program to Support the Financing of Energy Efficiency Investments by SMEs	The Procedure for Providing State Guarantees on a Portfolio Basis in 2020 dated 25.11.2020, №1151; State guarantee agreement on a portfolio basis №13010-05/272 dated 31.12.2020	The Procedure for Providing State Guarantees on a Portfolio Basis dated 14.07.2021, №723; State guarantee agreement on a portfolio basis №13110-05/41 dated 31.03.2022
Source of funding (name of the IFI, state budget, etc.)	EDF	State budget	State budget
Financial instruments	Credit	Guarantees	Guarantees
Program amount	UAH 119.2 million	UAH 105 million	UAH 70 million
Program duration	January 2025	December 2025	March 2027
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· UIRD 3M+5%; · up to 5 years; · the equivalent of €500 thousand; · no client's equity participation is required (0%); · minimum contribution coverage ratio - 0.8-1; · western regions of Ukraine.	· no more than UIRD 3M+11%; · up to 10 years; · UAH 100 million; · no client participation is required (0%); · 50% - state guarantee on a portfolio basis; 50% - collateral from the client; · western regions of Ukraine.	· no more than UIRD 3M+11%; · up to 10 years; · UAH 100 million; · no client participation is required (0%); · 50%/80% - state guarantee on a portfolio basis; 50%/20% - collateral from the client; · western regions of Ukraine.
Terms of financing and other important information	Financing investment projects that will reduce energy consumption and CO_2 emissions by at least 20%.	The loan is covered by a 50% government guarantee.	The loan is covered by a 50%/80% government guarantee. Can be combined with the "Affordable Loans 5-7-9" Program.

Bank Lviv. Financing Programs for the Energy Sector (2/2)

Program name	The Procedure for Providing State Guarantees on a Portfolio Basis dated 14.07.2021, №723; State guarantee agreement on a portfolio basis №13110-05/105 dated 14.07.2023	Sustainability Program and Livelihoods (Resilience Program)	EU4Business Guarantee Facility
Source of funding (name of the IFI, state budget, etc.)	State budget	EBRD	EIB
Financial instruments	Guarantees	Guarantees	Guarantees
Program amount	UAH 100 million	Not defined	Not defined
Program duration	July 2028	From September 2024	December 2024 - December 20, 2027
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· no more than UIRD 3M+11%; · up to 10 years; · UAH 100 million; · no client participation is required (0%); · 50%/80% - state guarantee on a portfolio basis; 50%/20% - collateral from the client; · western regions of Ukraine.	· up to 26%; · 2 years for circulating, · up to 5 years for investment; · €3 million; · no client participation is required (0%); · 50% of the loan amount is guaranteed by the EBRD, the rest of the loan amount is collateral from the client; · western regions of Ukraine.	· up to 26%; · 2 years for circulating, up to 5 years for investment; · €5 million; · no client participation is required (0%); · 30-80% of the loan amount is a guarantee, the rest of the loan amount is collateral from the client; · western regions of Ukraine.
Terms of financing and other important information	The loan is covered by a 50%/80% government guarantee.	Available for any sector, including the energy sector, except for prohibited. The collateral is 50%.	Available for any sector, including the energy sector, except for prohibited. The collateral is 30-80%.

Privatbank. Financing Programs for the Energy Sector (1/3)

Program name	"Loan for Energy Independence" for business	Resilience and Livelihoods Guarantee Program	Resilience and Livelihoods Guarantee Program
Source of funding (name of the IFI, state budget, etc.)	Provision of a loan at the expense of the bank, with the possibility of receiving compensation % from the EDF	EBRD	EBRD
Financial instruments	Credit	Warranty	Grants
Program amount	€150 million	€75 million	€12 million
Program duration	September 2024 - June 2026		
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· fee under the "Affordable Loans 5-7-9%" Program: for small and micro businesses - 7%, for medium-sized businesses - 9%, for clients in the HWRZ* - 1% in the first two years of lending, and 5% thereafter; standard fee: UIRD 3M + 6% for micro businesses, UIRD 3M + 5% for small businesses, UIRD 3M + 3% for medium and large businesses; · from 1 to 5 years (depending on the loan amount); · from UAH 1 million to UAH 1 billion (depending on the business segment and the cost of equipment); · from 10% but not more than 20% of the cost of the equipment; · without collateral or equipment to be purchased, 50% of the loan amount EBRD guarantee, owner's guarantee · the territory controlled by Ukraine.		
Terms of financing and other important information	Target applications: power generators, uninterruptible power supplies, batteries, ESF, SPP, gas-piston power plants, solid fuel boilers, WPP, etc.		

*HWRZ - high war risk zone - territories included in the list of territories where military operations are (were) conducted or temporarily occupied, approved by the Ministry of Reintegration, except for Kyiv and Kyiv region, for which the date of termination of the possibility of military operations has not been determined, or territories from the date of completion of military operations (termination of the possibility of military operations) or temporary occupation of which less than three calendar years have passed as of the date of the loan agreement.

Privatbank. Financing Programs for the Energy Sector (2/3)

Program name	"Warm loans" for HC and HOA	Resilience and Livelihoods Guarantee Program	Resilience and Livelihoods Guarantee Program	"Loan for Energy Independence" for IEs and LEs	State guarantees
Source of funding (name of the IFI, state budget, etc.)	Provision of a loan at the expense of the bank, with the possibility of receiving compensation % from the EDF	EBRD	EBRD	Provision of a loan at the expense of the bank, with the possibility of receiving compensation % from the EDF	Provision of state guarantees on a portfolio basis
Financial instruments	Loans	Guarantees	Grants	Loans	Guarantees
Program amount	€20 million	€10 million	€5 million	up to €80 million, including €68 million for 2-year loans and €12 million for loans over 3 years	n/a
Program duration	No restrictions	No restrictions	No restrictions	4th July 2028	n/a
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· interest rate under the Program "Affordable Loans 5-7-9%": 1st year - 7%, from the 2nd year - UIRD 3M + 4% (with UIRD 3M fixed per year), but not more than 25% per annum; standard fee: UIRD 3M + 4% (with UIRD 3M fixed for a year), but not more than 25% per annum; · from 12 to 60 months; · from UAH 100 thousand to UAH 5 million; · n/a: · EBRD guarantee of 50% of the loan amount or no guarantee; · the territory controlled by Ukraine.			· the fee under the "Affordable Loans 5-7-9%" Program: 7% for small and micro businesses, 9% for medium-sized businesses, 1% for clients in the HWRZs in the first two years of lending, and 5% thereafter; standard fee: UIRD 3M+6% for micro businesses, UIRD 3M+5% for SMEs, UIRD 3M+3% for medium-sized enterprises and large businesses; · from 12 to 60 months (depending on the loan amount); · from UAH 1 million to UAH 1 billion (depending on the business and the cost of the equipment); · advance payment: from 10% but not more than 20% of the cost of the equipment; · without collateral or purchased equipment, 50% of the loan amount, state guarantees, owner's guarantee; · the territory controlled by Ukraine.	
Terms of financing and other important information	Electric generators, uninterruptible power supplies, batteries, ESF, SPP, gas-piston power plants, solid fuel boilers, WPP, etc. Deferred payment on the principal: up to 3 months - subject to participation in compensation Programs from local authorities; 1 month - without participation in compensation Programs.			Power generators, uninterruptible power supplies, batteries, ESF, SPP, gas-piston power plants, solid fuel boilers, WPP, etc.	

Privatbank. Financing Programs for the Energy Sector (3/3)

Program name	The GreenDIM Program
Source of funding (name of the IFI, state budget, etc.)	Energy Efficiency Fund
Financial instruments	Grant
Program amount	UAH 5 million
Program duration	constantly
Conditions for the bank's clients: · **interest rate (%)** · **loan term** · **maximum loan amount** · **equity participation (%)** · **collateral requirements** · **regions**	· not expected; · for the duration of the project implementation period, but not more than 6 months (in some cases, it can be extended for another 3 months); · the amount of the Grant for the client is up to 70% of the cost, but: no more than UAH 1 million for the installation of a SPP; no more than UAH 2 million for the installation of heat pumps. · If a SPP and a heat pump are installed at the same time, the grant can be paid in the amount of no more than ₴3 million per HC/HOA; · n/a; · not expected; · all except the occupied territory and the territory of active hostilities.
Terms of financing and other important information	Micro (HC/HOA)

Ukreximbank. Financing Programs for the Energy Sector (1/2)

Program name	Energy Independence for Corporate Clients	Procedure for Providing State Guarantees on a Portfolio Basis (CMU Resolution 1151 of 25.11.2020, CMU Resolution 723 of 14.07.2021)	The EBRD's Resilience and Livelihoods Program for Private Clients and Municipalities	Agreement on Participation in Risk Sharing without Pre-Financing by the EBRD (Resilience and Livelihoods Program) and the SME Competitiveness Program in the Eastern Partnership Countries
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds, funds of MFIs	State budget	EBRD	EBRD
Financial instruments	Loan or non-revolving credit facility	Loan or credit line partially covered by a state guarantee on a portfolio basis	Loan or non-revolving credit facility	Risk-sharing instrument, grants
Program amount	Not restrictions, but not more than €25 million per borrower/group	Not restrictions, but not more than UAH 100 million per borrower/group	€50 million	€40 million
Program duration	No restrictions	No restrictions	31 December 2024	31 December 2025
Conditions for the bank's clients: • **interest rate (%)** • **loan term** • **maximum loan amount** • **equity participation (%)** • **collateral requirements** • **regions**	· determined by the collegial bodies of the Bank; · up to 7 years; · up to equivalent to €25 million; · from 10%; · equipment to be purchased, other types of collateral; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· determined by the collegial bodies of the Bank; · up to 5 years, for reconstruction - up to 10 years; · up to UAH 100 million; · in accordance with standard procedures; · partial coverage by the state guarantee on a portfolio basis; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· determined by the collegial bodies of the Bank; · up to 5 years; · up to equivalent of €5 million; · in accordance with standard procedures; · in accordance with standard procedures; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· in accordance with the agreement with the EBRD; · up to 5 years; · up to approx. €3 million; · in accordance with standard procedures; · in accordance with standard procedures (taking into account 50% coverage by a risk-sharing instrument); · territories controlled by the Government of Ukraine and outside the area of active hostilities.
Terms of financing and other important information	Investment goals related to the implementation of energy independence projects secured by the object of financing; Possibility of combining with the Programs "Affordable Loans 5-7-9" and "Loans under state guarantees on a portfolio basis".	Can be combined with the "Affordable loans 5-7-9" Program.	Can be combined with the "Affordable Loans 5-7-9" Program and guarantee instruments.	Can be combined with the "Affordable Loans 5-7-9" Program. Not compatible with the Program "Loans under state guarantees on a portfolio basis" and other guarantee instruments.

Ukreximbank. Financing Programs for the Energy Sector (2/2)

Program name	Credit product "Lending for Energy Independence Projects" (for Small and Medium Businesses, Local Self-Government Bodies (Municipalities), and Economic Entities of the Communal Sector)	Program to Support the Financing of Energy Service Companies (ESCOs)	Program "Affordable loans 5-7-9%" (Financing of business entities that provide energy services to improve the energy efficiency of state and municipal property, as well as the construction and installation of gas turbine, gas piston and biogas generating units)
Source of funding (name of the IFI, state budget, etc.)	Bank's own funds, funds of MFIs	Bank's own funds	Bank's own funds, funds of MFIs
Financial instruments	Loan or non-revolving credit facility	Loan or non-revolving credit facility	Loan or non-revolving credit facility
Program amount	Not limited	Determined based on UNDP funding provided for ESCO grants to companies	Not limited
Program duration	Not limited	Submission of applications by clients until 31 October 2024 It is planned to continue in 2025	According to the Resolution of the Cabinet of Ministers of Ukraine №28 dated 24.01.2020
Conditions for the bank's clients: • **interest rate (%)** • **loan term** • **maximum loan amount** • **equity participation (%)** • **collateral requirements** • **regions**	· determined by the collegial bodies of the Bank; · up to 7 years; · up to UAH 200 million per borrower; · from 10%; · the object/property rights to the object of financing, other collateral acceptable to the Bank; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· determined by the collegial bodies of the Bank; · from 18 months to 7 years; · up to UAH 16 million to finance one energy service agreement; · from 10%; · object/property rights to the object of financing - mandatory, other collateral acceptable to the Bank; · territories controlled by the Government of Ukraine and outside the area of active hostilities.	· base: UIRD 3M + 7/5/4 p.p., compensation: from 5% to 9% per annum; · up to 7 years; · up to equivalent of UAH 150 million (with Group of Related Counterparties); · from 20%; · in accordance with standard procedures; · territories controlled by the Government of Ukraine and outside the area of active hostilities.
Terms of financing and other important information	Investment goals are related to the implementation of energy independence projects secured by the object of financing; Possibility of combining with the "Affordable Loans 5-7-9" Programs and state guarantees on a portfolio basis.	The grant to the borrower is funded by UNDP; the investment objectives are related to the implementation of energy independence projects (energy service contracts by ESCO companies); Can be combined with the "Affordable Loans 5-7-9" Program and state guarantees on a portfolio basis.	Can be combined with state guarantees on a portfolio basis.

Additional energy project financing programs from Ukrainian banks

	PJSC "MTB Bank"	JSC "FUIB"	JSC "Pravex Bank"	JSC "A-Bank"
Business entity	SME	SME	SME	MSMEs and CB
Amount of funding	from UAH 500 thousand to UAH 15 million	up to UAH 10 million	up to 80% of the cost of equipment	from UAH 2 million
Own contribution	from 30%	from 0%	-	from 20%
Loan currency	hryvnia	hryvnia	hryvnia	-
Term	· up to 5 years	· up to 5 years	· up to 2 years (without collateral) · up to 5 years (with collateral)	· from 1 to 3 years
Rate (Commission)	13.5% (Commission: according to the bank's tariffs)	at the level of the NBU discount rate in the first year, and floating rate linked to the UIRD for subsequent periods (Without commission)	16.5% per annum (Commission: 0.5% of the limit amount)	floating rate UIRD 12M + 3% (Commission: 1.5% of the loan amount)
Collateral	· the object of financing or other assets · property rights to cash flows · a guarantee by the owner or another business · corporate guarantee · guarantee of the ultimate beneficial owner	· flexible approach to collateral, possibility of blanket financing	maximum loan amount without collateral: · Up to UAH 500 thousand - for customers with a positive credit history in banks · up to UAH 300 thousand - for customers with no credit history in banks in other cases: · collateral of the equipment to be purchased	· equipment to be purchased or other liquid collateral · additional security - a guarantee by the founder (owner) of the business
Object of financing	construction: · SPP, WPP and biogas plants · gas turbine and gas piston power plants · industrial batteries · highly maneuverable ESF	electricity generation facilities: · SPP · generators · uninterruptible power supplies and batteries · other equipment for generating and storing electricity, as well as the costs of its installation and adjustment	power equipment: · generators · mini-SPP · heat pumps · solar panels · batteries · WPP and wind generation · other equipment that generates and/or accumulates electricity	power equipment: · power generators · uninterruptible power supplies · batteries · SPP · gas piston power plants · solid fuel boilers
Additional conditions	-	-	· the client's business activity must be conducted for at least 24 months	· mandatory insurance of the collateral

	JSC "Bank Credit Dnipro"	JSC "CREDIT AGRICOLE BANK"	JSC "SENSE BANK"	JSC "Raiffeisen Bank"
Business entity	LE and individuals	MSMEs	LE and individuals, IE; HOA, HC and united territorial communities	MSMEs and large businesses (LE and IE)
Amount of funding	up to €1.5 million in equivalent	up to 100% of the cost of the equipment / project	up to 100% of the cost of equipment or up to 70% of the total project cost	up to UAH 50 million
Own contribution	from 10% of the project size / equipment cost	from 0%	-	from 30%
Loan currency	hryvnia, US dollar, euro (for micro and small businesses: hryvnia)	-	hryvnia, US dollar, euro	hryvnia
Term	· up to 5 years	· up to 5 years	· up to 5 years · for territorial communities up to 6 years	· up to 5 years
Rate (Commission)	· from 13.5% per annum for the first year of financing, from UIRD 12M* +3% starting from the second year of financing (Commission: according to the bank's tariffs)	· 13.5% per annum or UIRD 3M + 0.5% for the first year of financing, thereafter URD 12M + 3% (Commission: 1% - one-time commission)	· 13.5% per annum for the first year of financing, thereafter URD 12M + 3% · from 6.9% in USD, from 6.7% in EUR (Commission: 0.25% of the loan amount, paid monthly)	· 13.5% per annum (or UIRD 3M + 0.5%) - for the first year of financing, UIRD 12M + 3% - starting from the second year of financing (Commission: up to 0.5% of the loan amount)
Collateral	· guarantee by the owner(s) holding at least 50% of the borrower's share capital · collateral of the subject of financing (property rights to the investment object) under the project · other acceptable collateral in accordance with the NBU's regulatory requirements	· equipment to be purchased · other security · state guarantee on a portfolio basis / EBRD guarantee / IFC guarantee	· collateral of the financed property, plant and equipment (including collateral of property rights based on the asset) and/or other liquid collateral	· equipment to be purchased (with a deferred condition for collateral registration) or alternative collateral · guarantee by the owner or other group companies
Object of financing	construction: · SPP, WPP and biogas plants · gas turbine and gas piston power plants · industrial battery storage systems · high-maneuverability ESF · cogeneration units	procurement, construction and modernisation of generating facilities: · gas turbines · gas piston · biogas	· purchase of equipment, construction of generating and cogeneration units for heat and/or electricity production · replacement and modernisation of existing equipment (boilers, low-power turbines, production equipment, etc.) · improvement of EE of enterprises	acquisition, construction and installation: · SPP · generating and/or cogeneration units, generators · biogas plants · WPP · bioenergy, gas turbine, gas piston power plants · ESF · biomass boilers · technologies to improve the EE of enterprises · other energy independence and EE technologies
Additional conditions	· borrower class no lower than Class 5	-	-	· existing business (from 12 months) · positive customer verification (KYC) · no negative credit history · no overdue payments to banks at the time of lending · compliance with the bank's environmental and social policy (ESG standards)

3.3 DFIs financing projects in the energy sector

In addition to the proposed programs of Ukrainian banks and leading EFIs, it is worth considering the possibility of **attracting funding from DFIs - organisations that provide financial support and investments to stimulate economic development** in developing countries.

The sources of funding for DFIs typically include funds from governments, insurance companies, pension funds, sovereign wealth funds, and EFIs. Some DFIs may also issue bonds and securities to finance their operations.

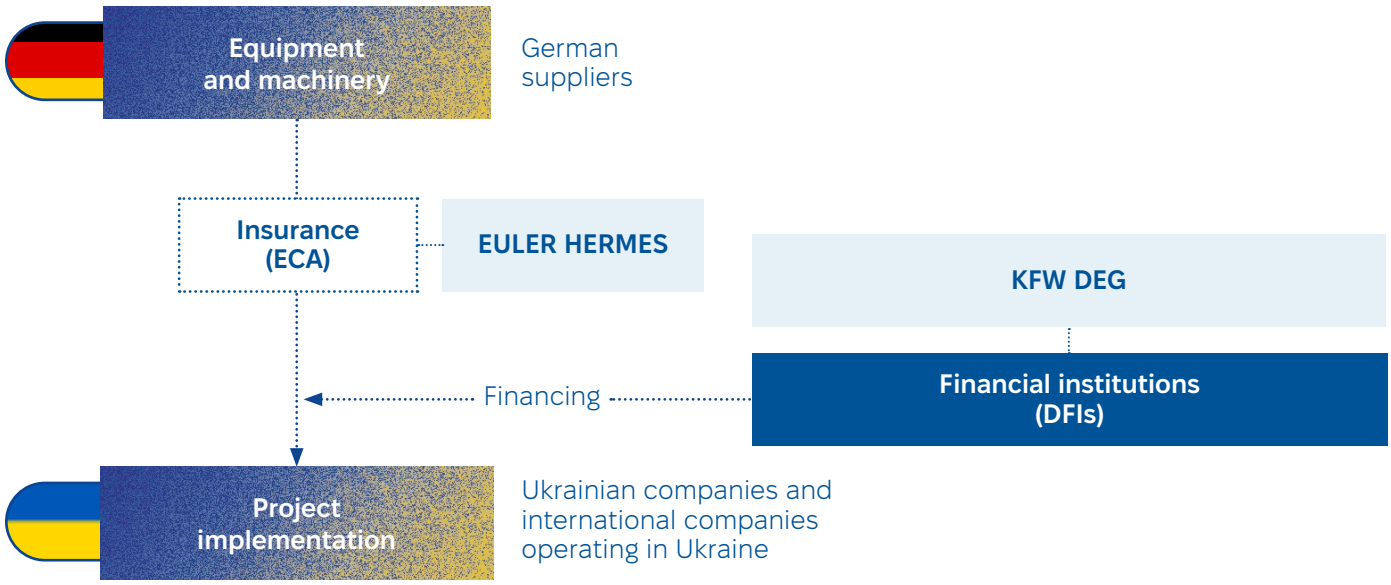
Most European DFIs are eligible for funding under the **€9.3 billion UIF program of the European Commission, in order to implement projects in Ukraine.**

DFIs fund projects in a variety of sectors and usually give **priority to projects that address climate change and/or promote sustainable development.** This includes financing RES projects and EE initiatives.

DFIs can invest in Ukraine in a variety of formats:

- through the ECA of their countries, insuring investment risks within the available limits, in order to support their own exporters (equipment manufacturers or companies investing in Ukraine);
- through directly financing Ukrainian businesses;
- through private equity and venture capital funds;
- through international banks, by providing credit lines and guarantees (which in turn are used to finance Ukrainian businesses).

Illustrative scheme: Financing the purchase of energy equipment through DFI and ECA (German example)



Below are the DFIs that specialise in financing energy projects with current investment support programs in Ukraine.

The following DFIs are involved in the Joint Platform with the EBRD, which aims to provide a framework for cooperation in joint investments in Ukraine, mainly in the private sector[28]

DFI	Country	Financing instruments	Export Credit Agency (ECA)	ECA limit for Ukraine, € million	Official website
Norfund		Debt and equity capital	Eksfin	operations to Ukraine are on hold	www.norfund.no
· In September 2024, the Government of Norway decided to allocate NOK 250 million (~€21 million) to Norfund for investments in Ukraine, with the development of RES among the main areas; · Preference is given to equity investments.					
JBIC		Debt and equity capital, Guarantees	NEXI	1 250	www.jbic.go.jp
· In October 2024, the JBIC provided a $150 million credit line to BSTDB to finance recovery and reconstruction projects in Ukraine, of which up to $75 million will be used to implement green initiatives and promote environmental sustainability in the Black Sea region; · BSTDB operates on the basis of the generally accepted practices of large international banking institutions, in particular with regard to project financing and lending.					
Swedfund		Debt and equity capital, Technical assistance	EKN	29	www.swedfund.se
· Projects in Ukraine are supported through the Project Accelerator, a division within Swedfund whose activities are aimed at supporting public project owners in developing countries to develop and implement more efficient projects. The energy sector, including renewable energy, is one of Swedfund's key investment areas; · In 2023, the Project Accelerator received targeted funding totalling SEK 50 million for projects in Ukraine, which includes the preparation of FS; · Swedfund may invest through private equity and venture capital funds.					
FMO		Debt and equity capital, Guarantees	Atradius	60	www.fmo.nl
· FMO's portfolio includes projects in Ukraine, including in the renewable energy sector; · FMO can make investments through private equity and venture capital funds.					
KFW		Debt and equity capital	Euler Hermes Aktiengesellschaft	250	www.deginvest.de
· KfW DEG, the subsidiary of the KfW group focusing on development finance, sees RES projects as a key area for investment in Ukraine under the "develoPPP" program; · To participate in the program, Ukrainian companies need to apply for funding under the special "develoPPP" competition.					
IFU		Debt and equity, Guarantees	EIFO	108	www.ifu.dk
· In 2023, the Danish government decided to reform the IFU, by increasing its managed capital from DKK 15.5 billion (~€2 billion) to DKK 36.2 billion (~€4.9 billion) by 2030. This will enable the IFU to invest in a much larger number of development projects and significantly increase climate investments in fragile states, including Ukraine; · IFU invests in developing countries in the energy, water and waste management sectors, including RES projects such as wind and solar power.					
SIFEM		Debt and equity capital, Guarantees, Technical assistance	SERV	n/a	sifem.ch
· The share of energy and water projects in SIFEM's total portfolio at the end of 2023 was 12%, including projects in Ukraine; · SIFEM invests in RES projects through the Interact Climate Change Facility, a special investment fund to finance projects aimed at combating climate change and improving climate efficiency in developing countries.					

The following DFIs are involved in the Joint Platform with the EBRD, which aims to provide a framework for cooperation in joint investments in Ukraine, mainly in the private sector[28]

DFI	Country	Financing instruments	Export Credit Agency (ECA)	ECA limit for Ukraine, € million	Official website
COFIDES		Debt and equity capital	CESCE	**30**	www.cofides.es
· Cofides manages the financial cooperation portfolio of the Spanish Agency for International Development Cooperation (AECID), promoting sustainable development in transition economies and developing countries; · Cofides' portfolio includes investments in Ukraine, including WPP.					
CDP		Debt capital, Grants	SACE and SIMEST	**1 500**	www.cdp.it
· In February 2024. CDP backed, on behalf of the Italian government, a €100 million concessional loan to Ukrhydroenergo, the state-owned Ukrainian company responsible for hydroelectric power generation.					
PROPARCO		Debt and equity capital, Guarantees	Bpifrance Assur-ance Export	**400 (ліміт групи AFD)**	www.proparco.fr
· During URC 2024, Proparco expressed its intention to join the EBRD's Trade Finance program by signing a $50 million risk-sharing facility with the EBRD with the purpose of strengthening the Ukrainian private sector; · In October 2024, the Verkhovna Rada ratified agreements with the Government of France on the establishment of the AFD Group's representative office in Ukraine and the activities of Proparco in Ukraine; · Proparco's portfolio includes investments in Ukraine, including WPP.					
Finnfund		Debt capital	Finnvera	**50**	www.finnfund.fi
· In December 2023, the Finnish government prepared the Finnish National Plan: Rebuilding Ukraine, which provides for a special allocation of €25 million for the Finnfund to be used by the end of 2025 for investments in Ukraine. The funds will be used for projects involving Finnish companies, particularly in the energy sector; · Finnfund pays special attention to sectors that are critical for sustainable development, including renewable energy.					

Source: KSE Institute analysis

[28] - https://www.ebrd.com/news/2023/ebrd-and-dfis-establish-ukraine-coinvestment-platform.html

CHAPTER 4

Practical recommendations for preparing investment projects

4. Practical recommendations for preparing investment projects

International and local financial institutions are ready **to actively engage with private companies in Ukraine that are interested in implementing energy projects** and provide financing to support the functioning of the energy system and the development of new energy initiatives.

Projects financed through financial institutions **must meet bankability requirements** and **have a measurable positive impact**. Additional requirements for projects may include:

Additional requirements for projects may include:

- creation of new jobs
- increase in tax revenues
- providing net benefits to the environment
- promoting local infrastructure development and positive changes in the energy sector.

It is recommended to identify potential sources of funding (IFIs, Ukrainian banks, private partners) at the initial stages of project preparation and consider their requirements in structuring the project

Key steps in the financing process

Today, IFIs are interested in financing large investment projects implemented by both private and state-owned companies in the energy sector. This typically includes projects with a budget of more than $20 million. To finance smaller projects, companies usually cooperate with financial intermediaries in the Ukrainian market, namely commercial banks. **It is possible to obtain financing for individual projects (project finance)** or **for a business** based on its operational and financial performance **(corporate finance).**

When obtaining **project financing, the key factor in the evaluation is project performance** (planned capacity, economic indicators, etc.). In the case of **corporate financing, the key factor is company performance** (profitability, structure and size of capital, debt burden, etc.). In general, both types of financing are available: debt and equity.

The process of **obtaining financing** from banks can take **from several months to a year, depending on the complexity of the project.** Typically, the timeframe for obtaining financing from Ukrainian banks is shorter than from IFIs.

It is recommended to identify funding sources based on the timeframe and project needs to ensure timely and effective mobilisation of the necessary resources.

Once the basic compliance requirements have been met, the **decision-making process typically consists of three main stages:**

01

Preliminary review of the concept and its approval by the credit committee of the financial institution

02

Evaluation and verification of the business plan (FS)

03

Final approval, leading to a decision to grant or deny funding

To successfully complete each stage, the applicant company must:

- have a clearly developed investment proposal with technical and financial justifications;
- demonstrate experience in implementing similar projects or engage a strategic partner that possesses such experience (if the applicant company does not have it);
- understand the specifics of the Ukrainian energy market;
- have reliable partners: designers, equipment suppliers, contractors for the construction and installation of equipment, etc.

Requirements for investment proposals and related milestones

- For a project to be considered for funding by financial institutions, it must meet a series of **key requirements. In particular, the project should:**

- be implemented in Ukraine.
- have prospects for profit.
- meet the demand for energy services or products and have a scientifically grounded technical approach.
- promote the development of local energy infrastructure and the economy as a whole.
- meet environmental standards and energy security requirements.
- be initiated by a financially stable company that has the appropriate organisational capacity and/or experience to implement the project (in the case of a corporate loan rather than project finance).

- **Investment proposals should contain the following key elements:**

- **Organisational competence** – information about sponsors, current and future shareholders, financial position, management and technical aspects (availability of appropriate infrastructure, agreed terms, etc.).
- **Market potential** – a description of the market size, competitive environment and commercial model for generating revenue, as well as a description of the legal framework and regulatory requirements applicable in the energy sector that affect the company's financial performance.
- **Technical feasibility** – technical approach, operational costs, quality and reliability of technologies, and environmental measures.
- **Investment profile** – financing structure, project profitability, and expected ROI.
- **Country context and development impact** – government support, energy regulation and contribution to energy sector development.
- **Risks** – identification and algorithms for mitigating project risks.
- **Timeline** – a project implementation plan with the key stages clearly defined.

- After an initial review of the concept, the next step is a **thorough assessment of the business plan and/or FS of the project**, including a review of the possible risks and benefits of implementation.

Recommended steps

In order to obtain financing from IFIs and/or commercial banks, **a properly structured FS must be prepared. The FS should demonstrate the viability of the project**, taking into account potential risks and meeting the requirements of investors/financial institutions.

Below is a structured approach to preparing an effective FS:

- Start with a **Project Summary** that provides a brief overview and clear statement of the project objectives (e.g., construction of a new power plant, modernisation of existing infrastructure, transition to RES). It should include the purpose and expected outcomes, key financial indicators such as NPV and IRR, a brief description of the target market, and an overall implementation schedule.

- Next, provide a **Project Description** that explains in detail the background, rationale, and scope of the project. Include information on the location, infrastructure and roles of stakeholders in the project as well as relevant information about the company planning to implement the project, its experience, competence, and personnel involved.

It is recommended to include in the FS staff with relevant experience in implementing similar projects and to showcase their experience in the project description

- **Market analysis** is essential to assess the market situation and demand. Include an overview of market size and growth trends, analyse competition and identify growth opportunities. Where possible, provide forecasts based on relevant data.

It is recommended to carry out a detailed commercial analysis that identifies future consumers. It is advisable to have signed letters of intent or other documents with potential consumers

- **In the legal and regulatory framework** section, share information on all necessary permits and licences to operate in the Ukrainian electricity market and the arrangement of lease/property rights for the project's core components. In addition, define in detail the roles and responsibilities of institutions and assess potential legal risks.

It is recommended to develop a clear communication strategy for public consultations with communities at the early stages of the project and follow through during the implementation phase

- In the **FS** section, describe the technical design and technologies to be used (selection of technologies and equipment), as well as the development of technical schemes and project structures (project specifications), including calculation of the planned capacity, performance and expected service life of the equipment. Clearly justify and describe the interaction with the electricity grid operator, connection conditions, contracts, certification tests, etc. Evaluate the suitability of the implementation site, describe alternative technical solutions, and explain why the declared project implementation model was chosen. For example, wind monitoring i.e., measuring wind speeds and directions, taking into account seasonal changes, is important for WPP projects . In addition, identify potential technical risks and propose mitigation strategies. It should be noted that some financial institutions have a ban on financing the purchase of equipment manufactured in certain countries. There are also restrictions on financing certain technologies based on their environmental impact (fossil fuels, mining, etc.). These restrictions are usually published on the respective financial institutions' websites.

When applying for funding to IFIs, it is recommended to engage international consulting engineers at key technical stages, as this will simplify the due diligence process

- **The financial analysis** should include a detailed breakdown of the project's revenue and expenses, including capital expenditures (CapEx) and operating expenses (OpEx). Outline the sources of funding, such as equity or loans, and calculate key financial indicators such as NPV, IRR, and ROI. Include a sensitivity analysis to show how the project will perform under different conditions and provide a detailed cash flow forecast. The financial performance of the project must reflect profitability potential. However, depending on each financial institution's criteria, projects can be evaluated not only for financial but also for other non-financial benefits, such as environmental or social impact.

When applying for funding to IFIs, it is recommended to engage experienced audit/consulting companies to develop or review the financial model, as this will simplify the due diligence process

- Include **an economic impact** section to highlight the wider benefits of the project.

  Carry out a CBA and estimate the number of jobs that can be created.

It is recommended that the project be aligned with regional or national development priorities to emphasise its alignment with strategic goals and to secure additional support from government agencies and stakeholders

- **Assessing environmental and social impact** is essential, especially when obtaining funding from IFIs. Assess **environmental impact**, such as impact on air, water and biodiversity, as well as **social impact**, including net benefits to the community and the potential need to resettle local populations. Confirm compliance with the environmental and social standards of IFIs and propose a sustainability plan that will ensure the long-term benefits of the project.

When applying for funding to IFIs, it is recommended to conduct an ESIA (environmental impact assessment of the company's activities according to international standards)

- **A risk assessment** should also be conducted to identify financial, technical, market, environmental, social and military risks. Assess their potential impact and likelihood, and develop strategies to mitigate or manage them.

It is recommended to insure the key stages of the project (logistics to transport the necessary equipment, installation work, etc.)

- Present a clear **implementation plan** that includes a timeline with milestones, a procurement strategy that meets the requirements of IFIs, and a monitoring and evaluation system with well-defined and quantifiable key performance indicators (KPIs).

The estimated average timeframe for the implementation of greenfield projects for WPP is 4-5 years. This includes 2-3 years for project development (preparation), up to 1 year for raising funds, and 1-2 years for the construction phase.

- Finally, include an **appendices** section with supporting documents such as detailed financial models, technical drawings, market data and drafts of the legal documents.

Key recommendations

01

Align the FS with investor priorities, including sustainability and social benefits

02

Ensure that all forecasts and assumptions are supported by reliable data

03

Use a clear and professional structure with visuals to enhance readability

By following these recommendations, the project proposals are more likely to meet the requirements of IFIs and commercial banks. In turn, this will significantly increase the chances of obtaining financing and successful project implementation.

CHAPTER 5

Investment opportunities in the energy sector

5.1. General list of investment projects

Between August 2023 and November 2024, the KSE team, in cooperation with the Ministry of Economy of Ukraine, collected **326 investment projects** in the energy sector aimed at electricity generation and distribution, with **a total budget of over $65 billion.**The largest categories are: **NPPs ($20.3 billion), WPPs ($17.8 billion),** and **electricity transmission and distribution ($13.1 billion).**

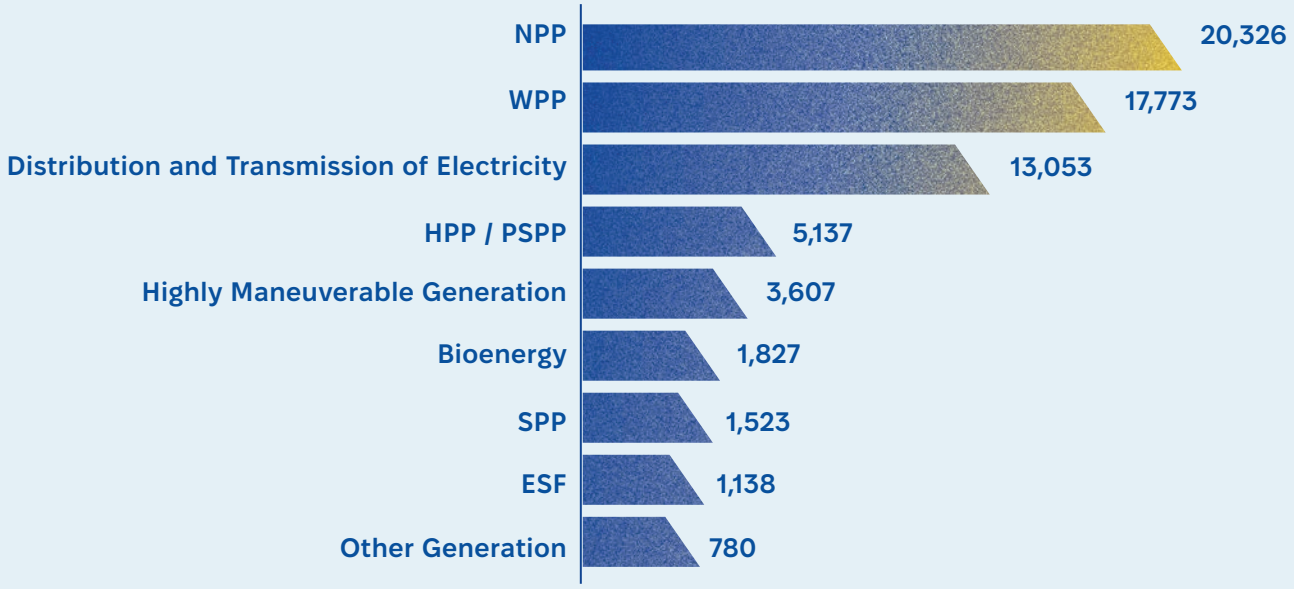
It is also worth mentioning the passive energy protection projects (>$2.8 billion budget) and the projects to support the State Decarbonisation Fund ($125 million budget) that were submitted by the Ministry of Communities and Territories Development of Ukraine for inclusion in the Investment Guide, presented at URC 2024 in Berlin[29].

Natural gas and oil production and refinery projects are not included in this guide.

326
investment projects

Over
$65 billion
in total budget

Breakdown of investment projects in the energy sector by category, $ million



Source: KSE Institute

[29] - https://investportalua.com/investment-guide/

5.2. Examples of promising projects

The largest number of promising investment projects is concentrated in the **renewable energy** sector and includes a total of **42 projects with a budget of $4.4 billion.** Also, a significant share of such projects' overall budget is occupied by **PSPP projects. This includes 2 projects with a budget of $2.8 billion,** which play a balancing role in the energy system and do not generate additional greenhouse gas emissions. These initiatives not only align with the EU's goals of transitioning to a climate-neutral economy and the principles of sustainable development, but also promote the introduction of modern technologies in Ukraine.

The development of additional RES will be a key driver in accelerating the industrial green transition and decarbonising Ukraine's economy. RES are expected to reduce dependence on fossil fuels and increase the country's competitiveness in the context of global climate policy, as well as facilitate the export of green energy resources to the EU after the war.

At the same time, it is important to emphasize the need for constructing flexible generation and modern ESF systems. This will help balance potential fluctuations in power generation from RES, ensure the stability of Ukraine's energy system, and meet the growing demand for energy resources.

TOP-50 most advanced energy projects

Total budget: $7.7 billion, Need for external financing: $6.4 billion.

Brief description of the project	Budget, $ million	Required funding, $ million	Implementation stage	Year the project started	Project implementation (launch) period, years
Hydroelectric power plant / Pumped storage power plant					
Construction and commissioning of the 1,000 MW Kanivska PSPP	1,523.0	1,062.2	Under implementation	2026	6.5
Construction and commissioning of the 972 MW Dniester PSPP	1,255.0	1,255.0	Under implementation	2023	5
Wind power plant / Solar power plant / Energy storage facilities					
Construction of the complex: 460 MW WPP + 460 MW SPP + 100 MW ESF in Odesa region	903.0	678.0	Ready for Implementation	2024	2
Wind power plant					
Construction of a WPP (200.6 MW / 34 turbines) in Rivne region	308.0	308.0	Ready for Implementation	2025	2
Construction of WPP: 30 wind turbines, total capacity - 156 MW in Zakarpattia region	285.0	285.0	Concept	2024-2025	2
Construction of a WPP with a capacity of up to 168 MW in the Kyiv region. The project will be implemented in stages.	265.0	180.0	Under implementation	2027	1.5

Brief description of the project	Budget, $ million	Required funding, $ million	Implementation stage	Year the project started	Project implementation (launch) period, years
Wind power plant					
152.5 MW WPP in Cherkasy region	254.9	254.9	Ready for Implementation	2024	2.5
Limanska WPP (158.6 MW)	230.0	150.0	FS/ pre-FS	2025	1.5
Lviv WPP (100 MW)	210.0	200.0	FS/ pre-FS	2025	1
Construction of a WPP with a capacity of up to 120 MW in the Volyn region. The project will be implemented in two phases of 60 MW each	200.0	135.0	FS/ pre-FS	2026	1.5
Wind of Independence project (WPP Petrivska). Stage I - 93 MW	171.0	120.0	Ready for Implementation	2025	2
Construction of WPPs: 13 wind turbines, total capacity - 68 MW in Zakarpattia region	125.0	125.0	Concept	2025-2026	2
86.8 MW WPP in Cherkasy region	104.6	104.6	Ready for Implementation	2025	2.5
Expansion of the existing WPP in Odesa region (32 MW) by an additional 66 MW	95.0	71.3	Ready for Implementation	2024	1
Volodymyrets WPP with a total capacity of 72 MW in Rivne region	93.5	70.0	Ready for Implementation	2025	1
Danube Spring WPP (58.5 MW)	83.0	57.0	FS/ pre-FS	2025	1.5
61 MW WPP in Cherkasy region	73.5	73.5	Ready for Implementation	2025	2.5
54 MW WPP in Kirovohrad region	65.0	65.0	FS/ pre-FS	2027	2.5
40 MW WPP in Kyiv region	48.2	48.2	FS/ pre-FS	2026	2.5
25 MW WPP in Kyiv region	30.1	30.1	FS/ pre-FS	2026	2.5
Construction of a WPP (100.3 MW / 17 turbines) in Lviv region	154.0	154.0	Ready for implementation	2025	2

Brief description of the project	Budget, $ million	Required funding, $ million	Implementation stage	Year the project started	Project implementation (launch) period, years
Solar power plant					
SPP project with energy storage in Novovolynsk Industrial Park (15 MW)	25.0	24.4	FS/ pre-FS	2024	1.25
SPP with a peak capacity of 65 MWp in Zhytomyr region	45.5	45.5	FS/ pre-FS	2025	1
41.1 MW DC SPP in Kyiv region	17.2	17.2	FS/ pre-FS	2025	1
37 MW DC SPP in Kyiv region	15.4	15.4	Ready for implementation	2024	1
32.1 MW DC SPP in Kyiv region	13.4	13.4	Ready for implementation	2024	1
A 30.6 MW DC SPP in Lviv region	12.7	12.7	Ready for implementation	2024	1
Construction of a 17.7 MW SPP in Kyiv region	11.6	9.3	Ready for implementation	2025	1
27 MW DC SPP in Ivano-Frankivsk region	11.0	11.0	Ready for implementation	2024	0.5
Construction of a 5 MW SPP in Dnipro region	5.6	5.6	FS/pre-FS	Since funding	0.5
Construction of SPP with a total capacity of 8.5 MW (AC) - 11 MW (DC) in Cherkasy region	5.5	5.5	Under implementation	2019	Depends on available funding
SPP with a capacity of 4.9 MW in Zakarpattia region	2.2	1.8	Under implementation	2019	6
Electricity distribution and transmission					
Network development to ensure free capacity for new connections in Odesa power grids	161.7	161.7	Ready for implementation	2024	10
Implementation of smart metering of electricity in Kyiv power grids	157.0	157.0	Ready for implementation	2024	10
Automation of the 10 kV network of Dnipro power grids	138.7	138.7	Ready for implementation	2024	10
Automation of the 10 kV network of Kyiv power grids	56.3	56.3	Ready for implementation	2024	10
Replacement of emergency/ worn-out sections of 6-20 kV cable networks of Kyiv regional power grids	45.1	45.1	Ready for implementation	2024	10

Brief description of the project	Budget, $ million	Required funding, $ million	Implementation stage	Year the project started	Project implementation (launch) period, years
Energy storage facilities					
Installation of hybrid storage systems at five generating facilities	250.0	70.0	FS/ pre-FS	2024	3
ESF with a storage capacity of 25 MW in Kyiv region.	30.0	30.0	Ready for implementation	2025	1.25
ESF with a storage capacity of 24 MW in Kirovohrad region.	28.8	28.8	Ready for implementation	2024	1.25
Highly maneuverable generation					
Construction of a 30 MW distributed gas generation network in Volyn region	25.0	15.0	Under implementation	2023	0.5
Highly maneuverable generation / Bioenergy					
Construction of a new 3 MW biogas/ biomethane plant in Kyiv region for domestic consumption and export of biomethane (2.1 million m3 per year)	9.6	6.3	FS/ pre-FS	2025	1-1.5
Construction of a 2.4 MW biogas plant in Chernihiv region	6.5	6.5	FS/ pre-FS	2024	1
Bioenergy					
Bioethanol and DDGS production project in Rivne region (102 thousand m³ bioethanol per year, 90 thousand tonnes of DDGS per year)	77.2	55.0	FS/ pre-FS	2025	2
Plant in Kyiv region with annual biomethane production of 7.4 million m³ and 15 thousand tonnes of food-grade liquefied CO2 as part of the first phase	27.3	24.0	Ready for implementation	2025	1
Bio-LNG with a capacity of 5 million m³ of biomethane per year in Ternopil region	25.20	17.60	Under implementation	2024	2
Bio-LNG with a capacity of 2.8 million m³ of biomethane per year in Kyiv region	16.80	11.80	Under implementation	2024	2
Plant for the production of biomethane from agricultural waste in Khmelnytsky region with a capacity of 3 million m³ biomethane per year	7.7	5.4	FS/ pre-FS	2025	2
Biomethane plant from poultry manure and corn silage in Semenivska territorial community, Poltava region, with a capacity of 3.7 million m³ biomethane per year	5.9	4.9	FS/ pre-FS	2023	1.5
A plant for the production of biomethane from dairy waste, crop waste and corn silage in Omelnytska territorial community, Poltava region, with a capacity of 3.7 million m3 of biomethane per year	5.9	4.9	FS/ pre-FS	2023	1.5

Source: KSE Institute

For more information on investment projects in the energy sector, please contact recovery@kse.org.ua.

5.3. Examples of project profiles with a high degree of readiness

This section provides a detailed description of 9 promising investment projects from the list of projects presented in Section 5.2 above. The current selection includes projects for the construction of PSPP, WPP, SPP, biomethane plants and a distributed gas generation network.

The financial indicators of investment projects are based on information provided by the project initiators.

Volodymyrets wind power plant with a total capacity of 72 MW

Company name: MCL Group
Type of ownership: Private
Sector: Power generation, RES
Category: WPP
Location: Volodymyrets district, Rivne region
Degree of readiness: Ready for implementation
Year of start of implementation: 2025
Launch period: 1 year
Total budget: $93.5 million
The required external funding: $70.0 million

Financial performance of the project:

- **NPV:** $43.3 million
- **IRR:** 17.4%
- **Annual EBITDA:** $13.2 million

Description:

The first phase of the Volodymyrets wind power plant will have a total capacity of 72 MW. The WPP will consist of 12 modern and innovative wind turbines with a unit capacity of up to 6 MW each and a height of 166 m, manufactured by Vestas or General Electric. According to the results of the two-year wind measurement campaign (2020-2022), the expected average annual wind speed is 6.9 m/s, which is sufficient for the annual generation of about 240 GWh in clean electricity. The wind measurement campaign was carried out in cooperation with GeoNET Gmbh and DNV and the forecasts are based on wind speeds at an altitude of 123 m. The developer has all the necessary connection permits, urban planning conditions, aviation approval, land lease agreements and a positive EIA, including an ornithology report. The project does not require significant costs for the construction of power transmission lines, as it is located in a developed network due to its proximity to the NPP. The plan is to only build a substation and a 1 km connection line to the existing network.

Lviv WPP 100 MW

Company name: LLC "Jurocape Ukraine Lviv"
Type of ownership: Private
Sector: Power generation, RES
Category: WPP
Location: Horodok and Yavoriv districts of Lviv region
Degree of readiness: Design
Year of start of implementation: 2025
Launch period: 1 year
Total budget: $210 million
The required external funding: $200 million

Financial performance of the project:

- **NPV:** $35.8 million
- **IRR:** 12.1%
- **Annual EBITDA:** $23.8 million

Description:

The 100 MW Lviv WPP will generate around 300 thousand MWh per year of clean, renewable electricity from wind. It is expected to supply around 35,000 households, reducing CO2 emissions by 240 thousand tonnes per year. The project consists of 17 wind turbines, a 35/110 kV transformer substation, and a 110 kV transmission line. The project is being designed using the most advanced technologies and in compliance with social responsibility standards.

Project "Wind of Independence" (WPP Petrivska). Stage I - 93 MW

Company name: ENERGY TRADE GROUP LTD
Type of ownership: Private
Sector: Power generation, RES
Category: WPP
Location: Petrivska territorial community, Oleksandriia district, Kirovohrad region
Degree of readiness: Ready for implementation
Year of start of implementation: 2025
Launch period: 2 years
Total budget: $171 million
The required external funding: $120 млн

Financial performance of the project:

- **NPV:** n/a
- **IRR:** 14.3%
- **Annual EBITDA:** $24 million

Description:

The implementation of the Wind of Independence project (Petrivska WPP) began in 2022. The design capacity of the WPP is 93 MW, with 15 wind turbines manufactured by Vestas as the main equipment. Other project partners include Katzenbach Ingenieure (Germany, engineering solutions) and Holleman (Germany, logistics service providers). The project is being implemented in two stages: the first stage includes the construction and launch of 93 MW of WPP in 2025-2026 while the second stage expands to an additional 323.8 MW of WPP in 2026-2028. The total capacity of the WPP will be 416.8 MW, with an expected annual production of 1.3 million MWh of energy, which will reduce harmful CO2 emissions by 1.2 million tonnes per year. At present, the ownership of the land plots has been formalised, the relevant SPVs have been established, a FS has been prepared and wind measurements have been carried out for 1.5 years. In addition, an Energy Yield Assessment Report has been obtained from ProfECVentus GmbH (Germany), technical conditions for connection have been obtained and an environmental impact assessment has been carried out.

Semenivska SPP (17.7 MW)

Company name: LLC VES Polovoe № 1
Type of ownership: Private
Sector: Power generation, RES
Category: SPP
Location: Kyiv region
Degree of readiness: Ready for implementation
Year of start of implementation: 2025
Launch period: 1 year
Total budget: $11.6 million
The required external funding: $9.3 million

Financial performance of the project:

- **NPV:** $1.9 million
- **IRR:** 16.5%
- **Annual EBITDA:** $2.0 million

Description:

The 17.7 MW project is the first stage of the Semenivska SPP construction, with a total projected capacity of over 60 MW. The project is being implemented by an SPV. Semenivska SPP will be located in the east of Kyiv region, a few kilometres from the grid connection point. Two phases of the project are being developed in parallel.

Construction of the 1,000 MW Kanivska PSPP

Company name: Ukrhydroenergo
Type of ownership: State
Sector: Power generation, RES
Category: PSPP
Location: Cherkasy region
Degree of readiness: Under implementation
Year of start of implementation: 2026
Launch period: 6.5 years
Total budget: $1,523 million
The required external funding: $1,062 million

Financial performance of the project:

- **NPV:** $491.8 million
- **IRR:** 9.52%
- **Annual EBITDA:** $179.2 million

Description:

Construction and commissioning of new highly maneuverable generating facilities at the Kanivska PSPP with a capacity of 1,000 MW in generating mode (4 hydraulic units of 250 MW each) and 1,040 MW in pumping mode (4 hydraulic units of 260 MW each).

Biomethane plant (7.36 million m³)

Company name: Pro-Energy LLC
Type of ownership: Private
Sector: RES
Category: Bioenergy (biofuels, biomethane)
Location: Kyiv region
Degree of readiness: Ready for implementation
Year of start of implementation: 2025
Launch period: 1 year
Total budget: $27.3 million
The required external funding: $24.0 million

Financial performance of the project:

- **NPV:** $9.0 million
- **IRR:** 35.0%
- **Annual EBITDA:** $7.0 million

Description:

The first phase of the project includes the construction of facilities with capacity to produce 7.36 million m³ of biomethane per year and 15 thousand tonnes of food-grade liquefied CO2 per year. The second phase of the project will bring up the total biomethane production capacity to 15 million m³ per year. The project also provides for the annual processing of 270 thousand tonnes of livestock and 80 thousand tonnes of crop waste (silage of intermediate crops, straw) as well as the creation of more than 30 jobs in rural areas.

Biomethane production plant (3.7 million m³)

Company name: KG GROUP LLC
Type of ownership: Private
Sector: RES
Category: Bioenergy (biofuels, biomethane)
Location: Poltava region
Degree of readiness: FS/pre-FS
Year of start of implementation: 2023
Launch period: 1.5 years
Total budget: $5.9 million
The required external funding: $4.9 million

Financial performance of the project:

- **NPV:** $0.9 million
- **IRR:** 26.8%
- **Annual EBITDA:** n/a

Description:

The project envisages the construction, launch and operation of a biomethane plant to produce biomethane from poultry manure and corn silage. The plant's capacity will be 3.7 million m³ of biomethane per year. In the future, the project is expected to also produce electricity from biogas.

3 MW biogas plant with additional biomethane production (2.1 million m³ annually)

Company name: "AR Boryspil" LLC
Type of ownership: Private
Sector: RES
Category: Highly maneuverable generation, bioenergy
Location: Kyiv region
Degree of readiness: Feasibility study/pre-feasibility study
Year of start of implementation: 2025
Launch period: 1-1.5 years
Total budget: $9.6 million
The required external funding: $6.3 million

Financial performance of the project:

- **NPV:** $2.3 million
- **IRR:** 25.0%
- **Annual EBITDA:** $2.2 million

Description:

The project includes the construction of a new 3 MW biogas/biomethane plant in Kyiv region, which will produce electricity (biogas) for sale on the domestic market and biomethane (2.1 million m³/year) for export. The project is fully supplied with feedstock from Agro-Region's land (corn silage, triticale, straw), while negotiations with animal manure suppliers are ongoing. Applications for connection to the gas transmission system have already been submitted to the authorities. Agro-Region is cooperating with ProEnergy, a technological expert in project development with a successful track record of 27 projects, 10 of which were financed by IFIs such as the EBRD, World Bank, NEFCO, SECO, etc.

Construction of a 30 MW distributed gas generation network

Company name: Transgasindustry AG
Type of ownership: Private
Sector: Power generation
Category: Highly maneuverable generation
Location: Volyn region
Degree of readiness: Under implementation
Year of start of implementation: 2023
Launch period: 6 months
Total budget: $25 million
The required external funding: $15 million

Financial performance of the project:

- **NPV:** $26.1 million
- **IRR:** 51%
- **Annual EBITDA:** $21.8 million

Description:

Construction and maintenance of a distributed gas-fired generation network with a capacity of up to 30 MW. The project envisages a full cycle of electricity production and sales to industrial consumers, as well as the sale of surplus electricity to the central grid on the day-ahead market. The key competitive advantage is the project company's direct access to the Ukrainian gas transmission system and the availability of all the necessary infrastructure to compress up to 100 million m³ of natural gas per year (which is planned to be sent to gas-fired power generation units). As a result, the company purchases natural gas at wholesale prices directly from producers and does not incur additional costs for intermediary services. This ensures a high margin of electricity generation at gas-fired power plants, enabling the project to achieve payback in 1.5-2 years.