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2021 ENERGY TRANSPARENCY DEX 2nd International edition UKRAINE MOLDOVA

ROMANIA

GEORGIA





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CONTENTS

01	Executive summary	4
02	Introduction	9
03	Categories overview	11
	Sectoral part	12
	Cross-sectoral part	13
04	Analysis by country	15
	Georgia	16
	Moldova	25
	Romania	
	Ukraine	40
05	Methodology	47

D1 EXECUTIVE SUMMARY

The Energy Transparency Index has been developed as a universal tool to assess information availability in the energy sector, diagnose gaps, make in-depth analysis, international comparisons and rankings, and track progress. This international edition is the 2nd comprehensive comparative study to examine energy transparency in Georgia, Moldova, and Ukraine as countries most advanced in European integration among the Eastern Partnership nations. This study also covers the EU member Romania, which is considered an appropriate benchmark for the Eastern Partnership and the Energy Community countries.

The Index's ultimate beneficiaries are consumers, as their awareness improves the possibility of protecting their rights and helps rationalize economic behavior in the market. More transparent and competitive energy markets promote the improvement of services for consumers and fair pricing. The Index will be helpful to companies and potential investors seeking an open, competitive environment, a better relationship with the government and communities, and reducing business risks. The Index will help public authorities responsible for information disclosure, indicating particular gaps and helping to improve their transparency and respective regulations. Foreign partners will get a deeper understanding of countries' energy policies and markets.

The 2021 Index includes 117 indicators grouped into eight categories and based on EU regulatory requirements and best global practices regarding information disclosure. Compared to the 2020 Index, this study was extended by two new indicators stemming from the EU Clean Energy Package (CEP). Given the CEP legislation became applicable for the Energy Community countries on November 30, 2021¹, the next Index edition will be adjusted following the CEP transparency requirements. The assessment is based on the analysis of open sources, focusing on the energy sector performance along the value chain, i.e., from production to consumption. The study covers electricity and gas markets and cross-sector issues.

Transparency analysis by categories is divided into the sector and cross-sector parts. The sector part covers the assessment of four categories – «Balances», «Natural monopolies», «Supply», «Reliability and security» made by two energy markets. The cross-sector part encompasses «Reporting», «Policy», and «Public authorities» as categories related to the whole energy sector. The «Consumption» category is split Information gaps (so-called «black boxes») and drawbacks in data disclosure discovered by the assessment provided the basis for targeted recommendations for public authorities and energy companies mentioned at the end of each country-specific Index section.

Key Findings

According to the assessment made in 2021, the final scores for Georgia (61, C), Moldova (55, C-), Ukraine (69, C+), and Romania (80, B+) indicate medium or good transparency of their energy sectors and still a significant room for improvement. However, all the countries assessed (except Romania, which was not assessed in the 2020 Index) demonstrated overall progress within 2-9 points compared to the 2020 assessment, proving that gradual energy reforms according to the EU legislative requirements, particularly of the Third Energy Package, and the best European and global practices, bring greater transparency to the sector. Besides, international comparison ranking better incentivize national and governments to speed up internal reforms and improve transparency.

Transparency strongly depends on the progress towards liberalization of energy markets and maturity of legislation and **regulation.** The intensity of internal reforms towards the EU market model defines the applicable rules and requirements on transparency to public authorities and energy companies. Romania, which took the longest path of reforming its energy markets and ensured their performance within the EU single market, legitimately demonstrated the best results compared to the Eastern Partnership countries and can serve as a benchmark. Unlike Georgia and Moldova, Ukraine has transposed most of the related EU requirements into national legislation; still, the question is its due implementation. Moldova is on its way to liberalizing energy markets, while Georgia – the country which joined the Energy Community later – is only rolling out reforms (therefore, some Index's indicators could not be yet applied and assessed).

• Comparing transparency scores of Moldova and Georgia, one could reveal a **'short-term pain' paradox** – relatively less transparency in the initial phase of more liberalized energy markets and vice versa. This is caused by the introduction of new competitive market mechanisms along with a bunch of strict legislative requirements regarding transparency, which immature markets could fail to meet in the short term. However, **in the long run, as the reforms continue and consolidate, the paradox fades and becomes replaced by the gain of greater energy sector transparency** which is the Ukrainian case (related to the pre-war status quo, i.e., prior to the martial law introduction).

• The level of **transparency varies significantly across the categories and sub-categories,** indicating the gaps and shortcomings where national governments should make particular efforts to promote reforms and improve information and data disclosure. The best results countries have demonstrated in the "Balances" and "Natural monopolies" categories, which could be attributed to stringent legislative requirements and regulation in those areas, as well as notable national and international accountability of dedicated authorities and companies, particularly transmission system operators (TSO). However, the worst results shown in the "Policy" and "Public authorities" categories are mainly caused by deficient reporting on policy implementation, public spending and administration transparency across the countries assessed. The transparency in the "Reporting" category appeared to be weak as well (except for Romania) since market players are still reluctant to follow the best global practices of corporate information and data disclosure, especially when it is not mandatory.

Assessment by category

	Georgia 井		Moldova 😻		Romania		Ukraine 💳	
Category	Score	Rating	Score	Rating	Score	Rating	Score	Rating
1. Balances	100	A+	88	A-	100	A+	75	В
2. Natural monopolies	77	В	63	С	89	A-	79	В
3. Supply	61	С	53	D+	88	A-	68	C+
4. Reliability and security	67	C+	79	В	57	C-	77	В
5. Consumption	59	C-	52	D+	85	A-	87	A-
6. Reporting	66	C+	31	F	86	A-	36	F
7. Policy	54	D+	46	D	61	С	55	C-
8. Public authorities	13	F	53	D+	50	D+	56	C-
2021 Index	61	С	55	C-	80	B+	69	C+



Having that overall transparency headway, countries demonstrated quite controversial results within the Index's categories and subcategories, showing a partial decline. E.g., Georgia progressed in 5 categories and 11 subcategories; simultaneously, its scores declined in 3 categories and 6 subcategories, while the transparency of 7 subcategories remained on the same level as in the 2020 assessment. Moldova advanced in 5 categories and 10 subcategories while declined in 3 categories and 9 subcategories; performance in 5 subcategories remained unchanged. Ukraine succeeded in 7 categories and 14 subcategories while declined in 1 category and 4 subcategories; 6 subcategories remained on the same level. These results prove that suspension or delay of reforms, weakened accountability, inconsistent focus, or other

distractions may impair transparency in particular areas of the energy sector. **Regular assessment and analysis are instrumental and critical in pushing for consistent progress of countries' energy sector transparency.**

• The national gas and electricity markets, assessed by a set of related sector indicators, demonstrated a **different level of transparency** – from medium (Moldova) to excellent (Romania). At the same time, the transparency level of Georgia, Moldova, and Ukraine's energy markets advanced by 3-14 points compared to the 2020 assessment. The greatest progress shown by Ukraine in electricity and gas (+13 and +14 points, respectively) could relate to a longer period of reforming, greater maturity and integration with European markets.

Assessment by market

	Georgia 👬		Moldova 👹		Romania		Ukraine 💳	
Market	Score	Rating	Score	Rating	Score	Rating	Score	Rating
Natural gas	63	С	64	с	88	A-	78	В
Electricity	78	В	61	С	86	A-	76	В

• Georgia demonstrated excellent

performance in the publication of energy statistics; however, still failed to disclose information on the independence of transmission and distribution system operators (TSOs and DSOs). Georgia could improve energy markets' transparency by the publication of exhausted data regarding registers of market participants, market concentration, annual reports on the costs of electricity and gas by consumer bands, and full-fledged market monitoring results. The black boxes remained the disclosure of national plans for electricity and gas security of supply, as well as data on the penetration of meters and smart meters in the sector. It could significantly improve corporate transparency by disclosing management reports and reports on payments to the government by energy companies. In terms of policy, it should ensure the development and publication of the national emission reduction plan (NERP), national energy and climate plan (NECP), and progress reports on the implementation of the national energy strategy and national renewable energy action plan (NREAP). Besides, Georgia should drastically improve the transparency of public spending and decision-making of energyrelated public authorities.

Moldova should improve data disclosure by the gas TSO, particularly on available transmission capacity and its allocation, system balancing, etc. Besides, the electricity TSO should publish complete data required by Regulation (EU) 543/2013. Moldova could enhance market transparency by publishing data on switching suppliers and market concentration, complete registers of market participants, and retail markets' price markups. Also, it should update monitoring reports on electricity and gas security of supply. Transparency in consumption could be improved by disclosing smart meters penetration data, commercial offers of electricity suppliers, and related price comparison tools. Government should pay attention to corporate reporting of energy companies as it has ample space for improvement. In terms of policy, it should ensure the development and publication of NERP, NECP, progress reports on the implementation of the national energy strategy, national energy efficiency action plan (NEEAP), and NREAP. Besides, Moldova should considerably improve the transparency of public authorities' expenditure and the regulatory acts' impact assessment.

Romania legitimately leads in transparency among countries assessed; however, it still has room for progress. Particularly, TSOs and DSOs in electricity and gas should improve the publication of network development plans along with respective progress reports. Romania should ensure the development and publication of monitoring reports on electricity and gas security of supply and the risk-preparedness plan in electricity. Some improvements could be made in data disclosure on smart meters penetration in gas as well as on energy audit and management. Transparency of policy-making could be significantly enhanced by the publication of progress reports on national energy strategy, NEEAP, NERP, the Low carbon development strategy (LCDS), and nationally determined contribution (NDC) to the Paris Agreement. Besides, Romania should improve the transparency of public spending and decisionmaking of energy-related public authorities, particularly the regulatory acts' impact assessment.

Ukraine repeatedly cannot disclose complete data on monthly energy statistics. The TSO in electricity should publish exhaustive data required by Regulation (EU) 543/2013, annual progress reports on the Ten-year network development plan implementation, and produce the risk-preparedness plan. Ukraine could enhance market transparency by publishing complete registers of market participants, retail markets' price mark-ups, and annual reports on the costs of electricity and gas by consumer bands, which remained black boxes. It should also update monitoring reports of electricity and gas security of supply. Transparency in consumption could be improved by disclosure of gas smart meters penetration data and developing price comparison tools for electricity, similar to gas (Gasoteka). In corporate reporting, Ukraine should focus on the due publication of management reports and reports on payments to the government by energy companies. Transparency of policy-making could be significantly enhanced by the proper publication of progress reports on national policy documents - energy strategy, NEEAP, NERP, LCDS, and NDC, as well as updating of NERP, NEEAP, and NREAP, and development of NECP. Besides, Ukraine should improve the transparency of public spending and decisionmaking of energy-related public authorities, particularly the full-fledged regulatory acts' impact assessment.

Detailed information on the 2021 Index findings and the indicators assessment table with all scores and comments can be found in a separate spreadsheet published along with the Index on the websites of the project implementers: DiXi Group (https://dixigroup. org/en/), World Experience for Georgia (http:// weg.ge/en), WatchDog.MD (https://www. watchdog.md/english/), and Expert Forum (https://expertforum.ro/en/).



INTRODUCTION

The Energy Transparency Index provides a comprehensive assessment of the energy sector information disclosure in a particular country. The Index is a universal tool enabling in-depth analysis of transparency with a breakdown into categories and subcategories, energy markets, specific indicators, and tracking progress both in time and in comparison with other countries.

The Index provides a quantitative assessment and characterizes the ability of consumers, public authorities, energy companies and potential investors, foreign institutional partners, media, and experts to obtain the necessary information regarding the energy sector performance along the value chain, i.e., from production to consumption.

The pilot issue of the Index was released in 2018 with an assessment of Ukraine's energy sector transparency (an initial score – 43-of-100 points). The Indexes in 2019, 2020, and 2021 were developed applying improved methodology following the feedback of domestic and foreign experts and other stakeholders. The Indexes showed steady progress in Ukraine's energy sector transparency, shifting from insufficient to medium transparency level.

This international edition is the 2nd comprehensive comparative study to examine energy transparency in Georgia, Moldova, and Ukraine as countries most advanced in European integration among the Eastern Partnership nations and to measure the progress compared to the lst international edition of the Index of 2020. This study also covers the EU member Romania, which is considered an appropriate benchmark for the Eastern Partnership and the Energy Community countries. The Index methodology was adjusted in terms of indicators and energy markets covered to ensure its international applicability.

Purpose of the Index

The purpose of the annual development and publication of the study is to promote greater transparency in the energy sector, which includes indispensable and sufficient conditions for stakeholders to regularly receive comprehensive, up-to-date, and usable information they need to make evidence-based decisions.

Information disclosure is a good practice enabling due monitoring, analysis, assessment, and forecasting necessary for adequate and reasonable decision- and policymaking.

The Index aims to reduce informational asymmetry in the energy sector, squeeze the prospects for unfair competition, discriminatory behavior, and corruption, and foster proper operation of energy markets. The information gaps and so-called «black boxes» – indicators, where data is entirely unavailable – identified by the Index provided the basis for targeted, practical recommendations to public authorities to improve the transparency of national energy sectors as the critical precondition for their better performance and sustainable development.

The international dimension of the Index brings a competitive spirit and better urges national governments to improve transparency. Moreover, the international comparison facilitates faster and more fruitful dissemination of best national transparency practices to energy sectors of other countries, speeding up the development of open, competitive, and efficient energy markets.

Target audience

The Index's ultimate beneficiaries are consumers, as better awareness allows them to act more economically reasonably while minimizing expenses and increasing benefits. More transparent and competitive energy markets promote the improvement of services for consumers and fair pricing. They will have better opportunities to protect their interests using the mechanisms of monitoring and public control over energy companies and public authorities' activity. Empowering consumers by better awareness of processes in the energy sector would help achieve global sustainable development goals.

Greater transparency reduces business risks for energy companies and promotes more efficient and innovative activity, fair competition, and better relations with investors, the government, and communities. Newcomers and potential participants of energy markets, banks, and other financial institutions will receive better opportunities to assess risks, make investment or market entry decisions, and design a corporate policy. Consequently, a less risky business environment improves the investment climate and attracts additional resources to the industry.

Public authorities receive targeted practical recommendations concerning information and data disclosure. Assessing the transparency will encourage the elimination of «black boxes», which distort competition and breed corruption.

Foreign institutional partners will have better opportunities to understand national energy markets, objectives and policies, the effectiveness of its implementation, compliance with countries' international obligations under the Association Agreement with the EU, the Treaty establishing the Energy Community, the Paris Agreement, and other international treaties.



INDEX'S CATEGORIES OVERVIEW

SECTORAL PART

1. Balances

The «Balances» category defines the transparency of annual and monthly energy statistics and includes four indicators grouped into two subcategories:

- annual balance statistics (2 indicators);
- monthly balance statistics (2 indicators).

Assessment of the Index for the «Balances» category is based on determining the extent to which the national statistical authorities, as the government bodies responsible for statistics, are compliant with requirements of the Regulation (EC) No 1099/2008 on energy statistics.

2. Natural monopolies

The «Natural monopolies» category defines the transparency of transmission and distribution system operators (TSOs and DSOs) in electricity and natural gas markets. Given the clearly defined requirements of data publication which national public authorities, TSOs and DSOs are to comply with, this category of the Index includes the largest number of indicators (46) grouped into four subcategories:

- operation of transmission and distribution system operators (32 indicators);
- independence of transmission and distribution system operators (4 indicators);
- development of transmission and distribution systems (4 indicators);
- tariffs setting (6 indicators).

Assessment of the Index for the «Natural monopolies» category is based on determining the extent to which public authorities, TSOs and DSOs are compliant with the requirements of:

• Directives 2009/72/EC and 2009/73/EC concerning common rules for the internal markets in electricity and natural gas;

• Regulations (EC) No 714/2009 and

No 715/2009 on conditions for access to the network for cross-border exchanges in electricity and the natural gas transmission networks;

- Regulation (EU) No 543/2013 on submission and publication of data in electricity markets;
- Regulation (EU) No 312/2014 establishing a Network Code on Gas Balancing of Transmission Networks;

• best European practices of natural monopolies' transparency.

3. Supply

The «Supply» category defines the transparency of rules, competition, and pricing in electricity and gas markets. The category includes 19 indicators grouped into three subcategories:

- market barriers (5 indicators);
- market concentration and competition level (2 indicators);
- prices and pricing (12 indicators).

Compared to the 2020 Index, the number of indicators in the category was extended from 18 to 19 by adding a new indicator «Rules of tendering procedure for granting RES support».

Assessment of the Index for the «Supply» category is based on determining the extent to which public authorities and businesses operating in energy markets are compliant with the requirements of:

- Directives 2009/72/EC and 2009/73/EC concerning common rules for the internal markets in electricity and natural gas;
- Regulation (EU) No 1227/2011 on wholesale energy market integrity and transparency (REMIT);
- Regulation (EU) No 2016/1952 on European statistics on natural gas and electricity prices;
- best practices of the ACER and the CEER on monitoring and analysis of energy markets.

4. Reliability and security

The «Reliability and security» category defines the transparency of energy stocks and reserves, rules and regulations on reliability and security of supply, and corresponding reporting. The category includes seven indicators grouped into three subcategories:

- stocks and reserves (2 indicators);
- security of supply planning (2 indicators);
- reports on reliability and security (3 indicators).

Assessment of the Index for the «Reliability and Security» category is based on determining the extent to which public authorities and businesses operating in energy markets are compliant with the requirements of:

- Directive 2009/72/EC concerning common rules for the internal market in electricity, Regulation (EU) No 2019/943 on the internal market for electricity and Regulation (EU) No 2019/941 on risk-preparedness in the electricity sector;
- Regulation (EU) No 2017/1938 concerning measures to safeguard the security of gas supply;
- Regulation (EC) No 1099/2008 on energy statistics;
- EU best practices of guaranteeing the security of gas and electricity supply.

5. Consumption

The «Consumption» category defines the transparency of energy consumption metering, customer service standards, information for consumers on prices and tariffs, subsidies, preferences and other aid, and energy efficiency programs. The category includes 13 indicators grouped into three subcategories:

- penetration of metering (4 indicators);
- service standards (2 indicators);
- information for consumers (7 indicators).

Assessment of the Index for the «Consumption» category is based on determining the extent to which public authorities and businesses operating in energy markets are compliant with requirements of:

• Directives 2009/72/EC and 2009/73/EC concerning common rules for the internal markets in electricity and natural gas;

Directive 2012/27/EU on energy efficiency;

• best practices of the CEER regarding the quality of energy supply and the EU best practices of empowering consumers.

CROSS-SECTORAL PART

6. Reporting

The «Reporting» category defines the transparency of regular financial, management, and fiscal reporting and information regarding final beneficiaries of energy companies. The category includes seven indicators grouped into three subcategories:

 financial and management reporting (3 indicators);

- fiscal reporting (3 indicators);
- beneficiaries and corporate governance (1 indicator).

Assessment of the Index for the «Reporting» category is based on determining the extent to which businesses operating in energy markets are compliant with the provisions and procedures of:

• Directive 2013/34/EU on the annual financial statements, consolidated financial statements and related reports of certain types of undertakings;

• best global practices set out in the Global Reporting Initiative (GRI), the International Financial Reporting Standards (IFRS), the Principles of Corporate Governance of the Organization for Economic Cooperation and Development (OECD) regarding information disclosure, transparency, and corporate governance standards;

• the standard of the Extractive Industries Transparency Initiative (EITI).

7. Policy

The «Policy» category defines the transparency of designing and implementing national policy documents on energy and sustainable development, energy efficiency, environmental protection, combating climate change, developing renewables, etc. The category includes 12 indicators grouped into four subcategories:

- monitoring and reporting (2 indicators);
- energy efficiency (2 indicators);
- environmental protection and combating climate change (6 indicators);
- renewable energy sources (2 indicators).

Compared to the 2020 Index, the number of indicators in the category was extended from 11 to 12 by adding a new indicator "National Energy and Climate Plan".

Assessment of the Index for the «Policy» category is based on determining the extent to which public authorities responsible for designing and implementing energy and related policies are compliant with the requirements of:

Directive 2012/27/EU on energy efficiency;

• Directive 2010/75/EU on industrial emissions and Directive 2001/80/EC on the limitation of emissions of certain pollutants into the air from large combustion plants;

- Directive 2009/28/EC on the promotion of the use of energy from renewable sources;
- global treaties on climate change (UN Framework Convention on Climate Change, Paris Agreement, etc.).

8. Public authorities

The «Public authorities» category defines the transparency of public spending, including state aid, the designing, adopting, and implementing policy and regulatory decisions by public authorities. This category includes nine indicators grouped into two subcategories:

public spending (6 indicators);

• transparency of public administration (3 indicators).

Assessment of the Index for the «Public authorities» category is based on determining the extent to which public authorities responsible for policymaking and regulation in the energy sector are compliant with requirements of:

- the Treaty establishing the Energy Community;
- Regulation (EU) No 651/2014 (GBER)

declaring certain categories of aid compatible with the internal market in terms of art. 107 and 108 of the Treaty Establishing the European Community, particularly regarding the publication of information on state aid recipients;

• best global practices, particularly the Guidelines on Fiscal Transparency and the Guidelines for Public Expenditure Management of the International Monetary Fund, the Council Recommendations of the Organization for Economic Co-operation and Development (OECD) on good budgeting, regulatory policy and governance, and European Commission Guidelines on Better Regulation/Lawmaking.



ANALYSIS BY COUNTRY

GEORGIA

GEORGIA'S 2021 ENERGY TRANSPARENCY INDEX

61, C, Medium transparency

Progress: +5 points compared to the 2020 Index

1. BALANCES

Score: 100, A+, Absolute transparency Progress: +25 points compared to the 2020 Index²

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Annual balance statistics	100	+25	A+	Absolute transparency
Monthly balance statistics	100	+25	A+	Absolute transparency

The National Statistics Office of Georgia (GEOSTAT) is responsible for publishing annual balances for the electricity and natural gas sectors. GEOSTAT maintains a high level of compliance with the acquisition of statistics and publishes balances following the requirements of Regulation (EC) No 1099/2008 on energy statistics. The annual balances are published in December each year.

Data is in .pdf and .xls(x) format, well-structured, and easy to process.

GEOSTAT introduced quality assurance procedures and prepares quality reports for different domains. As the Regulation requires, the quality report is submitted to EUROSTAT for publication.

²The category progress was mainly caused by the change in assessment methodology

2. NATURAL MONOPOLIES

Score: 77, B, Good transparency Progress: +2 points compared to the 2020 Index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Operation of transmission and distribution system operators	90	-1	А	Excellent transparency
Independence of transmission and distribution system operators	0	0	F	Unacceptable transparency
Development of transmission and distribution systems	59	+9	C-	Medium transparency
Tariffs setting	81	+6	B+	Good transparency

Minor improvements are evident in this category compared to the 2020 assessment; however, the main picture is the same. Still, there is no organized gas market in Georgia, and therefore the sale of natural gas at the wholesale market takes place on the basis of bilateral contracts.

The state-owned transmission system operator, Georgian Gas Transportation Company (GGTC), applied for certification to the Regulator (GNERC) in June 2021 under the independent system operator model. This was followed by establishing a daughter company of the incumbent supplier and importer GOGC, Georgian Natural Gas Transmission Network Owner (GNGTNO). However, mainly due to the absence of a lease agreement and a failure of Georgia to ensure separation between public bodies controlling competitive and networkrelated activities, GNERC refused to certify GGTC³.

The Government adopted a Natural Gas Market Concept on 2 September 2021⁴. It envisages setting up market-based pricing while imposing public service obligations (PSO) for a limited time.

The assessment score does not include LNG or gas storage-related indicators, as Georgia does not have these facilities. The gas storage was planned to be developed by 2024. However, app. 120 million euros allocated by the German Development Bank (KfW) for the construction of a gas storage facility was used by Georgia to solve problems arising from the COVID-19 pandemic.

The electricity sector is more advanced in terms of market reforms and transparency.

The Government of Georgia, following the Law on Energy and Water Supply by its Resolution N246 of April 16, 2020, has approved the new electricity market concept design. The Concept Design defines the market segments of wholesale electricity market: day-ahead market, intraday market, market of bilateral contracts, balancing, and ancillary services market.

To develop a competitive electricity market and ensure fair pricing through legal environment including support to the new competitors, the Commission, by its Resolution 46 of August 11, 2020, has approved Electricity Market Rules which encompasses rules of electricity day-ahead and intraday markets, along with balancing and ancillary services markets⁵.

According to the decision of the GNERC of 1 April 2021, the electricity transmission system operator GSE was certified and licensed by GNERC in May 2021.

The unbundling of the two distribution system operators has been completed. Energo Pro and Telasi continue performing distribution solely, while two universal suppliers, EP Georgia Supply and Telmiko, respectively, serve customers outside and within Tbilisi.

By Resolution of the Government of Georgia of 31 May 2021, the opening of day-ahead, balancing, and ancillary services markets was postponed until 1 January 2022⁶ and then until March 2022.

³Energy Community Secretariat, Annual Implementation Report, Georgia 2021 ⁴<u>https://matsne.gov.ge/en/document/</u> <u>view/5251680?publication=0</u> ⁵<u>GNERC Annual Report 2021</u> ⁶Energy Community Secretariat, Annual Implementation Report, Georgia 2021

Requested Information is published on the ENTSO-E transparency platform and/ or Georgian State Electrosystem (GSE) web page. However, Network development plans for distribution systems and reports on their implementations are not publicly available. Neither gas nor electricity DSOs publish these plans. GNERC's annual report indicates that in 2020 the Regulatory Commission reviewed and agreed upon 5-year distribution network development plans following the requirements envisaged in Network Rules, but these plans are not publicly available.

As for the tariff setting methods and information on electricity tariffs themselves are available on the Regulator's website, but in some cases, the information is not complete. The information about tariffs in the previous years is unavailable.

As for the gas tariffs, wholesale prices are deregulatedforthecommercialsector, including industry and small enterprises. Although under unregulated prices, the commercial sector suffers from non-transparent pricing, which affects its competitiveness. Georgia purchases so-called "social gas" for a low price used to supply households and thermal power plants. Respectively, retail and wholesale gas prices in this segment are significantly low compared to the commercial segment⁷.

Recommendations

• Government, the Ministry of Economy and Sustainable Development, the Regulator and TSO should speed up working on gas sector reforms and implementation of the Directive 2009/73/EC on common rules for the internal market in natural gas;

• The TSOs in electricity and gas should start developing compliance reports following the Directives 2009/72/EC and 2009/73/EC on common rules for the internal markets in electricity and natural gas;

• The GNERC should ensure that DSOs publish their compliance programs and respective implementation reports;

• The gas TSO should ensure publication of information on scheduled maintenance periods and related operational data in a userfriendly manner;

• The GNERC should ensure publishing the information on gas tariffs following the requirements of Art. 32 (1), 41 (7) of Directive 2009/73/EU on common rules for the internal natural gas market, Art. 18 (2), 19 (5) of Regulation (EC) No 715/2009 on conditions for access to the natural gas transmission networks.

3. SUPPLY

Scores by subcategories:

Score: 61, C, Medium transparency Progress: -1 point compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Market barriers	54	+23	D+	Insufficient transparency
Market concentration and competition level	50	0	D+	Insufficient transparency
Prices and pricing	65	-5	C+	Medium transparency

As mentioned earlier, the organized gas market does not exist in Georgia. Due to this fact purchase and selling of natural gas is carried out through bilateral contracts. The electricity trade is also mainly carried out through direct contracts. Electricity is sold by generators, importers, and Electricity Market Operator (ESCO) and purchased by an electricity distribution licensee (supply part), direct 16 customers, exporters, electricity generators (plant expenses), ESCO, and the Dispatch Operator (to cover electricity losses).

According to Regulation (EU) No 1227/2011 on Wholesale Energy Market Integrity and Transparency Market, participants are to be registered by the national regulatory authority. The register shall give each market participant a unique identifier and shall contain sufficient information to identify the market participant, including relevant details relating to its valueadded tax number, place of establishment, the persons responsible for its operational and trading decisions, and the ultimate controller or beneficiary of the market participant's trading activities (article 9). GNERC has a list of license holders, but it cannot be considered the complete National Register of Market Participants as the list of license holders indicates only names and addresses of the companies.

Information on market concentration and the competition level is partially available. HHI is not assessed for the gas sector; however, information about market participants proves that the natural gas market of Georgia is concentrated at both wholesale and retail levels. The electricity distribution (supply) market is classified as highly concentrated (HHI2019=5,288). The 2020 Herfindahl-Hirschman Index of the electricity generation segment is 1,260.⁸

The National Statistics Office of Georgia (GEOSTAT) publishes semiannual information on gas and electricity prices. These data are not produced on an annual basis as required by the Regulation (EU) No 2016/1952. Information about prices is available for the regulated sector only.

It also has to be mentioned that the Public Service Obligations (PSO) regime has not yet been introduced in Georgia. The regulatory commission (GNERC) sets end-user tariffs for electricity and gas for households. The tariffs are set according to the adopted methodology. Georgia purchases so-called «social» gas at a preferential price to supply households and TPPs. Accordingly, retail and wholesale gas (and partially electricity) prices in this segment are significantly low compared to the commercial segment.

The Regulator is responsible for price monitoring; however, it does not publish respective reports. Part of the information can be found on the Regulator's website or its annual reports, but the information is incomplete. GNERC approved Rules for Energy Market Monitoring and Reporting on 30 March 2021, thus transposing the REMIT Regulation⁹. As for the Rules of tendering procedure for granting RES support, in late 2019, the Parliament approved the Law on Promoting the Production and Use of Energy from Renewable Sources. The MoESD is studying several possible support mechanisms for RESs. It plans to introduce one or several tailored pilot schemes during the transition period. with the intention of progressing to marketbased schemes once a functional electricity market has been established. Several acts are under development. Georgia currently develops a rule for issuing guarantees of origin for electricity from renewable sources¹⁰.

Recommendations

• The Ministry of Economy and Sustainable Development and GNERC should ensure a favorable environment to speed up market reforms in electricity and natural gas;

• The GNERC should create a National Registry of Market Participants for electricity and gas markets and ensure publishing the information on market concentration and competition levels following the requirements of Directives 2009/73/EC and 2009/72/EC on common rules for the internal market in natural gas and electricity;

• The National Statistics Office of Georgia should ensure publishing information on gas and electricity prices on an annual beside the semiannual basis as required by the Regulation (EU) No 2016/1952;

• The GNERC should start publishing price monitoring reports covering regulated and liberalized, wholesale and retail market segments.

4. RELIABILITY AND SECURITY

Scores by subcategories:

Score: 67, C+, Medium transparency Progress: +50 points compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Stocks and reserves	100	0	A+	Absolute transparency
Security of supply planning	0	0	F	Unacceptable transparency
Reports on reliability and security	100	+100	A+	Absolute transparency

⁸GNERC

⁹ Energy Community Secretariat, Annual Implementation Report, Georgia 2021

¹⁰ <u>https://matsne.gov.ge/en/document/view/4737753?publication=1</u>

The stocks and reserves subcategory has the maximum score. It covers generation capacity: maximum net capacity (value and structure), peak load value, and available generation capacity for electricity, which is published on the ENTSO-E platform. The indicator does not include gas storage facility-related data as Georgia does not have one.

Georgia still does not have a national action plan, emergency plan for gas supply, and a risk preparedness plan in electricity. Usually, utility companies have their own plans in emergencies, and in most cases, those plans are confidential. In Georgia's electricity and gas sectors, the TSOs are currently developing emergency and risk management plans following the EU requirements. According to the law on Energy and Water Supply (articles 132, 140), the MoESD shall develop a strategy of action during a state of emergency in the electricity and natural gas sectors. The strategy is under development¹¹. The EU4Energy program launched a new technical assistance project in July 2020 to develop the first Natural Gas Emergency Plan in Georgia. The electricity risk-preparedness plan will be prepared by 2022.

A monitoring report on the security of natural gas supply and electricity supply was prepared and published in 2021 for the first time¹².

Recommendations

• The Ministry of Economy and Sustainable Development should ensure the development of the national action plan and emergency plan for the gas sector following the Regulation (EU) No 2017/1938 on measures to safeguard the security of natural gas supply;

• The electricity TSO should ensure the development of the National Resource Adequacy Assessment (adequacy report on generation capacity) and respective implementation plan.

5. CONSUMPTION

Score: 59, C-, Medium transparency Progress: -6 points compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Penetration of metering	19	-6	F	Unacceptable transparency
Service standards	100	0	A+	Absolute transparency
Information for consumers	75	-4	В	Good transparency

Scores by subcategories:

The information on individual metering was available for electricity consumers for 2020 but unavailable for 2021. The data for the gas sector is not available; neither is the information on smart metering for gas or electricity consumption (Georgia has not introduced smart metering yet). According to the annual report of GNERC, in 2020 European Unionfunded Twinning Project on "Development of Incentive-Based Regulation for Service Quality and Regulatory Strategy to Support Rollout Smart Metering" was carried out. Costbenefit analysis of smart metering has been conducted and a regulatory strategy of smart metering implementation has been drafted within the project. Based on new regulations, when a group of consumers uses a microgeneration power plant connected to the net metering system, each consumer will be equipped with an individual reverse or smart meter for settlement $^{\mbox{\tiny 13}}.$

Information on service standards is fully transparent. Minimum requirements for the quality of electricity and its supply are regulated by the Service Quality Rules approved by GNERC in 2018.

Tariff information for the regulated segment (mainly households) is available on DSOs' and GNERC websites. The Regulator offers tariff comparison tools for different suppliers, but as mentioned earlier - Georgia does not have fully established electricity and gas markets, and consumers do not have the opportunity to switch suppliers. Prices for the commercial sector are deregulated and non-transparent.

¹¹N. Shatirishvili, G.Mukhigulishvili Georgian Energy Security Assessment Including Legal and Institutional Framework, 2021

¹² https://bit.ly/3zH7Tkj

¹³ <u>GNERC, Annual Report 2021</u>

As for the information on consumers' rights for subsidies and preferences in payment of utilities' bills, the new Energy and Water Supply law, adopted on 20 December 2019 by the Georgian Parliament, defines a vulnerable consumer as a household consumer that due to status or health condition and following applicable legal acts is granted the right to utilize and/or receive a supply of electricity and/or natural gas and/or water under special conditions (art. 3). To protect vulnerable consumers, art. 112 stipulates that national and local governmental bodies, in consultation with the GNERC and other stakeholders, shall develop specific programs and measures to meet demand and/or improve electricity and natural gas affordability and define vulnerable consumers who are to benefit from these programs ¹⁴.

Ruleson the protection of vulnerable customers in the gas sector are missing. However, Georgia has several social assistance schemes in place that either include electricity and gas as one of the components or are specifically targeted to subsidize electricity or gas consumption by certain categories of consumers. Social assistance issues are regulated by the Law on Social Assistance and the Law on Energy and Water Supply. The Social Service Agency is responsible for the assistance programs management; all information is available on its website. It is planned to develop a special program for vulnerable consumers to protect their rights during reforms.

As for the Information on benefits and conditions of participation in energy efficiency programs, funds, energy service contracts, and taking other energy efficiency improvement measures, some fragmented information can be found on the website of the Ministry of Economy and Sustainable Development. Still, Georgia does not have an agency on energy efficiency or other dedicated public entity that would publish and update the information following the Directive 2012/27/EU.

Georgia made small steps to improve energy efficiency. It adopted a methodology for minimum energy performance of buildings calculation required by the Buildings Directive¹⁵. Large grant and lending programs for energy efficiency in buildings started in 2021. The program will develop energy efficiency secondary legislation, a system of energy auditors' and energy performance certification, support energy efficiency in public and private buildings, support electricity market liberalization and the development of renewables, provide capacity building to various stakeholders, and build awareness on energy efficiency. The program is being implemented by an international consortium.

Recommendations

• The GNERC should ensure implementation of the requirements of Directive 2012/27/EU in terms of collection and publication of the data on individual meters;

• MoESD, GNERC and other responsible authorities should develop regulation on the protection of vulnerable customers in the electricity and natural gas sectors.

• The Ministry of Economy and Sustainable Development should ensure the establishment of a public entity responsible for energy efficiency policy, incl. publishing the information on benefits and conditions of participation in energy efficiency programs, funds, energy service contracts, and taking other energy efficiency measures following the Directive 2012/27/EU.

6. REPORTING

Score: 66, C+, Medium transparency Progress: +19 points compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Financial and management reporting	70	+9	B-	Good transparency
Fiscal reporting	50	+19	D+	Insufficient transparency
Beneficiaries and corporate governance	100	+46	A+	Absolute transparency

Scores by subcategories:

¹⁴ Law on Energy and Water Supply

¹⁵ Energy Community Secretariat, Annual Implementation Report, Georgia 2021

This category shows considerable

improvement. Most companies publish financial statements and independent auditor's reports on the financial statements. Still, reports for previous years are sometimes unavailable, and existing ones are published in scanned .pdf format, making it difficult to adequately process and analyze the information.

Financial reports are available on the companies' websites and the consolidated website (Reportal), which is the first public information resource in Georgia containing financial and management reports of companies registered in Georgia. The Reportal was created in 2017 by the Service for Accounting, Reporting, and Auditing Supervision Subdivision of Georgia's Ministry of Finance.

Most companies publish information on the payment of taxes by business entities and types of taxes. Taxes are disclosed in general financial statements. Still, only one company of the sample publishes data on quasi-fiscal transactions and state aid. Georgia has only one extractive company that operates in gas extraction, and it does not disclose any information on taxes or management reports. Information about final beneficiaries is available.

Recommendations

• Energy companies should publish complete financial reports, auditor's reports to financial statements, and management reports; information on quasi-fiscal transactions and state aid. The reports should be published annually, the previous year's reports should be available.

• Competition Agency should strengthen the law enforcement mechanisms and monitoring capacity to keep energy companies accountable.

7. POLICY

Score: 54, D+, Insufficient transparency Progress: +18 points compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Monitoring and reporting	50	0	D+	Insufficient transparency
Energy efficiency	100	+50	A+	Absolute transparency
Environmental protection and combating climate change	42	+22	D-	Insufficient transparency
Renewable energy sources	50	0	D+	Insufficient transparency

Scores by subcategories:

The category shows modest improvement. Georgia still does not have most policy documents on energy and sustainable development; however, small-scale progress is evident.

Georgia does not have an energy strategy implementation report. The Energy Strategy of Georgia 2020-2030 was approved by ministerial order in October 2019, but it was not a comprehensive strategy and will not be used. Instead, the Ministry of Economy and Sustainable Development is creating an Energy Policy document and the National Energy and Climate Plan (NECP) according to the EU directives and the New Energy Law.

In December 2021, with the support of the USAID Securing Georgia's Energy Future program,

the Ministry of Economy and Sustainable Development started the development of the National Energy Policy document. The NECP, as an annex of the Energy Policy document, is also being prepared and should be adopted in 2022. Draft NECP is currently being discussed within stakeholder groups based on an agreement under the Namakhvani HPP mediation process.

On 20 October 2021, an introductory presentation of the NECP was held by the MoESD. This was followed up by several follow-up drafting sessions. The process is fully transparent and open to stakeholders. Meetings are conducted online once every two weeks. The NECP will also be made subject to a strategic environmental assessment (SEA). The CSOs will be involved early in the SEA

preparation and contribute to the SEA scoping report. Once drafted, both the NECP and the SEA will be subject to public consultations. This is an essential precedent of involving stakeholders at an early stage of public policy development.

As for other policy documents, due to its later accession to the Energy Community, Georgia adopted the NREAP only at the end of 2019. The document contains measures to promote renewable energy; however, there is no 2020 target and no monitoring reports available. The government aims to set the 2030 targets in the new NECP, which is being developed for the period of 2021-2030.

The general 2020 energy efficiency target was set in the latest NEEAP, while the specific targets required by the Energy Efficiency Directive were established by the 2020 Energy Efficiency Law. Georgia submitted the second Annual Progress Report¹⁶ to the Secretariat in 2021¹⁷.

Low-Emission Development Strategy (LEDS) development began in 2013 and the draft version was ready in 2017, but it was not approved. New LEDS was drafted in 2021 and will be finalized next year.

In April 2021, Georgia published an updated Nationally Determined Contribution (NDC), setting more ambitious objectives and targets compared to the previous NDC. Georgia's updated NDC is accompanied by the 2030 Climate Change Strategy and Action Plan to identify mitigation measures that facilitate unconditional and conditional commitments and mitigation targets in transports, building, energy generation and transmission, agriculture, industry, waste management, and forestry ¹⁸.

Georgia complied with its reporting obligations under the Large Combustion Plants Directive in March 2021. The adoption of the Law on Industrial Emissions and a by-law on special provisions for combustion plants is expected to take place by the end of 2021 and complete the transposition of the Directive.¹⁹

The National Inventory Report of GHG emissions to the UNFCCC was updated and published for the 1990-2017 period. Georgia submitted the second Voluntary National Review (VNR) report on implementing the UN Sustainable Development Goals at the 2020 High-Level Political Forum. It is available on the SDGs website.

Recommendations

• The MoESD should strengthen the national long-term strategy development and planning capacity; consider establishing an analytical/ research center or a department within the MoESD.

• The Government should ensure linkage (harmonized goals, policies and measures) among the national energy strategy, climate policy documents under the United Nations Framework Convention on Climate Change (UNFCCC), Low Emission Development Strategy, etc.;

• The Ministry of Economy and Sustainable Development (MOESD) should finalize the Energy Policy document and the National Energy and Climate Plan (NECP) and continue working on strategic planning capacity development within the ministry;

• The Ministry of Finance should allocate sufficient financial resources for strategic and planning capacity development of the MOESD.

 ¹⁶ Energy Community
¹⁷ Energy Community Secretariat, Annual Implementation Report, Georgia 2021
¹⁸ G. Mukhigulishvili, Climate Policy in Georgia, Caucasus Analytical Digest, November 2021
¹⁹ Energy Community Secretariat, Annual Implementation Report, Georgia 2021

8. PUBLIC AUTHORITIES

Score: 13, F, Unacceptable transparency Progress: -14 points compared to the 2020 Index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Public spending	3	-13	F	Unacceptable transparency
Transparency of public administration	35	-16	F	Unacceptable transparency

Spending budget funds is not transparent. The Basic Data and Directions (BDD) document provides budget priorities and information on particular budget programs. Detailed budgets and expenditures of particular entities (Ministry of Economy and Sustainable Development, GNERC, and Georgian Competition Agency) are available on the websites, but the information is not complete. Targets, KPIs, and other parameters are missing in most cases, and the reports of independent financial audits of budget programs implementation are not always available.

Georgia does not have a registry of state aid recipients. Some information is available on the Competition Agency's website on particular projects, but this is not a systematized registry. Annual reports on state aid are not available. The Law on competition adopted in march 2014 defines state aid as a decision made with respect to an undertaking stipulating tax exemptions, tax deductions or tax deferrals, debt relief, debt restructuring, granting loans on favorable terms, transfer of operating assets, monetary assistance, granting of profit guarantees, privileges, or other exclusive rights. The law describes the general rules for granting state aid²⁰; however, it does not address the lack of obligation to notify any aid measure for approval before it is granted. Enforcement of the State aid acquis in the energy sector is lacking since neither the Competition Agency nor GNERC considers themselves competent²¹.

Most public authorities publish draft regulatory acts and supplementary documents on their websites. All regulatory acts adopted are available on the consolidated website – the Legislative Herald of Georgia.

Results of monitoring the effectiveness of the regulatory acts implemented are not available.

Recommendations

• The Ministry of Economy and Sustainable Development, GNERC, and the Competition Agency should publish a complete summary of budget programs (incl. responsible public authority, objectives and targets, timeframe, expenditures, KPIs, etc.) following the OECD Good Practices for Performance Budgeting (2019) and IMF Guidelines for Public Expenditure Management (1999);

• The Competition Agency should establish a registry of state aid recipients with the corresponding state aid volumes and start publishing annual reports on state aid;

• The Ministry of Economy and Sustainable Development, GNERC, and the Competition Agency should publish the results of discussing draft regulatory acts and results of monitoring the effectiveness of the regulatory acts implemented.

 ²⁰ Law of Georgia on competition
²¹ Energy Community Secretariat, Annual Implementation Report, Georgia 2021

MOLDOVA

MOLDOVA'S 2021 ENERGY TRANSPARENCY INDEX

55, C-, Medium transparency

Progress: +2 points compared to the 2020 Index

1. BALANCES

Score: 88, A-, Excellent transparency Progress: +25 points compared to the 2020 Index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Annual balance statistics	100	+25	A+	Absolute transparency
Monthly balance statistics	75	+25	В	Good transparency

The National Bureau of Statistics (NBS) publishes annual and monthly natural gas and electricity balances. The annual energy balances are available for the 2015-2020 years on the website of NBS, in .pdf and .xls(x) formats.

Since 2015, the NBS has published monthly balance statistics following Regulation (EC) No 1099/2008. However, the information does not include the structure of electricity production. The 2021 score for the balances section

improved compared to the 2020 data mainly because the data for the previous periods and almost all required information are published.

Recommendation

• The NBS should ensure that the monthly balances of electricity include the structure of electricity production, following the Annex C to Regulation (EC) No 1099/2008 on energy statistics.

2. NATURAL MONOPOLIES

Score: 63, C, Medium transparency Progress: +10 compared to the 2020 index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Operation of transmission and distribution system operators	65	+12	C+	Medium transparency
Independence of transmission and distribution system operators	73	-2	B-	Good transparency
Development of transmission and distribution systems	72	+9	B-	Good transparency
Tariffs setting	42	+11	D-	Insufficient transparency

Compared to 2020 data, the score increased by 10 points for several reasons: 1) approval of the electricity market rules by ANRE; 2) the information of unavailability of consumption units is available on the ENTSO-E transparency platform. However, the score decreased for the subsections regarding operator compliance program and performance report.

Data is missing about the contracted and available transmission capacity of natural gas, as well as the ex-ante and ex-post supply and demand information, based on nominations, forecasts and realised flows in and out of the system. The gas TSO did not publish the information about the measures taken to balance the system as well as costs incurred and revenue collected. This resulted in low scores for the «Operation of transmission and distribution system operators" subcategory for natural gas.

The unbundling action plan of TSO Moldovatransgaz was postponed until the gas debt to Gazprom is not settled, according to minutes of negotiations from October 2021.

The TSO in electricity did not disclose the information related to transmission infrastructure, availability and use of forecasted and offered transmission capacity, congestion management measures and balancing. This resulted in low scores for the «Operation of transmission and distribution system operators" subcategory for electricity.

As for compliance programs, the transmission and distribution system operators published the documents on their websites, except the TSO in electricity.

According to the sample, all the operators published the development plans in line with the legal requirements. Still, DSOs in gas and electricity do not publish progress reports on implementing the network development plans.

The tariff setting indicators are below the acceptable transparency (42 points), mainly because of the non-availability of tariffs for the provision of balancing services and lack of online tools for calculating available service rates and checking available capacity for both electricity and natural gas. The Regulator approved new Electricity Market Rules. However, the act needs to be improved to establish the responsible party for balancing in the breakaway Transnistrian region.

Recommendations:

• The Regulator (ANRE) should approve the rules for balancing services in the natural gas sector;

• The TSO Moldovatransgaz should disclose the information on contracted and available transmission capacity, the results of periodic auctions on transmission capacity allocation;

• The ANRE should nominate the responsible party for balancing in the breakaway Transnistrian region;

• The TSO Moldelectrica should disclose the information on congestion management measures, unavailability of 100 MW or more of a generation unit (given the investment program of Termoelectrica), information on balancing (art. 17 of Regulation 543/2013).

• All three TSOs in electricity and gas should develop online tools for calculating available service rates and checking available capacity.

3. SUPPLY

Score: 53, D+, Insufficient transparency Progress: -10 compared to the 2020 index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Market barriers	40	+15	D-	Insufficient transparency
Market concentration and competition level	0	-25	F	Unacceptable transparency
Prices and pricing	70	-15	B-	Good transparency

The score was impacted negatively by the concentration in the wholesale and retail natural gas markets, the lack of data regarding the breakdown of transportation and distribution costs, the lack of data on the wholesale price of gas imports from the EU, incomplete information on the mark-ups in retail markets for electricity and gas.

The national registry of market participants does not include the information concerning the administrators and beneficial owners of the market operators, as required by Art. 9 (2) of the Regulation (EU) No 1227/2011.

The Regulatory Agency does not provide information about the supplier switching on retail electricity and gas markets. Respectively, the subcategory «Market barriers» scored only 40 points, which stands for insufficient transparency.

The competition in the natural gas sector is minimal. The Regulator does not publish any information about the Herfindahl-Hirschman Index (HHI), the total market share of the three largest companies (CR3), etc. However, according to the annual report of the Regulatory Agency, Moldovagaz supplier has a share of more than 95% of the wholesale and retail gas markets.

In the electricity sector, the data on retail market concentration is missing. The CR3 data is not included in the reports. Thus, the subcategory «Market concentration and competition level» scored 0 points and needs to be improved significantly.

The annual and semi-annual reports on the cost of electricity supplied by consumption bands, including the cost of production and supply, are available in monthly monitoring reports of NBS, as well as quarterly and annual reports published by the Regulator. Similar reports for the gas sector are incomplete due to a lack of data on transmission and distribution costs breakdown.

Recommendations:

• The Regulator should provide complete information in the national registry of market participants, including the administrators and beneficial owners of the licensees;

• The Regulator should compile and disclose the information on supplier switching and mark-ups in the retail electricity and gas markets;

• The Regulator should publish the data on the market share of the three largest companies in electricity and gas markets (CR3);

• The NBS should include data on transmission and distribution costs breakdown in the natural gas sector reports.

- - + - 2020 index

Insufficient transparency

Absolute transparency

Good transparency

4. RELIABILITY AND SECURITY

Scores by subcategories:

Reports on reliability and

Stocks and reserves

Security of supply

Subcategory

planning

security

		Progress: -13 compared to 2020 index									
es:											
	Score	Progress to 2020	Rating	Characteristic							

0

0

-25

D+

A+

В

3			
The decrease of transparence	cy is cause	ed by the	
unavailability of the reports	on the se	ecurity of	,
gas and electricity supply for	or the mos	st recent	,
reporting period.			

50

100

75

The data on stocks and reserves does not include gas storage facilities, as it is not applicable to Moldova. The information on generation facilities and their capacity is published on the TSO website. TSO also publishes the realtime load of the power system and the actual generation capacity of power plants, as well as import electricity flows. However, no data is disclosed on available generation capacity, as required by clause 3.3. of Annex B to Regulation (EC) No 1099/2008. The regulations and action plans on the emergencies in gas and electricity markets were approved by the government decisions No. 207 of April 03, 2019, and No. 149 of March 07, 2019, respectively. The Report on the security of electricity and natural gas supply of Moldova for the most recent reporting period is unavailable.

Score: 79, B, Good transparency

Recommendations:

• The TSO in electricity should provide data on available generation capacity.

• The Ministry of Infrastructure should publish the report on the security of electricity and natural gas supply of Moldova for the most recent reporting period.

5. CONSUMPTION

Score: 52, D+, Insufficient transparency Progress: +7 compared to 2020 index

Scores by subcategories:				
Subcategory	Score	Progress to 2020	Rating	Characteristic
Penetration of metering	50	+25	D+	Insufficient transparency
Service standards	100	0	A+	Absolute transparency
Information for consumers	33	-7	F	Unacceptable transparency

The penetration of metering has the lowest level of transparency, mainly due to a lack of regular reports regarding the number of final consumers equipped with gas meters and reports on the penetration of smart metering for both electricity and gas sectors. However, according to electricity market regulations, any consumption point can be connected to the grid only if equipped with metering. This requirement was in place even before Moldova's independence.

The Regulator (ANRE) enforced the requirements for the quality of gas/electricity supply (continuity, quality, service). ANRE's annual reports provide the data regarding the system operators' compliance with the regulation requirements.

The information for consumers in the electricity sector is minimal. Commercial offers (prices and terms of delivery) of electricity suppliers and price comparison tools (PCT) in the retail electricity market are unavailable. In the gas sector, PCTs are not available as well - although 24 licensed companies are listed in the registry of the gas supply market. The gas market is dominated by Moldovagaz (over 95%).

No information for ongoing calls for proposals is published on the website of the Energy Efficiency Agency, as required by Art. 8 of Directive 2012/27/EU. Only partial information for approved calls is available. The Energy Efficiency Agency published only the Guide for assessing projects related to energy efficiency.

Recommendations:

• The Regulator should include data in its annual reports on the number of final consumers equipped with gas meters and reports on the level of penetration of smart metering for both electricity and gas sectors;

• The electricity suppliers should publish commercial offers on their websites;

• The Regulator should establish price comparison tools in the retail electricity market;

• The Energy Efficiency Agency should enhance cooperation with mass media and conduct public events to disseminate the information on benefits and conditions of participation in energy efficiency programs and energy audit programs.

6. REPORTING

Score: 31, F, Unacceptable transparency Progress: +11 compared to 2020 index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Financial and management reporting	45	+11	D	Insufficient transparency
Fiscal reporting	17	+17	F	Unacceptable transparency
Beneficiaries and corporate governance	16	-4	F	Unacceptable transparency

The increase in the reporting section is caused by the fact that more DSOs in the sample published their financial reports. However, a number of the reports are incomplete or in a not machine-readable format.

Almost all system operators in the sample published their annual financial reports, except Vestmoldtransgaz TSO. However, in the gas sector, a few companies did not disclose complete financial reports with notes and explanatory information about each component of the balance sheet, while Moldovagaz did not include the entire debt to Gazprom in its financial report.

Despite precise regulatory requirements, several operators in the gas sector, electricity generation and supply did not publish auditor's opinions on financial reporting and annual management reports. Most probably, the information is not published on their website due to insufficient monitoring by the Regulator. Most documents are not in a machine-readable format.

The fiscal reporting contains only the information on the income tax. No data is disclosed concerning the types of taxes paid or the quasi-fiscal transactions and state aid received by enterprises.

The reporting provided by the private companies does not include the information

about the final beneficiaries. These companies disclose only the information about the shareholders (legal entities) in their financial reports.

Recommendations:

• The majority of licensees in the energy market should disclose complete financial reports, auditor's opinions on financial reporting, and annual management reports. The documents should be in a machine-readable format;

• The fiscal reporting should contain the information concerning the types of taxes paid, the quasi-fiscal transactions, and state aid disaggregated by enterprises;

• The private companies should disclose information about final beneficiaries.

7. POLICY

Score: 46, D, Insufficient transparency Progress: -24 compared to 2020 index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Monitoring and reporting	50	0	D+	Insufficient transparency
Energy efficiency	50	-44	D+	Insufficient transparency
Environmental protection and combating climate change	46	-14	D	Insufficient transparency
Renewable energy sources	38	-57	F	Unacceptable transparency

The score for this section was impacted negatively because the responsible public institutions are not publishing updated progress reports on several strategies.

The Ministry of Infrastructure and Regional Development does not conduct separate progress reports on implementing the Energy Strategy of the Republic of Moldova by 2030. However, its annual reports contain information on the achievements in the energy sector.

In December 2019, the Government approved the latest National Energy Efficiency Action Plan, developed for 2019-2021. The national energy efficiency targets are included in this plan. However, the progress report is available only for 2018 on the website of the Energy Efficiency Agency.

The authorities are lagging behind the agenda concerning the emission reductions from large combustion plants. The national strategy in this field is not yet developed. Therefore, no progress reports are made.

Moldova's National Renewable Energy targets are set up in Law No. 10/2016 on the promotion of the use of energy from renewable sources. The latest report on implementing the National Renewable Energy Action Plan is for 2018.

Recommendations:

• The Ministry of Infrastructure should publish progress reports on the Energy Strategy implementation;

• The Ministries of Environment and Infrastructure should ensure the elaboration of the National strategy on emission reductions from large combustion plants and publish respective progress reports;

• The Energy Efficiency Agency should publish in time the reports on the implementation of the National Energy Efficiency Action Plan and the National Renewable Energy Action Plan.

Score: 53, D+, Insufficient transparency Progress: +9 compared to 2020 index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Public spending	46	+13	D	Insufficient transparency
Transparency of public administration	67	0	C+	Medium transparency

The progress was mainly caused by ensuring free access to the registry of state aid recipients. However, the information is not updated regularly.

The Ministry of Finance started the elaboration of summaries for the budget programs, but the process was not finalized. Accordingly, the Ministry of Finance did not conduct any implementation reports, which makes the evaluation of related indicators impossible. The Court of Accounts conducts the independent financial audit of budget programs implementation. However, the corresponding indicator was assessed with zero points due to the absence of publicly available information on budget programs profiles.

The Registry of state aid recipients is available and the access is not restricted as in the previous year. The decisions related to state aid are published on the website of the Council of Competition. However, there is no separate compartment for such decisions. The Council of Competition also publishes annual reports on state aid, including different categories of recipients.

The draft regulatory acts are usually published in separate sections (Transparency in decision making) of websites by all public authorities. All documents include a table of proposals from stakeholders and substantiated position of public authority regarding their consideration/ non-consideration (with a few exceptions). However, no assessment is conducted on the effectiveness of the regulatory acts implemented. This is a significant drawback, as the public authorities do not assess the extent to which the approved regulations have contributed to achieving the objectives initially set.

Recommendations:

• The public authorities should accomplish the implementation of passports (profiles) of budget programs and the Ministry of Finance should publish the implementation reports;

• The Court of Accounts should conduct the audit of budget programs after the respective passports (profiles) are implemented;

• The Council of Competition should create a separate compartment for the decisions related to state aid;

• The public authorities should conduct assessments on the effectiveness of implemented regulatory acts and publish the reports on their websites.

ROMANIA

ROMANIA'S 2021 ENERGY TRANSPARENCY INDEX 80, B+, Good transparency

Progress: N/A

1. BALANCES

Score: 100, A+, Absolute transparency Progress: N/A

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Annual balance statistics	100	N/A	A+	Absolute transparency
Monthly balance statistics	100	N/A	A+	Absolute transparency

The National Institute for Statistics (INS) is in charge of publishing the annual balances for electricity and gas sectors, in pdf and excel, according to Regulation (EC) No 1099/2008, and information is readily available from 2015 onwards. Annual balance data is also transmitted to and published by Eurostat (though with a delay, currently available for 2019). Monthly data for the supply, consumption, and transformation of gas and electricity is available on Eurostat (currently for November 2021).

2. NATURAL MONOPOLIES

Scores by subcategories:

Score: 89, A-, Excellent transparency Progress: N/A

Subcategory	Score	Progress to 2020	Rating	Characteristic
Operation of transmission and distribution system operators	95	N/A	A+	Absolute transparency
Independence of transmission and distribution system operators	100	N/A	A+	Absolute transparency
Development of transmission and distribution systems	20	N/A	F	Unacceptable transparency
Tariffs setting	100	N/A	A+	Absolute transparency

Romania transposed in full the Third Energy Package in 2012-2013, and the national legislation and regulations are in line with the EU requirements, but it has only partially transposed the 2019 package. For transmission, the gas network code (published in 2013) and the electricity network code (published initially in 2004), with subsequent amendments, have clear rules on operational requirements for connection, capacity allocation, congestion management, rules for system balancing, forecasts for capacity reserve and information available for network users. In general, the websites of the two TSOs - electricity (Transelectrica) and gas (Transgaz) have up-todate, detailed information on all the indicators related to the operation of the system and access to the network, in easy-to-use excel format. The rules for market users are also easily accessible in respective subsections of the TSO webpages containing the detailed procedures or examples of calculation of available capacities. Information on capacities and infrastructure is also available for electricity on the ENTSO-E transparency platform (except for unavailability of consumption units and only partial information related to balancing).

Concerning the independence of transmission operators, both the electricity and gas sectors opted for the full ownership unbundling. Thus, the Ministry of Energy retained the state-owned energy producers (electricity -Hidroelectrica, Nuclearelectrica, ELCEN, etc.; gas - Romgaz, as well as shares in companies with majority private shareholders such as OMV Petrom). The TSOs were transferred originally to another ministry and are currently under the General Secretariat of the Government. This counted as a full ownership unbundling (ANRE certified the TSOs according to the Ownership Unbundling Model in 2014 for gas and 2015 for electricity and the Energy Community Secretariat endorsed the certification in

2015). Given the full ownership unbundling, there is no specific requirement for the TSOs to prepare compliance reports. However, the energy regulator ANRE checks changes such as the appointments of new managers and boards of the TSOs to ensure there is no violation of the unbundling principles in the process (e.g., avoiding conflicts of interest with the generation sector).

On distribution operators in the electricity and gas, all formerly integrated supply and distribution companies set up separate subsidiaries in the same group for the two activities. The larger 8 DSOs for electricity and 2 DSOs for gas publish annual compliance reports on their website.

The network development plans are the most problematic in terms of transparency. For electricity and gas transmission, the two TSOs publish ten-year network development plans (TYNDPs), which are submitted to ENTSO-E and ENTSO-G. However, the implementation of the plans is at best partial and there is no adequate follow-up - e.g., in consecutive TYNDPs, Transelectrica registers delays in 80% of network modernization projects and in all projects to connect new capacities. The regulator does not provide a detailed explanation for the non-implementation of major investment projects, which then transfer to the next TYNDP with adjusted timelines. Also, there are delays in the approvals of the plans, in particular, because of the legal requirements in recent years for the stateowned profitable companies to distribute up to 90% of their profits as dividends, a source of revenue to the central budget. Such requirement, sometimes contested by the boards of the state-owned companies, led to the delays in approvals of Transgaz' TYNDP, as the general shareholders' meeting may reject the plan for lack of funding. Thus, the latest approved plan is 2020-2029 and the TYNDP 2021-2030 is still open for consultations.

There is no transparency of the 5-year network development plans of DSOs in electricity and gas, which should be submitted to the energy regulator for approval (though ANRE reports to CEER in its annual reports that it has indeed reviewed and approved such plans). DSOs only publish press releases with the planned investments for the following year.

Tariffs are available on ANRE's website, including the detailed methodology (e.g., 5-year regulatory periods). However, the information is not easily searchable – tariffs are approved by ANRE orders and may be accessed by interested users in the regulator's database, searchable by Order number (and not always successfully by keywords from the title of the Order). Orders are published as scanned pdfs on ANRE's website, though available in a more usable format on the Official Gazette website. However, the data for previous periods (latest by 2020) is relatively readily available in ANRE's annual reports.

Recommendations:

• DSOs should publish their 5-year network development plans either on DSOs' websites or ANRE's website.

• ANRE should publish details on the implementation of the TSO's TYNDPs, with a detailed explanation of delays observed and corrective measures undertaken to speed up the investments in the grid.

• The electricity TSO should report to ENTSO-E information on the unavailability of consumption units as well as complete data on rules, terms, conditions, pricing, activated reserves, pricing, cross-border balancing, etc.

3. SUPPLY

Scores by subcategories:

Score: 88, A-, Excellent transparency Progress: N/A

Subcategory	Score	Progress to 2020	Rating	Characteristic
Market barriers	100	N/A	A+	Absolute transparency
Market concentration and competition level	100	N/A	A+	Absolute transparency
Prices and pricing	81	N/A	B+	Good transparency

The electricity and gas markets have been fully deregulated by 2016-2017, then returned to a regulated regime in 2019 and were again fully deregulated in July 2020 for gas and January 2021 for electricity. Social tariffs have been eliminated. There are two gas exchanges and one power exchange that are relatively transparent. The legislation mandates certain quantities of electricity and gas to be traded on these platforms to reveal real market prices. The current analysis does not consider the very recent legal framework and regulations issued from November 2021 onwards to keep energy prices under control for households and other consumers, as these are considered temporary. However, there is a risk that some elements of such legislation or regulations may persist well into 2022 and should be taken into account in the future edition of the Index. The current impact of the legislation on the transparency of supply data is not yet known (though a clear risk given the difficulties experienced by market participants on billing, calculating due compensations, etc.)

With these caveats, in general, data availability on supply is satisfactory. Not all relevant data is available directly on the websites of national institutions such as energy regulator ANRE but instead reported by EU-level structures – REMIT, ACER. For example, the National Register of Market Participants for gas and electricity is fully available on the REMIT website.

The energy regulator prepares monthly market analyses for electricity and gas (with a delay of 5-6 months as the data is collected from operators). The annual report covers major developments in the electricity and gas sectors. However, the information is rather descriptive, with little related information on ANRE's own activities, such as enhancing competition in the wholesale market. Such contain information on market reports prices, concentration, energy sources (major producers and importers), and some details on end-user prices. The reporting on electricity is generally better and more detailed than on gas - reflecting the legacy of institutional capacity in ANRE and relative market development in the past 15 years in the two sectors. However, meaningful market analysis is available in ACER's reporting, which covers retail markups, consumer switching, and provides more insights into the functioning of the energy market. A detailed breakdown of end-user prices is available half-yearly in the Eurostat database, comprising information about network tariffs, taxes, energy and supply by major types of consumers.

As social tariffs were eliminated a few years ago, there is no public service obligation (PSO) regime for electricity and gas and no such reporting to the Competition Council. Consumers who did not switch suppliers or choose a competitive offer from the incumbent supplier at the liberalization cutoff dates (January 2021 for electricity and July 2020 for gas) were taken over automatically by the incumbents under conditions of suppliers of last resort (which resulted in above-market prices for electricity in early 2021).

Recommendations:

Scores by subcategories:

• ANRE should publish more meaningful, detailed analytical reports on market monitoring, possibly in cooperation with the

4. RELIABILITY AND SECURITY

Competition Council. The two regulators have a cooperation agreement to better monitor market functioning in the electricity and gas sectors which could help them collaborate for better analysis. Electricity price increases in early 2021 (before the energy crisis) were caused by regulatory issues; greater transparency and better analysis would support correcting the errors in regulations and help explain to the public the causes of overall electricity and gas price increases in 2021.

• The Government (particularly the Ministry of Energy) and ANRE should analyze the impact of legislative and regulatory amendments towards the end of 2021 to ensure minimal distortions of the competition in the electricity and gas markets or their corrections.

• ANRE should prepare more user-friendly information on price components, including regulated tariffs for network, taxes, and various contributions, which can be summarized in the market monitoring reports.

Score: 57, C-, Medium transparency Progress: N/A

Subcategory	Score	Progress to 2020	Rating	Characteristic
Stocks and reserves	100	N/A	A+	Absolute transparency
Security of supply planning	50	N/A	D+	Insufficient transparency
Reports on reliability and security	33	N/A	F	Unacceptable transparency

Older EU legislation and regulations (e.g., prior to 2017) such as on stocks and reserves have generally been implemented, though the most recent regulations of 2019 have not. It should also be noted that the latest package of 2019 was transposed only in December 2021 in the energy law. However, the EU regulations apply immediately, while the actual implementation sometimes requires additional resources, national regulations, and institutional capacity that are provided for in the primary law. Thus, for example, currently, the Ministry of Energy is hiring additional staff to deal with the additional responsibilities for Regulation 941/2019.

The Ministry of Energy has published (with a 2-year delay) a contingency plan for an emergency in case of gas security issues, which is in rather general terms. Data on gas storage is published on the websites of the main storage operators Depogaz and Depomures. The information can also be found centralized at the EU level in the Aggregate Gas Storage Inventory (AGSI).

There is no effective monitoring of the security of supply in gas or electricity; for gas, the plan itself was just approved in July 2021. Apart from the requirements of the EU directives and regulations, the Ministry of Energy annually prepares winter preparedness plans under a task force comprised of key decision-makers and companies in the energy sectors (TSOs, DSOs, producers, etc.). This year's plan has been rather contested by experts as it does not provide sufficient assurance that the current energy crisis could not lead to disruptions of supply. In the electricity sector, Transelectrica has prepared and published a generation adequacy report in 2020. As highlighted above regarding gas, the implementation of the plan is not effectively and transparently monitored.

Recommendations:

• The Ministry of Energy should prepare an updated plan for energy security both in gas and electricity that is particularly relevant in the current context.

• The Ministry of Energy should establish a clear process of monitoring the energy security/ emergency plans implementation that must be correlated with ANRE's monitoring of the implementation of major investment projects included in the TYNDPs.

5. CONSUMPTION

Score: 85, A-, Excellent transparency Progress: N/A

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Penetration of metering	75	N/A	В	Good transparency
Service standards	100	N/A	A+	Absolute transparency
Information for consumers	86	N/A	A-	Excellent transparency

In general, information on consumption is quite transparent. There is clear legislation on the rollout of smart metering in electricity – mostly the energy law 123/2012 and energy efficiency law 121/2014 – though the initial deadlines (2020 for 80% of households) have been missed and the full roll-out has been pushed forward to 2026-2028. There is no smart metering for gas envisaged. The complete data on the smart metering roll-out per year for electricity consumption is available in ANRE's annual report.

The ANRE publishes reports with quite detailed information on the performance of networks (transmission, distribution) of gas and electricity. The reports provide a comparative assessment of the performance of DSOs in terms of interruptions – frequency, duration, etc. An EU-wide comparative report is available on CEER's website.

In preparation for the liberalization of 2016 (electricity) and 2017 (gas), ANRE developed an online tool allowing consumers to compare the offers and conditions of suppliers. The tool is user-friendly, provides a sufficient diversity of suppliers, and seems frequently updated. Though it cannot capture all details of the offers, it gives a good starting point for any consumer who considers switching suppliers. Subsidies and other support for vulnerable consumers are mostly limited to targeted income support for households below a certain income threshold. The latest law (226/2021) updates and replaces heating support instituted in 2011. Based on the provisions of the law, the amount of support can be easily calculated based on one's particular conditions (income, energy source).

There is relatively little information available on

energy efficiency programs except for a few budget-financed grants for energy efficiency in houses and a stimulus for replacing poor energy performance appliances with newer equipment, undertaken by the Environment Fund Administration. There is no entity monitor energy efficiency that would developments under market conditions (e.g. to consolidate this data for national reporting to the EU related to national energy efficiency commitments). ANRE published some visuals and small brochures to increase awareness of energy efficiency benefits, though these have not been widely circulated.

Regarding the support of energy audits, there is limited public sector effort beyond the marketdriven initiatives following the liberalization of the energy market after 2013 and there is currently no special legislation for ESCO.

Recommendations:

• ANRE or the energy efficiency department of the Ministry of Energy should disseminate more broadly the benefits of energy efficiency through an active, innovative campaign to reach broad audiences. The current year's problems caused by soaring energy prices would provide an additional opportunity to mobilize households.

• ANRE should accelerate substantially the smart metering roll-out, including avoiding technological incompatibilities of equipment if the roll-out is too protracted.

• The energy efficiency department within the Ministry of Energy should be substantially strengthened, including a functional review and reform of the structure of the Ministry to avoid conflicts of interest (e.g., between energy efficiency and the profitability of state-owned energy producers).
6. REPORTING

Score: 86, A-, Excellent transparency Progress: N/A

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Financial and management reporting	100	N/A	A+	Absolute transparency
Fiscal reporting	67	N/A	C+	Medium transparency
Beneficiaries and corporate governance	100	N/A	A+	Absolute transparency

Companies in the energy sector comprising most of the samples examined consist of state-owned electricity producers, in general with a minority private shareholder; a stateowned gas producer with a minority private shareholder and listed in Bucharest and London stock exchange; a private oil and gas producer; two public, but stock exchangelisted TSOs; 8 DSOs in electricity and 2 DSOs in gas, with majority private shareholding, large multinational companies or investors in the stock exchange. Financial and non-financial reporting is rather good and comprehensive, accounts are audited, and reports are generally published on the companies' websites.

Romania is unfortunately not part of the EITI. Even though payments to governments are published by the two large gas producers included in the sample, there is little reporting on various forms of quasi-fiscal transactions or state aid. It is, however, relatively difficult to provide state aid in the energy generation sector without it being promptly detected and penalized by DG Competition (even though there have been numerous attempts to provide hidden state aid such as preferential market access to coal-fired electricity generators or cross-subsidies, these practices have become much more complicated in recent years following increased external scrutiny). The only fossil sector where state aid remains significant and is still acceptable under EU rules for a transitional period is district heating.

Recommendations:

• Even though reporting is excellent, mainly because companies benefit transparency, Romania should become a member of EITI to enhance transparency in the extractive sector, particularly oil and gas.

• The Ministry of Finance should publish separately a more detailed set of data concerning the taxation of the oil and gas sector, given the controversies and the public perception that the industry shares too little with the society. Such controversies have been one of the key barriers in the development of gas production, e.g., in the Black Sea.

7. POLICY

Score: 61, C, Medium transparency Progress: N/A

Subcategory	Score	Progress to 2020	Rating	Characteristic
Monitoring and reporting	25	N/A	F	Unacceptable transparency
Energy efficiency	25	N/A	F	Unacceptable transparency
Environmental protection and combating climate change	73	N/A	B-	Good transparency
Renewable energy sources	100	N/A	A+	Absolute transparency

Scores by subcategories:

Strategic planning is the major weakness in Romania's energy sector, with most policies adopted ad hoc, frequently amended, and inconsistent. The latest energy sector strategy was adopted in 2007 and is obsolete since the early 2010s. Despite efforts to update or develop a new energy strategy, particularly after 2016, no strategy has been finalized. EU funds from Operational Programs, financial instruments such as the Modernization Fund and, more recently, the National Recovery and Resilience Plan partly compensate for the absence of a strategy and give some direction to energy policies.

As EU member states and accession countries were required to produce National Energy and Climate Plans, Romania has developed one as well, approved in October 2021. The comprehensive document as a de facto strategy is likely to work better than EU financial instruments. There are no mechanisms in place to monitor the implementation, either of strategies or the legal and regulatory framework adopted in general.

For NEEAP and NREAP, monitored from before 2015 as EU requirement, reporting was fragmentary – e.g., the energy efficiency monitoring failed to record buildings renovations that took place at a local level because there is no systematic collection of data at a central level on projects that are subnational or non-EU funded. NREAP and NEEAP ceased to be monitored altogether for 2020 as the NECP was being prepared. Due to the absence of a real strategic vision fully embraced by the Government and consistently pursued, the EU funds absorption is deficient, projects are not implemented, and investments fail to materialize. Since 2016, there have been virtually no new substantial investments in electricity or gas generation. There is currently no strategy for the climate. The Ministry of Environment's Climate Strategy 2013-2020 (for which the Action Plan with actions on multiple sectors, prepared by the

World Bank, was published in 2015) has not been updated and its implementation was not monitored. The Ministry of Environment monitors and reports emissions – GHG (national inventory) to UNFCCC and industrial emissions to the EU.

Recommendations:

• The Ministry of Energy should substantially improve its strategic planning capacity to meet energy and climate objectives committed to at the EU level and for better policy coordination, including a reduction of ad hoc legislative and regulatory changes.

• The General Secretariat of the Government should ensure coordination among various relevant departments in key ministries (Ministry of Energy, Ministry of Environment, Department of Sustainable Development, but also Transport, Agriculture, etc.).

8. PUBLIC AUTHORITIES

Scores by subcategories:

Score: 50, D+, Insufficient transparency Progress: N/A

Subcategory	Score	Progress to 2020	Rating	Characteristic
Public spending	62	N/A	с	Medium transparency
Transparency of public administration	25	N/A	F	Unacceptable transparency

While data on approved budgets and budget amendments is generally available and with an appropriate level of detail for the central budget, local administrations, public institutions, etc., in pdf or excel formats, the information on actual budgetary execution is not always updated or in a unitary format. The Ministry of Energy and the Competition Council publish aggregated data on budget execution or payments. In its annual report, ANRE has a chapter detailing the use of financial resources during the year reported. However, neither the initial budgets nor the execution is clearly linked to policy objectives, key performance indicators, or other measures that would allow an independent analysis of whether the available funds were adequately spent.

Public sector agencies or ministries do not contract external auditors to check the financial reporting. However, the Court of Accounts has the capacity to request information, analyze the use of public funds, make recommendations or penalize responsible parties for misuse or poor use of funds. The Court of Accounts can verify ad hoc or at request (or complaint) the use of funds or assets in any public entity. In general, the Court of Accounts undertakes an annual audit of major public institutions from the sample – the Ministry of Energy and the Competition Council, and partly ANRE on its budget of revenues and expenses. The results of the audits are aggregated in the Court of Accounts annual report (the latest available for 2019). The level of detail in the report does not allow assessing the depth of the audits for each institution, issues addressed, and corrections adopted.

The Competition Council has a national registry for state aid which is relatively easy to use and searchable by recipient, type of aid, sector, etc. The registry may not be complete, e.g., it seems to cover beneficiaries of individual decisions on state aid but not state aid schemes approved for multiple beneficiaries in competition (e.g., cogeneration bonus, EU funds in competitive schemes, or support for district heating). The registry also has the information of the state aid approved but not necessarily used (e.g., one beneficiary may use only a part of state aid requested). Annual reports of the Competition Council provide a summary of schemes and beneficiaries (numbers) recipients of state aid, with total budgets during the year.

In preparing legislation and regulations, initiators are legally required to provide a justification and an impact analysis (budget, effects, etc.), publish draft documents for comments or organize public consultations, and integrate comments. However, in most cases, the justification is formal and rarely goes beyond the budget impact, such as the total cost of the measure (not always well prepared). Many legal and regulatory acts are, in fact, amendments to previous legislation, which take place very frequently, with poor or ineffective consultations, to solve issues that resulted from an earlier poor legislative act. For example, the energy law 123/2012 has been amended no less than 24 times since its initial approval, of which 13 times by ad hoc executive orders (Government Emergency Ordinance). All laws and regulations, when proposed, are initially published for comments on the initiator's website, though regularly for less than the mandatory minimum time, and there is no systematic process of integrating or responding to comments.

The final legislation is available in the Official Gazette and on the initiators' websites (in the sample – the Ministry of Energy and ANRE). There is virtually no monitoring of the implementation, and, in general, legislation and regulations are amended ad hoc when

there is pressure from stakeholders (e.g., a previous law created some unforeseen negative consequence to a part of the stakeholders that needs correction).

Recommendations:

• The Ministry of Energy, ANRE, and the Competition Council should publish a userfriendly summary of budget programs, including objectives and targets, timeframe, expenditures, KPIs, etc., following the OECD Good Practices for Performance Budgeting (2019) and IMF Guidelines for Public Expenditure Management (1999). The execution of budgets should also be published to allow the comparison of plan vs. performance and monitor the achievement of the objectives.

• The Competition Council should publish a more detailed analysis of state aid provided during the year, including an ex-post analysis of the impact of state aid (e.g., possible competition issues requiring an adjustment of the state aid scheme).

• The Ministry of Energy, ANRE, and Competition Council should monitor their respective legislation and regulations during implementation and revise the legal and regulatory framework only based on systematic impact monitoring.

UKRAINE

UKRAINE'S 2021 ENERGY TRANSPARENCY INDEX (international version)²²

69, C+, Medium transparency

Progress: +9 points compared to the 2020 Index

1. BALANCES

Score: 75, B, Good transparency Progress: +12 points compared to the 2020 Index

Scores by subcategories:

Subcategory	Score	Progress to 2020	Rating	Characteristic
Annual balance statistics	100	+25	A+	Absolute transparency
Monthly balance statistics	50	0	D	Insufficient transparency

A comparison with the 2020 assessment demonstrates some progress. However, it was made due to the later period of evaluation (December 2021), when the State Statistics Service (SSS) managed to publish annual balances by energy products.

No progress was observed in the SSS compliance with requirements of the Regulation (EC) No 1099/2008 in the disclosure of monthly statistics. Insufficient transparency of the «Monthly balance statistics» subcategory is caused by SSS not having proper legislative grounds and the necessary resources to collect data on the volumes and composition of production (extraction), use (consumption), exports, imports, and stock changes of energy resources. Thus, there is incomplete monthly data on electricity and gas published by the SSS.

Even though other public authorities (the Ministry of Energy) and companies (Ukrenergo) publish some relevant statistics, the availability and accessibility of this data could not affect the overall score because the Regulation (EC) No 1099/2008 imposes this responsibility on the national statistical authority.

Recommendations

• Cabinet of Ministers of Ukraine should confer on the State Statistics Service the liability to develop monthly product balances for energy resources (electricity, natural gas, steam coal, oil and liquid fuels, and heat) in part concerning compliance with requirements of Annex C to the Regulation (EC) No 1099/2008 on energy statistics.

²²The extended national version of the <u>2021 Index</u> is based on a broader range of indicators (212), thus some assessments may differ compared to the international version.

2. NATURAL MONOPOLIES

Score: 79, B, Good transparency Progress: +16 compared to the 2020 Index

Scores	bv su	bcategories:
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Subcategory	Score	Progress to 2020	Rating	Characteristic
Operation of transmission and distribution system operators	88	+19	A-	Excellent transparency
Independence of transmission and distribution system operators	55	+28	C-	Medium transparency
Development of transmission and distribution systems	71	+4	B-	Good transparency
Tariffs setting	52	0	D+	Insufficient transparency

Liberalization of the electricity and natural gas markets continues improving transparency in the «Natural monopolies» category. In 2021, the level of transparency grew in 3-of-4 subcategories, with the most progress in informing users of transmission and distribution systems (from 69 to 88 points) and information confirming the independence of operators (TSOs and DSOs) (from 27 to 55 points). This progress was made due to the efforts of electricity and gas TSOs (Ukrenergo and Gas TSO of Ukraine). As a result, more information required to be disclosed according to the EU's best practices became available on their websites.

Thanks to active lawmaking, the information openness in the «Electricity» and «Natural gas» sectors improved to 77 and 82 points, respectively (versus the last year's 63 points in both sectors).

Compared to the 2020 assessment, the most progress electricity TSO (Ukrenergo) demonstrated on publishing data on the ENTSO-E transparency platform, particularly regarding re-dispatching rules, incl. curtailment, year-ahead forecast margin, and generation forecasts, as required by Regulation (EU) No 543/2013. However, the generation forecasts data is incomplete since it lacks information about production units (existing and planned) with an installed generation capacity equalling to or exceeding 100 MW.

Following the preliminary Regulator's decision on the certification of Ukrenergo as a TSO under the ISO model, the company published its compliance program for the first time. The first report on the program is expected in 2022. The most progress in gas was observed in publishing by the gas TSO complete data on the available transmission capacity for all points, including entry and exit points for the next 24 months, and on auctions on transmission capacity allocation for all time frames. Additionally, the gas TSO revealed information on rules of system balancing and the respective measures taken along with the costs incurred and revenue collected. Besides, detailed data on gas quality on domestic routes (gas transmission system entry/exit points) became available on the gas TSO website, and daily data (calorific value and the Wobbe index) for interconnectors is available on the ENTSO-G platform.

The gas TSO also published its compliance program, although the implementation report is yet to be developed and disclosed.

Unfortunately, the operators mentioned above still have not fulfilled the following requirements:

• Ukrenergo: Regulation (EU) No 543/2013 concerning capacity allocation and congestion management (in particular, forecasted);

• Gas TSO of Ukraine: Regulation (EC) No 715/2009 concerning the informing on ex-ante and ex-post transmission capacity supply and demand.

Besides, the electricity and gas TSOs still do not provide transmission systems' users with online tools for calculating rates for various TSOs' services and checking the available transmission capacity.

Recommendations

• Ukrenergo should ensure compliance with requirements of Articles 13 and 14 of the Regulation (EU) No 543/2013 on disclosure of information on congestion management measures and complete data on generation forecast;

• Gas TSO of Ukraine should ensure compliance with requirements of Articles 18 (6)

3. SUPPLY

Scores by subcategories:

and 21 (2) of the Regulation (EC) No 715/2009 on publication of ex-ante and ex-post data regarding transmission capacity supply and demand;

• the NEURC and network operators should ensure timely and regular publication of compliance programs, transmission and distribution system development plans, and respective implementation reports in machine-readable formats.

Score: 68, C+, Medium transparency Progress: +5 compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Market barriers	60	+10	с	Medium transparency
Market concentration and competition level	100	0	A+	Absolute transparency
Prices and pricing	66	+5	C+	Medium transparency

Comparison with the 2020 assessments indicates the increase of transparency in the «Market barriers» and «Prices and pricing» subcategories. However, the «Market barriers» subcategory score grew from 50 to 60 points only due to including a new indicator regarding the rules of tendering procedure for granting RES support, with excellent transparency. The rest of the subcategory's indicators remain without progress. Particularly, there is still incomplete data in national registries of electricity and gas markets' participants compared to REMIT requirements, i.e.. persons responsible concerning for operational and trading decisions and the ultimate beneficial owners. The data regarding switching suppliers published in the Regulator (NEURC) annual report is incomplete as well since the Regulator provided only total numbers of switching without the information on its average duration and the possibility of choosing a specific switching date by consumers.

At the same time, the Regulator continues the good practice of regular monitoring and publishing information on concentration and competition in electricity and gas markets (companies' market shares, CR3, Herfindahl-Hirschman Index, etc.) in quarterly monitoring reports.

Transparency in the «Price and pricing» subcategory moderately grew due to improved disclosure of price monitoring results. Notably, the Regulator improved the frequency of quarterly price monitoring reports publication

and partially provided information on mark-ups - for universal service suppliers in electricity. However, there was some decline in the transparency of regulated prices because the Regulator failed to publish an approved methodology for setting up price caps for various electricity market segments.

Besides, several «black boxes» remain in the «Supply» category due to a lack of

- average annual electricity and gas prices for household and non-household consumers (by consumption bands) and price composition following the Regulation (EU) 2016/1952;
- a methodology for regulation of retail gas prices for particular consumer groups (so far, quasi-regulation of wholesale and retail gas prices by the government is observed);
- mark-ups in the retail gas market.

The exhaustive information in the «Supply» category could be expected only after the full-fledged establishment of the electricity and gas markets while maintaining the role of the government in fostering competition, preventing market power abuse, and proper consumer protection.

Recommendations

• the Cabinet of Ministers should develop and publish the methodologies for calculation of regulated gas prices in the wholesale and retail markets with a rationale for such regulation, the regulatory impact assessment, and respective expiration date; • the Cabinet of Ministers should shift from quasi-fiscal decisions in energy supply to socially vulnerable consumers without specific methodological basis to implementing transparent mechanisms of their subsidizing;

• the NEURC should ensure completeness of information in the registries of licensees in terms of data on persons responsible for operational and trading decisions and on beneficial owners (as required by REMIT) and in the reports on supplier switching in gas and electricity;

4. RELIABILITY AND SECURITY

• the NEURC should approve and publish a methodology for setting price caps in the day-ahead, intraday, and balancing electricity markets;

• the NEURC and AMCU should launch regular monitoring and assessment of mark-ups in the electricity and gas markets;

• the State Statistics Service should publish, in addition to semiannual, annual reports on gas and electricity prices following the requirements of Regulation (EU) 2016/1952.

Progress: +7 compared to the 2020 Index

Score: 77, B, Good transparency

Subcategory	Score	Progress to 2020	Rating	Characteristic
Stocks and reserves	94	0	Α	Excellent transparency
Security of supply planning	50	0	D+	Insufficient transparency
Reports on reliability and security	83	+16	B+	Good transparency

Scores by subcategories:

A comparison with the 2020 assessments indicates the growth of transparency in the «Reportson reliability and security» subcategory (from 67 to 83 points). This progress was caused by producing by the Ministry of Energy for the first time the monitoring report on the security of electricity supply for 2019. However, the Ministry failed to produce and timely publish monitoring reports on the security of electricity and gas supply for 2020²³.

The «black box» in the «Reliability and security» category remains an obligation set in the

Regulation (EU) 2019/941 on establishing a Risk-preparedness plan in electricity.

Recommendations

• the Ministry of Energy should ensure timely and regular publication of monitoring reports on the security of electricity and gas supply;

• Ukrenergo should publish the Power System Protection Plan and consider the repeal of Directive 2005/89/EC by the Regulation (EU) 2019/941 requiring the TSO to develop Risk Preparedness Plans annually.

5. CONSUMPTION

Scores by subcategories:

Score: 87, A-, Excellent transparency Progress: +16 compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic	
Penetration of metering	75	+12	В	Good transparency	
Service standards	100	0	A+	Absolute transparency	
Information for consumers	89	+23	A-	Excellent transparency	

A comparison with the 2020 assessments indicates the increasing transparency in the «Penetration of metering» subcategory, mainly due to the publication of data on smart meters penetration in electricity. However, similar data on smart gas metering penetration remains unavailable. The performance of the <u>Gazoteka</u> price comparison tool and the Energy Online mobile app developed jointly with the NEURC under the USAID support has improved. It caused a surge of transparency in the «Information for consumers» subcategory. Both services are free of charge. The <u>Gazoteka</u> provides

²³The Ministry of Energy published the 2019 monitoring report on the security of electricity supply on 26 January 2021.

consumers with up-to-date monthly data on gas suppliers' commercial offers and prices. However, the Energy Online mobile app does not reflect data on electricity prices in the non-regulated part of the retail market. It indicates the need to continue developing digital applications and online services to provide consumers with user-friendly options for comparing commercial offers and prices in energy markets, facilitating supplier switching. At the same time, some electricity and gas suppliers in the samples assessed do not provide consumers with information on historical prices, which prevents understanding of their dynamics and complicates choosing an appropriate supplier.

Transparency of information on benefits and conditions of participation in energy audit programs and implementation of energy managementimproved.Particularly,respective recommendations and mechanisms are available on the Energy Efficiency and Energy Savings Agency website. The Agency also organizes regular seminars fostering energy management and reports on the progress to the Energy Community Secretariat.

Recommendations

• the NEURC should monitor and regularly publish data on the penetration of individual gas smart meters;

• electricity and gas suppliers should provide consumers with historical data on their price offers to facilitate understanding of price dynamics and more reasonable supplier choice;

• the NEURC should foster the development of comprehensive price comparison tools in electricity and gas following the best European practice to empower consumers and facilitate supplier switching.

6. REPORTING

Scores by subcategories:

Score: 36, F, Unacceptable transparency Progress: +12 compared to the 2020 Index

Subcategory	Score	Progress to 2020	Rating	Characteristic
Financial and management reporting	48	+23	D	Insufficient transparency
Fiscal reporting	8	+3	F	Unacceptable transparency
Beneficiaries and corporate governance	54	-2	D+	Insufficient transparency

Compared to the 2020 assessment, transparency in the «Reporting» category increased from 24 to 36 points. Although the progress was partially driven by the update of samples, the overall improvement was achieved primarily due to quality shifts.

The score in the «Financial and management reporting» subcategory surged by 23 points due to the dissemination of the practice of regular developing separate and consolidated financial statements compliant with the International Financial Reporting Standards (IFRS), along with the related independent auditor's reports. However, only 3-of-20 companies in the sample regularly produce exhaustive management reports according to Directive 2013/34/EU requirements. Publication of data in the form of scanned documents, which complicates its processing and analysis, remains a widespread drawback of corporate reporting in the sector.

Overall, the transparency of companies' reporting on taxes and other payments to the

government («Fiscal reporting» subcategory) remains dramatically low (8 points). The only exception is the reporting of extractive companies within the EITI framework which reached the maximum comprehensiveness. This practice caused a slight increase in transparency in this subcategory by 3 points compared to the 2020 score. Immediately after the template for the report on payments to the government was approved, extractive companies began disclosing this data. However, most companies do not publish this information on their websites and provide it only within the EITI framework.

The highest score of the «Beneficiaries and corporate governance» subcategory within the category relates to the comprehensive publication of information about the final beneficiaries by most securities emitters. Only 2-of-14 companies in the sample did not provide any data on their beneficial owners, and three companies provided incomplete information.

Recommendations

• energy companies should regularly produce management reports as a separate document or as part of annual corporate reports;

• the Ministry of Energy should ensure regular reporting by energy companies and publication of their reports on payments to the government following requirements of the Laws «On Accounting and Financial Reporting

7. POLICY

in Ukraine» and «On Transparency of Extractive Industries»;

• the Ministry of Energy should ensure the proper functioning of the electronic reporting system according to the EITI Standard and continue regular development of national EITI reports;

• energy companies should publish financial reporting tables in machine-readable formats.

Progress: -7 compared to the 2020 Index

Score: 55, C, Medium transparency

Score Progress to 2020 Rating Characteristic **Subcategory** Monitoring and reporting 63 -12 С Medium transparency Energy efficiency 75 -13 В Good transparency Environmental protection and combating climate -8 D-41 Insufficient transparency change Renewable energy +13 C+ 69 Medium transparency sources

Scores by subcategories:

Comparing with the 2020 assessments indicates declining transparency in 3-of-4 subcategories and the whole category. The score in the «Monitoring and reporting» subcategory fell from 75 to 63 points due to inadequate reporting by the Ministry of Energy on implementing the Energy Strategy of Ukraine until 2035, particularly regarding objectives of the action plan not duly fulfilled. Also, the Ministry of Economy did not provide an updated progress report on monitoring objectives for Sustainable Development Goal 7 «Affordable and Clean Energy» with the data for 2020.

The failure to meet the deadline for updating the National Energy Efficiency Action Plan (NEEAP) and the national energy efficiency target, as well as producing respective progress report, resulted in the worsened transparency score in the «Energy efficiency» subcategory (-13 points).

There is no up-to-date information on the progress in implementing the National Low-Carbon Strategy and the Nationally Determined Contribution of Ukraine to the Paris Agreement (despite the updated NDC). The Ministry of Energy traditionally does not produce annual action plans for implementing the National Emission Reduction Plan (NERP). Besides, the Ministry fails to provide fullfledged yearly progress reports on the NERP. These deficiencies kept the insufficient transparency of the «Environmental protection and combating climate change» subcategory (41 points). The decline in the transparency of the subcategory (-8 points) was caused by adding a new indicator - the National Energy and Climate Plan (NECP), which is yet to be approved by the government and published as required by the Regulation (EU) 2018/1999²⁴.

The National Renewable Energy Action Plan (NREAP) is being updated with delay. Moreover, the previous plan (until 2020) did not provide a description of support schemes for renewables as required by EU directives. However, transparency of the «Renewable energy sources» subcategory improved due to the publication of the progress report on NREAP implementation for 2019-2020.

Recommendations

• the Cabinet of Ministers should approve the updated National Energy Efficiency Action Plan and provide its subsequent update every three years;

• the Energy Efficiency and Energy Saving Agency should update the National Renewable Energy Action Plan every two years with a due description of schemes and a long-term timeline of state support;

• the Ministry of Energy should abide by the publication deadlines and improve the

²⁴The NECP content is regulated by the Guidelines 2018/01/MC-EnC of the Ministerial Council of the Energy Community.

completeness of annual reports on the implementation of the Energy Strategy of Ukraine until 2035; in particular, apply the monitoring approach proposed by OECD²⁵;

• the Ministry of Energy should produce and publish annual action plans on the implementation of the National Emission Reduction Plan and ensure due reporting to the Energy Community Secretariat in the format defined in the National Plan;

• the Ministry of Energy should complete the development, approval, and publication of the National Energy and Climate Plan following the Energy Community Secretariat Guidelines; • the Ministry of Ecology and Natural Resources should publish information on the progress in implementing the National Low-Carbon Development Strategy and the Nationally Determined Contribution of Ukraine to the Paris Agreement;

• the Ministry of Energy, Ministry of Economy, Energy Efficiency and Energy Saving Agency should ensure timely publication of exhaustive reports on implementing national policy documents and fulfilling Ukraine's international commitments in the official language.

8. PUBLIC AUTHORITIES

Scores by subcategories: Subcategory Score Progress to 2020 Rating Characteristic Public spending 57 +8 C-Medium transparency Transparency of public 53 +2 Insufficient transparency administration

Compared to the 2020 assessment, the «Public authorities» category demonstrated progress and shifted from insufficient to medium transparency. It was caused mainly by the improved transparency in the «Public spending» subcategory. The Ministry of Energy improved the completeness of budget planning documents, and the Accounting Chamber published a report on the financial audit of the Regulator (NEURC) for 2020. The main issue remains the poor usability of the published budget programs and implementation reports (primarily scanned copies). Besides, the relevance and frequency of the independent financial audit reports on budget programs implementation remain the gap for all public authorities of the sample.

The Antimonopoly Committee (AMCU) administers the «State Aid» website and publishes the registries of state aid recipients and respective decisions, as well as the annual report on state aid. However, the information on state aid granted to energy companies remains incomplete since it is provided as the total amount without a breakdown by particular recipients.

Compared to the 2020 assessment, the publication of stakeholders' comments on draft regulatory acts and the results of their consideration by the NEURC worsened. Besides, the AMCU does not provide up-to-date information on draft regulatory acts, while the approved acts are now published in the format of unscanned .pdf files.

Overall, the growth of transparency in the «Public authorities» category is restrained by the following «black boxes»:

- incompleteness and untimely publication of draft regulatory acts with stakeholders' comments and results of their consideration;
- inadequate impact assessment of the regulatory acts adopted and unavailability of comprehensive reports on its results and further monitoring.

Recommendations

- the State Audit Service and the Accounting Chamber should regularly publish reports on the financial audit of budget programs implementation by the Ministry of Energy, NEURC, and AMCU;
- the AMCU should update the registries of the state aid reflecting particular recipients and detailed data on state aid granted;
- the Ministry of Energy, NEURC, and AMCU should ensure publication of stakeholders' comments and suggestions regarding draft regulatory acts and results of their consideration;
- the Ministry of Energy, NEURC, and AMCU should deliver full-fledged ex-ante and ex-post impact assessment of the adopted regulatory acts and publish its results;
- the Ministry of Energy, NEURC, and AMCU should publish policy and supplementary documents, reports, etc., in a machinereadable format.

²⁵<u>https://www.oecd.org/eurasia/competitiveness-programme/eastern-partners/Monitoring-the-energy-strategy-Ukraine-2035-EN-.pdf</u>

Score: 56, C-, Medium transparency Progress: +6 compared to the 2020 Index



METHODOLOGY

The Energy Transparency Index **methodology** is based on the universal statistical method of multidimensional weighted average, used to assess complex objects, processes, and phenomena. The Index dimensions include specific transparency indicators, their sets (categories and energy markets), and transparency aspects (criteria).

An **indicator** is a specific way of measuring the transparency of a certain object (e.g., energy company, public authority), process (e.g., pricing, regulation, trade, etc.), or phenomenon (e.g., market, competition, etc.). A set of indicators forms the lowest level of the Index decomposition. This study analyzed **117** indicators with indispensable and sufficient transparency features (contents of information, its format, frequency of updating, etc.) defined in European legislation and/or best global practices of information disclosure.

The study focuses on two **energy markets:** natural gas (41 indicators) and electricity (45 indicators), as well as cross-sector issues (31 indicators).

Grouping the indicators into **categories** allows various stakeholders to obtain information regarding the transparency in different parts of the energy sector throughout its value chains. By analyzing the requirements and practices of information disclosure, the indicators were grouped into eight categories:

• **«Balances»**: defines the transparency of annual and monthly energy statistics;

• «Natural monopolies»: defines the transparency of transmission and distribution system operators;

• **«Supply**»: defines the transparency of rules, competition, prices and pricing in the energy markets;

• **«Reliability and security»**: defines the transparency of stocks and reserves, rules and reports on the security of supply;

• «Consumption»: defines the transparency of energy consumption metering, customer service standards, information for consumers on prices and tariffs, subsidies, preferences and other aid, and energy efficiency programs;

• **«Reporting»**: defines the transparency of corporate financial statements and auditor reports, management reports, payments to the government, information regarding final beneficiaries;

• **«Policy»**: defines the transparency of implementing policy documents on energy and

sustainable development, energy efficiency, environmental protection, combating climate change, and renewables;

• **«Public authorities»**: defines the transparency of public spending, as well as designing, adopting, and implementing policy and regulatory decisions.

For the convenience of assessment and analysis, indicators in each category were grouped into subcategories and groups.

The **transparency criterion** is an aspect of assessing transparency of an object, process, or phenomenon. Each indicator was evaluated by six transparency criteria:

• «Availability»: the existence of information in open sources;

• «Accessibility»: a measure of free access to information;

• **«Relevance»**: availability of information for the most recent reporting period or the moment of assessment;

• **«Frequency»**: compliance with the requirements regarding the regularity of updating and storing the information;

• **«Usability»**: convenience and simplicity of using disclosed data and information;

• **«Completeness»**: availability of exhaustive information required to be disclosed following legislative requirements or best global practices.

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• **«Usability»**: convenience and simplicity of using disclosed data and information;

• **«Completeness»**: availability of exhaustive information required to be disclosed following legislative requirements or best global practices.

Transparency criterion	Score
Availability (C_{av})	0 – information unavailable 1 – information available
Accessibility (C_{ac})	0 – access to available information requires payment of a fee or prior request 0.5 – access to available information requires authorization (after providing user's personal data) 1 – information in free access
Relevance (C _{rl})	0 – information for the most recent reporting period unavailable 1 – information for the most recent reporting period available
Frequency (C_{fr})	0 – information not updated and not available for past periods 0.5 – information updated but not available for certain past periods 1 – information updated according to requirements and available for past periods
Usability (C _{us})	 0 – information available in a not machine-readable format (jpg, jpeg, png, pcx, tiff, scanned pdf, etc.) 0.5 – available information can be copied or processed (numerical: docx, pdf, html, xlsx (unstructured data)) 1 – information available in a machine-readable format (numerical: xlsx (structured data), csv, xml, json; textual: docx, non-scanned pdf)
Completeness (C _{in})	0 – information to be disclosed unavailable within the required period 0.5 – information to be disclosed partially available within the required period 1 – all information to be disclosed is available within the required period

Each Index's indicator was assessed via monitoring the open sources (websites of public authorities and energy companies, open data and institutional repositories). The aggregate score of each transparency indicator was calculated by the following formula:

$$\mathbf{T}_{i} = \mathbf{C}_{av} \cdot (\mathbf{C}_{ac} + \mathbf{C}_{rl} + \mathbf{C}_{fr} + \mathbf{C}_{us}) \cdot \mathbf{C}_{in},$$

with $C_{av'}$, $C_{ac'}$, $C_{rl'}$, C_{rr} , $C_{us'}$, C_{in} are scores for the availability, accessibility, relevance, frequency, usability and completeness criteria, respectively.

If any information can be obtained only for a fee or upon prior request ($C_{ac} = 0$), it was considered unavailable ($C_{av} = 0$). For all qualitative indicators, $C_{rl} = C_{fr} = 1$ if the information was available ($C_{av} = 1$) and accessible ($C_{ac} = 1$).

Considering the large size of the transparency indicators, they were considered of equal weight. Therefore, the average values were used to develop sub-indexes for the categories, subcategories, and markets.

AGGREGATION OF SCORES

To calculate the total Index score, weightings of the Index's categories were applied:

Category	Weighting
Balances	0.05
Natural monopolies	0.20
Supply	0.20
Reliability and security	0.05
Consumption	0.20
Reporting	0.10
Policy	0.10
Public authorities	0.10

INTERPRETATION OF SCORES

All scores were converted into a 100-point scale as $25T_i$, rounded off and given the following interpretation:

Score	Rating	Characteristic
95100	A+	absolute transparency
9094	Α	excellent transparency
8589	A-	
8084	B+	good transparency
7579	В	
7074	B-	
6569	C+	medium transparency
6064	С	
5559	C-	
5054	D+	insufficient transparency
4549	D	
4044	D-	
039	F	unacceptable transparency

LIMITATIONS

The Index **cannot be applied** to assess the transparency of:

• the energy sector in real-time, since its calculation requires the processing of large amounts of information for the reporting period (as a rule, the one preceding the period, during which the assessment is delivered);

• all participants of energy markets and/or public authorities; therefore, assessments of certain indicators in the «Natural monopolies», «Consumption», «Reporting» and «Public authorities» categories were delivered on the basis of a representative sample;

• not yet established energy markets under formation (i.e., steam coal and heating).

SAMPLES

«Natural monopolies» category:

• transmission system operators (TSOs): legal entities responsible for the operation, dispatching, maintenance, and development of networks as well as for ensuring their longterm capacity to meet reasonable demand for transmission of electricity and gas;

• distribution system operators (DSOs): legal entities operating in the largest cities and responsible for the safe, reliable, and efficient operation, maintenance and development of distribution systems in electricity and gas.

«Consumption» category:

• for natural gas: suppliers operating in the largest cities (including incumbents or regulated suppliers under public service obligations (PSO) and/or other mechanisms);

• for electricity: suppliers operating in the largest cities (including incumbents or regulated suppliers under PSO and/or other mechanisms).

«Reporting» category:

• «Financial and management reporting» and «Fiscal reporting» (partly) subcategories: energy companies ranked among top taxpayers in 2020, including entities of public interest as defined by the Directive 2013/34/EU;

• «Reports on payments to the government» indicator: state-owned and private extractive companies with the largest production of natural gas, oil and gas condensate, and steam coal in 2020;

• «Information about final beneficiaries» indicator: largest joint-stock energy companies selected from the primary sample of companies applied in the «Financial and management reporting» subcategory, with securities eligible for trading on stock exchanges.

«Public authorities» category:

• «Public spending» (partly), «Transparency of public administration» subcategories: public authority in charge of energy policy (ministry), national regulatory authority, competition (antitrust) authority.

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