



Declaration of responsible persons

The information provided in the Sustainability Report of Transelectrica for the year 2023, prepared in accordance with the Global Reporting Initiative standard, in compliance with the provisions of the European Directive 2014/95/EU transposed into Romanian Legislation by Order of the Ministry of Public Finance number 1938 of 17 August 2016, and in compliance with the Taxonomy Regulation (EU) 2020/852, provides an accurate and true picture of the non-financial aspects, part of the activity carried out, with an impact on the development and sustainability of the Company.

Directorate Chairman Stefanita MUNTEANU

Member Florin Cristian TĂTARU Member Bogdan TONCESCU

Member Cătălin Constantin NADOLU

Contents

Foreword	Directorate Message	4
Chapter 1	Company Presentation Company identification in the European and national context Licences and certifications Mission, vision, values Investment strategy and development plan	6 6 9 11
	Main activities Group structure (subsidiaries) Risk management	12 13 13
	Relevant indicators Transparency, stakeholder relations and material issues Business ethics	19 22 25
	Corporate governance National and international affiliations Awards and distinctions obtained by the company	26 28 30
Chapter 2	Our people - Human resources development and diversity	31
	Human Resources Strategy Promoting parity, eliminating gender discrimination and promoting women in leadership positions	31 33
	Employee structure Job performance review and remuneration policy Training programmes	33 34 35
	Internships Information, consultation of employees and relations with trade unions	36 38
Chapter 3	Responsibility to employees	39
	Training programme and processes to ensure occupational safety and health Prevention actions	39 40
	Organisation of joint (management-employee) OHS committees activities relevant for 2023	41
Chapter 4	Environmental responsibility	43
	Environmental management system Environmental risks, opportunities and costs Management of environmental factors	43 44 46
	Actions and measures taken to prevent and/or limit environmental impacts	50
	Classification of waste by type and disposal method Exceedances of limits allowed by environmental regulations and remedial means	51 53
Chapter 5	Future measures to mitigate the local problems	54
Chapter 6	Corporate social responsibility	56
	Corporate social responsibility policy	56
	Community needs analysis	56
	Involvement in society Projects which Transelectrica was involved into	56 57

Chapter 7	Energy efficiency	59
	Current energy efficiency activities	60
	Use of electricity from renewable sources	61
	New technologies	62
	European projects which Transelectrica is a partner to	63
Chapter 8	Research and innovation	66
	Present and future challenges for transmission system operators (TSOs)	67
	Objectives of the Research and Innovation Strategy	68
	Asset management challenges at Transmission System Operators (TSOs)	82
	Benefits of applying Smart Grid concepts and standards	85
Chapter 9	EU taxonomy related to Transelectrica's activity under the Taxonomy Regulation (EU) 2022/852	86
	Establishing the regulatory framework for sustainability	87
	EU taxonomy related to Transelectrica's activity	90
Chapter 10	About the report	100
•	GRI Index	101
	Glossary	104

Directorate message (102-14)

Transelectrica in 2023: sustainability, investment and stability in the energy sector

Dear shareholders, investors and partners,

Transelectrica publishes for the seventh consecutive year its sustainability report in accordance with Global Reporting Initiative (GRI) standards. The report highlights the company's commitment to accelerating sustainable and sustainable processes in the energy sector, and to gradually achieving the European climate neutrality targets for 2030 and 2050. This decisive action reflects the paramount importance of Transelectrica's activity, as the sole transmission and system operator in Romania, and the high degree of responsibility in ensuring the sustainable progress of society in the context of the transition to a climate neutral economy for future generations.

In the course of 2023, in an impressive dynamic, both policy makers and all players in the energy sector have engaged in managing the new challenges posed by the persistence of the energy crisis, given the conjuncture of the protracted Russian-Ukrainian conflict. In this context. Transelectrica has adopted two main strategic lines of action, focusing on maintaining the safety of the National Electricity System and on continuing largescale investments for the development and modernisation of the national electricity transmission infrastructure, so that the targets assumed by Romania at European level can be achieved within the set percentages and timeframes.

For energy stability and security, Transelectrica, as a member of ENTSO-E and a strategic partner at national and regional level, has intensified its cooperation initiatives with the other representatives of the European structure, in a sustained effort to strengthen energy security. The Company has also maintained close and good cooperation relations with nearby Transmission and System Operators, playing an essential role in maintaining the balance of the energy system.

In a context that calls for urgent changes in the energy field, the investment strategy that Transelectrica focused on in 2023 aimed at the implementation of new projects and the accelerated continuation of those already underway to modernize the Electricity Transmission Grid, in line with current European standards.

Transelectrica's investments are part of the RET Development Plan for the period 2022 updated every two years. The company works according to a permanent updated investment programme in line with energy objectives and policies ("Fit for 55" package and "Green Deal" programme), with clear criteria by which the sustainable grid structure can be achieved. The Company's investment objectives focus on the implementation innovative of new technologies in the field of clean energy, increasing integration capacity the renewable energy, digitalization implementation the SMART **GRID** of concept. Transelectrica has opted for an approach involving an extended source of financing through the use of European grant funding mechanisms for some of the largest energy infrastructure projects for Romania. Thus, part of the total value of the Company's investments for the coming years comes from funding contracts from the Modernisation Fund, amounting to EUR 424 million. Also, in continuation of this process of attracting European funds, thanks to the efforts of our Company's specialists, at the end of 2023, Transelectrica obtained a nonreimbursable financing of more than 56 million euros through the European REPowerEU component in order to finance three essential investment projects for the efficiency and modernisation of the Power Transmission Grid.

In terms of our non-financial performance, Transelectrica maintained its position among stable companies in the assessment by Moody's Investors Service International Rating Agency and the Company's Corporate Family Rating for 2023 remained constant at Baa3. For us, ensuring stability in the operation of the Company is a priority

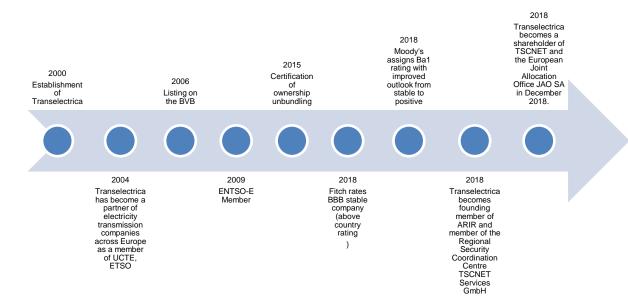
that we constantly consider, managed through appropriate corporate governance practices. These practices include fundamental principles such as transparency and fairness, contributing to a healthy business environment.

Transelectrica maintains its commitment to the sustainable development of the energy sector and focuses its investment efforts on making a significant contribution to the development of a sustainable and efficient electricity transmission infrastructure.

Directorate Chairman Stefanita MUNTEANU

Member Florin Cristian TĂTARU Member Bogdan TONCESCU Member Cătălin Constantin NADOLU

Company Presentation



Identifying the Company in the European and national context (102-1)

In the value chain of electricity activities, Transelectrica occupies the central place of transmission and system operator, a regulated natural monopoly activity, with the mission to ensure the public electricity transmission service while maintaining the operational reliability of the national energy system, under non-discriminatory conditions of access for all users.

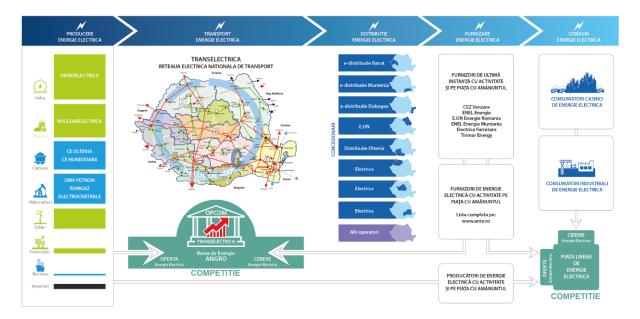
Transelectrica is a strategic company in a national and regional context, and also acts as balancing market operator, metering operator and capacity allocation operator on interconnection lines.

The business model corresponds to the standard profile of a Transmission System Operator (TSO), a model designed at European level through the European energy strategy and legislation, applied in all EU countries and transposed as such in the national legal framework. A strategic energy company, Transelectrica has moved from a national to a pan-European approach to its business

At European level, the energy sector is undergoing a profound transformation.

Emphasis is placed on the transition from a predominantly national model of evolution and development of the energy sector to a model of integrated and coordinated development at European level, which ensures unitary development at continental level, but allows adaptation to national specificities and the pursuit of the legitimate interests of European states.

In this process of transition from the national to the continental model, the regional level of integration is an intermediate step towards the final goal of trans-European integration.



As an integral part of the European interconnected system, Transelectrica is responsible not only for the operation of the Romanian electricity system within safety and quality parameters and for supplying national consumers, but together with the other Transmission System Operators it has extended its area of competence and responsibility to the whole of Europe (36 countries with 532 million consumers).

Transelectrica, member of the European family of Transmission and System Operators

The Romanian electricity system was integrated into the European electricity transmission system long before Romania joined the European Union.

Since October 2004, Transelectrica has become a partner of electricity transmission companies throughout Europe, as a member of UCTE, ETSO and since 2009 ENTSO-E.

ENTSO-E shall promote important aspects of energy policy with a view to fostering the completion and functioning of the internal market in electricity and cross-border trade, as well as ensuring the

optimal management, coordinated operation and sound technical evolution of the European electricity transmission network.

Transelectrica is part of the European configurations:

- CCR (Capacity Calculation Regions) - EEA region (RO-BG border) and CORE region (RO-HU border);
- SOR (System Operation Regions)
 Central European region (RO-HU border).

Transelectrica, member of TSCNET and JAO since 2018

Since August 2018, Transelectrica has become a member of the Regional Security Coordination Centre TSCNET Services GmbH, becoming a shareholder of the centre and of the European Joint Allocation Office JAO SA in December 2018.

TSCNET was built to serve Transmission and System Operators in the East Central-West European region for the coordinated implementation of the European network codes, while JAO coordinates the tendering of long-term

capacity allocation and is designated as the Single Allocation Platform (SAP) Operator.

> Transelectrica, partner of the European institutions in the implementation of the Green Deal and Fit For 55 legislative packages

European energy and environment policies, implemented through successive legislative packages approved European level, focus on increasing security of energy supply, increasing energy efficiency, decarbonising energy mix by integrating renewable sources and implementing efficient storage solutions.

Part of the European family, through its membership of ENTSO-E, Transelectrica is a valuable partner in the development and negotiation of legislative packages applicable to the energy sector.

The European network codes are documents governing aspects of the operation of synchronously interconnected electricity systems and the harmonisation and integration of national electricity markets, facilitating the implementation of the single European energy market.

Through its technical and operational expertise, as a Transmission and System Operator, Transelectrica has been an active partner both in the process of drafting the codes within the ENTSO-E structures and in the negotiation stages, at the European Commission level and, through the relevant ministry, at the European Parliament level.

The entry into force of the European Energy - Climate Change legislative package has led to the standards in the ENTSO-E coordinated operation manual being taken over, developed and approved as European regulations. Thus, 8 (eight)

European regulations have been approved, setting out the sets of rules for the connection of generators, consumers and DC systems to the system, for the allocation of cross-border interconnection capacities in the short and long term, the rules for the operation of the balancing market, as well as the rules coordinated operation, both in normal operation and in situations of disturbed operation.

Transelectrica, strategic partner in the elaboration of the European electricity transmission network development plan

Electricity transmission networks play a crucial role in achieving European goals, in particular in terms of security of supply for consumers, the formation of the internal energy market and the integration of renewable sources.

The ENTSO-E carries out integrated and coordinated planning of pan-European transmission infrastructure development (TYNDP: 10-year European transmission network master plan includina assessment of the adequacy of the pan-European electricity system), identifies the main corridors and priority projects (list of CIP projects) for which Regulation (EU) No 347/2013 provides incentive mechanisms accelerate their implementation (competent authority responsible for facilitating and coordinating the authorisation procedure for projects of common interest, Community financial assistance - e.g. Connecting Europe Facility).

> Transelectrica, a valuable partner in European projects

In parallel with the negotiations on the adoption of the energy regulatory framework, a number of projects are being carried out at the level of Transmission System Operators (TSOs), aiming at the implementation of the single European energy market, the application of the European network codes or the investigation of specific aspects of the challenges of the new Clean Energy Package. It complements the previous legislative package in areas such as the single/internal electricity market, system renewable integration of energies, aggregation of electricity generation capacities, consumer units and electricity storage units, increasing cross-border capacities, transforming Regional Security Centres (RSCs) into Regional Coordination Centres (RCCs).

The integration of the Romanian electricity market into the European internal market is a major objective of Romania, circumscribed to the strategic objective of creating the European Internal Energy Market (IEM), a priority objective for Europe, which requires coherent

measures and joint efforts from all entities involved: relevant Ministries, Regulatory Authorities, Transmission and System Operators, Energy Exchanges.

Operating since 2014 in the 4M MC coupled market (Romania, Hungary, Slovakia and the Czech Republic), Transelectrica has become a partner in projects in the East Central West European region (CORE region), while also being active in the South East European region (EEA region), widening its area of involvement and competence throughout Europe.

In parallel with market coupling and coordinated cross-border transmission capacity allocation projects, Transelectrica is involved in projects to develop and operationalise trans-European balancing energy trading platforms.

These platforms will contribute to optimising the balancing of electricity systems at European level, generating economic and social welfare and contributing to increasing the security of electricity supply for European consumers.

Licences and certifications

Concession and License

Transelectrica holds under concession the assets that belong to the public domain of the state, namely the national electricity transmission network (RET), being a public utility company.

The concession for RET and the land on which it is located was granted for a period of 49 years by concession contract no. 1/29.06.2004, concluded between the Ministry of Economy and Trade as granting authority and Transelectrica as concessionaire.

The company operates as a transmission and system operator in

Romania on the basis of License no. 161/2000 for the provision of electricity transmission service, for the provision of system service and for the management of the balancing market, granted following the Decision of the President of the National Energy Regulatory Authority no. 865 of 22.12.2000, with subsequent amendments and additions.

The Licensee is the sole provider of the public electricity transmission service for all users of the electricity transmission network and of the system service for all users of the NES. The License was granted for a period of 25 years and is valid until 22.12.2025. In order to remain valid, the licensee must ensure compliance with the Specific Conditions and the General Conditions associated with the licence.

The specific conditions are set out in the latest update of ANRE Decision No 865/22.12.2000, respectively **ANRE Decision No 687/04.05.2022**. Its content is also available online on Transelectrica's website

(https://www.transelectrica.ro/web/tel/licent e-si-autorizatii).

Certification

In accordance with the provisions of Article 31 of the Energy and Natural Gas Law no. 123/2012 as amended, the certification of the transmission and system operator (TSO) of the National Electricity System is done by ANRE, according to a certification procedure that ends with the issuance by the Authority of a final decision certifying the TSO.

According to European Commission Opinion 7053 final of 12.10.2015 pursuant to Article 3(1) of Regulation (EC) No . 714/2009 (now repealed by Regulation (EU) 2019/943) and Article 10 of Directive 2009/72/EC (now repealed by Directive (EU) 2019/944), ANRE has ascertained that Transelectrica has fulfilled the legal

The general conditions associated with the license are approved by ANRE Order no. 104/22.10.2014, in accordance with the provisions of art. 8 para. (2) and art. 10 par. (2) lit. c), d) and f) of the Electricity and Natural Gas Law no. 123/2012 as amended. It is an integral of the licence and contains information on the rights and obligations of the licence holder, control and sanctions, suspension or withdrawal of the licence, amendment of the licence, communication channels, tariffs and contributions.

requirements for certification as а transmission and system operator of the National Electricity System, according to the ownership unbundling-OU model, and Regulatory Committee ANRE's approved the certification of the National Power **Transmission** Company "Transelectrica" S.A., ANRE Order no. 164/07.12.2015 was issued in this regard.

The transmission system operator must meet certain certification conditions. These are laid down in Article 34 of Law No 123/2012 and according to ANRE Order No 104/2014 approving the general conditions associated with the licence, Chapter III, Section 11, Articles 46-49.

Mission, vision, values (102-16)



Mission

As a transmission and system operator with a key role in the Romanian electricity market, Transelectrica's main mission is to provide, under non-discriminatory conditions, the public electricity transmission service to all RET users and to develop a secure, reliable, sustainable and accessible transmission network for a successful energy transition.



Vision

Transelectrica aims to contribute effectively to the sustainable development of the national energy sector by capitalizing on innovation, new technologies and skills available to the company, operating interconnected to ENTSO-E and ensuring the transit of electricity on the regional market..



<u>Values</u>

A company with a healthy and strong organizational culture is represented by its employees who own and share the organization's core values, which fosters loyalty to the company and increases engagement. This reduces the tendency of employees to leave the organisation.

The values underpinning all our work are: professionalism, performance, integrity, transparency, cooperation

Investment strategy and development plan

plans Transelectrica the development the of Electricity Transmission Network (RET), taking into account the current state and the forecast evolution of consumption, generation and exchanges of electricity and draws up every 2 years a Development Plan for the next 10 years, submitted to ANRE and the network owner for approval. We are currently following the RET Development Plan for the period 2022-2031 which includes all updated information for this period.

The RET Development Plan is a public document outlining the main

aspects of the current situation and planned development of the RET for the next ten years, made available to all stakeholders.

The RET development plan takes into account the requirements and priorities set out in the National Energy Strategy and Policy. These are decisive references for the identification of priority directions and for forecasting the development trends of the energy sector, which are taken into account in the planning.

As an integral part of the European energy system, Transelectrica is

developing the RET Development Plan in conjunction with the European Ten-Year Network Development Plan (TYNDP).

The Company's development strategies are aligned and complementary with strategies at European level. Thus,

projects of major importance in the European grid, included in the list of Projects of Common Interest (PCI), are developed in the electricity transmission network operated by Transelectrica.

Main activities (102-2, 102-4, 102-5, 102-6)

Transelectrica is the key transmission and system operator in the electricity market in Romania and in the region, responsible for managing and operating the electricity transmission system in Romania and for ensuring electricity exchanges between Romania and the countries with which it is interconnected within Central and Eastern Europe as a member of ENTSO-E.

Under the terms of the Licence, Transelectrica mainly carries out the following regulated activities:

- the provision of electricity transmission service, as well as the measurement of electricity on the wholesale electricity market as a metering operator;
- providing system service through dispatching management steps using specific systems and facilities;
- organising and administering the balancing market as administrator of this market.



Since 2006, Transelectrica has been listed on the Bucharest Stock Exchange.

With the listing on the Bucharest Stock Exchange, Transelectrica laid the foundations for a lasting relationship with the company's shareholders. The shares issued by Transelectrica are traded on the regulated market, administered by the Bucharest Stock Exchange, in the Premium category, under the symbol TEL.

• Shareholding structure of the Company as of 31-12-2023*

SHAREHOLDER	SHARES	WEIGHT (%)
The Romanian State	43.020.309	58,689
Pavel Holding	4.753.567	6,484
NN/NN Pensii S.A.F.P.A.P S.A. Private Administered Pension Fund	4.007.688	5,467
Other legal entity shareholders	16.231.432	22,142
Other individual shareholders	5.290.155	7,216
TOTAL	73.303.142	100

^{*}Shareholder register and ownership history can be found at the Central Depository SA

In the context of implementing corporate governance rules and best practices, Transelectrica is engaged in active communication with shareholders and investors, using several communication channels and dedicated interfaces. The company is aware of its responsibility as a publicly traded company.

Group structure (subsidiaries) (102-45)

Αt the date of this report. Transelectrica five has subsidiaries. Romanian legal entities, organised as joint-stock companies, of which three are sole shareholders: FORMENERG SA **TELETRANS** SA (Formenerg), (Teletrans), SMART SA (SMART) and ICEMENERG-SERVICE SA (the latter being bankrupt).

In the case of OPCOM SA (OPCOM), following the increase of the share capital on 13.02.2018 by the OPCOM GMS with the value of a land for which a certificate of ownership was previously obtained, the Company is the majority shareholder with 97.84% of the share capital of the subsidiary.

Risk management (102-11, 102-30)

The strategic requirements for safety and business continuity lead the Company to approach risk management in a proactive way, to identify and treat potential losses before the generating events occur, with advance preparation of specific technical, operational and financial solutions to counteract these potential losses. Thus, the risk management system is a fundamental prerequisite for sound internal management control.

Within the Company, the Integrated Risk Management System is implemented, imposed by the strategic requirements for safety and continuity in the operation of the NES and representing a fundamental

The diversity of the shareholder base and the presence in the main indices published by the BVB emphasize the requirements in terms of transparency, relevance of information and speed in its dissemination, as well as maintaining a continuous dialogue with the investing public.



condition for sound internal managerial The Company proactively control. approaches risk management, with the Directorate ensuring, in a reasonable manner, that objectives will be achieved by managing potential threats. In doing so, it seeks to identify and address potential losses before events that could have a negative impact occur. with prior preparation of specific technical. operational and financial solutions to mitigate or counteract these potential losses.

The Company's risk management complies with applicable legal and regulatory requirements to have risk

control capabilities appropriate to the Company's risk profile to identify, assess, manage, monitor, communicate, consult and report risks:

- in compliance with the legal requirements in force for the development of managerial control systems SGG Order no. 600/2018 on the approval of the Code of internal managerial control of public entities;
- in fulfilling the requirements for listing on the Bucharest Stock Exchange including the provisions of the Corporate Governance Code of the Bucharest Stock Exchange;
- the requirements of the Regulator and other requirements deriving from being a listed company or imposed by rating agencies or auditors.

The set of risk management solutions used by Transelectrica aims to support the organisation in achieving its objectives and contribute to improved planning through risk mitigation measures,

comprising organisational and financial solutions in an optimised structure.

Thus, from an organisational point of view, risks are kept under control at an acceptable level and with reasonable costs, mitigated or even transferred, by:

- organisation, design, planning, structuring of activities, communication, including measures for business continuity after a risk has materialised. Procedures have also been drawn up containing principles to be followed by all employees and occupational safety and security measures have been strengthened to reduce risks;
- insurance contracts. aimed at transferring risks; bank letters of financial guarantee, quarantees required Transelectrica's from counterparties; financial solutions including equity offerings, bond issues and other instruments offered on the capital, insurance and other financial markets.

Transelectrica's risk management policy and objectives

Transelectrica's policy is to ensure, through directly and its territorial transmission units (currently territorial transmission branches), subsidiaries or through service contracts with specialized suppliers, the continuous operation and operational management of the National Electricity System (NES), according to the quality, safety and efficiency standards set out in the Technical Code of the RET. giving priority and special attention to the safety and health criteria of employees, as well as the protection and conservation of property and the environment.

The continuity of the strategic functions for Romania's NES - as system operator and electricity transmission operator - must be maintained, even in the most unfavourable circumstances.

Risk management facilitates the efficient and effective achievement of Transelectrica's objectives. Knowledge of threats - strategic, operational. financial and hazard risks - to which the Company is exposed, allows prioritisation of their treatment, depending on the likelihood of their materialisation, the extent of the impact on the objectives and the costs of the measures aimed at reducing the chances of their occurrence or limiting undesirable effects.

The Directorate aims to maintain the continuity of the strategic functions of system operator and electricity transmission operator within Romania's NES, even in the most adverse circumstances.

Both directly and through implementation at the level of the territorial

transmission branches and subsidiaries, as well as through the transposition of applicable requirements into service contracts with specialised suppliers, the Company's policy aims to operate in accordance with the quality, safety and efficiency standards laid down in the RET Technical Code and any other specific

applicable regulations, with a focus on compliance with employee health and safety criteria, as well as ensuring the protection and conservation of property and the environment.

The Company's management has set the following strategic objectives for risk management:

understanding the risks the Company is exposed to, their causes, costs and impact on general and specific objectives

maintaining a safe working environment for employees

OBJECTIVES

operating equipment and installations under safe conditions safe conditions without any danger to third parties and no environmental effects

implementing optimal risk control measures

Specific objectives set include:

- Improving the Company's risk profile by managing the overall process of identifying, analysing, estimating, treating, communicating, monitoring and reviewing risk to keep risk exposure at an acceptable level;
- eliminating or minimizing conditions and practices that may lead to failure to achieve the overall objectives, disruption or limitation of the Company's activities;
- reducing the total cost of risk in Transelectrica to help secure the financial resources needed for operating expenses, debt payments and investments.

The Company's activities are sensitive to general economic conditions, which can affect the amount of electricity transmitted and therefore revenues and operating results. In addition, the demand for electricity and its price depend on a variety of factors over which Transelectrica has no control, namely:

- global and regional economic and political developments;
- consumer demand from industry:
- climatic conditions;
- ANRE regulated tariffs for transmission and system services;
- existing laws and regulations.

As the core business of the Company, through the territorial transmission branches and DEN, is to ensure the continuous operation and operational management of the National Electricity System (NES), according to the quality, safety and efficiency standards set by the Technical Code of the RET and the European and national regulations in force, special priority and attention has been given to the safety and health criteria of the employees, as well as to the continuity of the strategic functions for the NES, as system operator and electricity transmitter.

Improving risk management in transmission networks requires the implementation of predictive maintenance

policies based on more accurate estimates of asset lifetime.

Both aross inland enerav consumption and losses in RET are significantly influenced by weather conditions (in particular temperature. cloudiness. amount and type of precipitation, wind).

From a technical point of view, given the uncertainties of the evolution of the system and the economic/climatic framework, robust and flexible solutions are being sought to cope with several possible scenarios, thus mitigating risks.

Risk management organisational framework (102-33)

In accordance with the legislation in force: SGG Order no. 600/2018 on the of approval of the Code Internal Managerial Control of Public Entities, within Transelectrica, the Company Risk Management Team (EMRC), the Monitoring Commission for the implementation of the Internal/Managerial Control System and the Technical Secretariat of the Monitoring Commission for implementation the Internal/Managerial Control System (CM SCIM) with duties and responsibilities have been established.

At Transelectrica level, risks that could have a substantial impact on the achievement and fulfilment of the Company's objectives are managed in accordance with internal procedures, so that each organisational entity has the obligation to systematically analyse, at least once a year, the risks related to the performance of its activities (including significant risks at Company level, to the extent that they exist), to draw up appropriate plans to limit the possible consequences of the risks, with the appointment of persons responsible for the implementation of those plans and the drawing up of risk tracking sheets and their monitoring, whenever deemed necessary.

The Risk Management procedure aims to implement a risk management process that facilitates the achievement of the Company's objectives economically, efficiently and effectively. At the same time, continuous improvement is ensured

in the way the risk management process is carried out, namely identification, assessment, establishment of the management strategy, monitoring of the implementation of control measures and regular reporting, as follows:

- a) risk identification;
- b) risk assessment;
- (c) establishing the risk management strategy (risk response);
- d) monitoring the implementation of control measures and reviewing them according to the effectiveness of their results;
- (e) regular reporting of the risk situation shall be carried out whenever necessary or at least once a year, i.e. if risks persist, depending on the emergence of new risks, the effectiveness of control measures adopted, the reassessment of existing risks, etc.

The procedure provides Transelectrica personnel with a working tool that facilitates the management of risks in a methodical and efficient way to achieve the Company's objectives. On the basis of the procedure, the documentation on the management of risks that may affect Transelectrica's activity is drawn up annually, including a description of how measures are established, implemented and monitored in order to limit the possible threats and consequences arising in the event of risks materialising.

The internal risk management workflow provides an important tool that

facilitates the management of risks in a methodical and efficient way to achieve the Company's objectives. To this end, documentation on risk management that may affect Transelectrica's activity is drawn up annually, which also contains a description of how control measures are established, implemented and monitored in order to limit the possible threats and consequences arising in the event of risks materialising.

The management of each organisational entity appoints a risk officer, who ensures the annual preparation of the Risk Register, the Action Plan, the Annual Report, the completion of risk tracking sheets whenever deemed necessary and the preparation of risk alert forms when a new risk occurs.

The Internal/Management Control Monitoring Committee coordinates the process of updating the general and specific objectives, the procedural activities, the risk management process, the performance monitoring system, the status of procedures and the monitoring and reporting system and informs the Company's Directorate.

At Transelectrica level, the centralizing situation regarding the state of implementation and development of the internal management control system is periodically analysed, and the following

are drawn up: the self-assessment questionnaire the of on state implementation of the internal management control standards. the summary of the results of the selfassessment and the report on the management control system.

The mission of the internal management control activity is to ensure administrative control within Transelectrica, in order to perform the Company's duties at an appropriate level of quality, established in accordance with its own mission, in conditions of regularity, economy effectiveness. legality, efficiency.

Risks related to objectives and/or activities are identified and assessed at the level of each organisational entity in the Company, in accordance with the elements of the *Risk Register*.

Annually, the Monitoring Committee analyses and prioritises significant risks, which may affect the achievement of the Company's objectives, by establishing the risk profile and risk tolerance limit.

The Chairman of the Company Risk Management Team prepares an annual Control Measures Implementation Plan for significant risks at Company level, which is reviewed by the Monitoring Committee and approved by the Directorate of the Company.

Keeping risks under control

The actions established to control the risks for the year 2023 have been document included in the Control Measures *Implementation* Plan for Significant Risks. prepared at organisational entity level. On the basis of this document, at the Company level, the Implementation Plan of Control Measures No. 3686/30.01.2023 was drawn up, the status of its fulfilment being monitored within the framework of the guidance and control actions of the Risk Management and Control Group.

The actions established to control the risks for the year 2023 mainly reduced the probability of materialisation and the impact of the risk compared to the level of inherent risks.

Materialised risks were dealt with in accordance with the strategy adopted, dictated by the circumstances that led to the risk.

Establishing a risk management

strategy involves:



*each organisational entity (unit, directorate, department, territorial transmission branch) has carried out, by identifying the most appropriate risk treatment actions and in accordance with its risk management responsibilities, such as to record the lowest possible risk exposure values in the given internal and external context.

The strategies mainly consisted of:

- treating the risk to eliminate/reduce it to an acceptable level through measures and
- monitoring significant risks.

Among the internal control tools used, we mention:

- measures in the framework of procurement/maintenance/investme nt/personnel training programmes;
- development or revision of procedures;
- modification of the procedural and structural organisation;
- performance indicator attached to the target;
- redeployment of personnel;
- setting up or updating databases;
- dedicated measures on identifying, monitoring, treating or outsourcing risks:
- insurance contracts that are carried out at Company level;
- contractual provisions (relating to the performance guarantee - GBE, penalties).

The following are recommended as lines of progress to streamline the risk management process:

- 1. the rationale for activities or projects proposed for inclusion in the annual investment, procurement maintenance programmes should also include risk management issues - what risks to the Company are mitigated and estimates of the effects - on changing the impact and likelihood of occurrence of those risks; these issues will also be included in the reporting on the implementation of the annual programmes;
- 2. identification of significant risks that cannot be managed through investment, procurement and maintenance activities, for which action plans must be drawn up to monitor, treat or outsource them (together with related financial proposals specifically dedicated to these activities);
- 3. reports (summaries) on how the annual investment, procurement and maintenance programmes are being carried out are submitted to the Company Risk Management Team Chair for their

knowledge and to follow up how risks are being kept under control;

- 4. identification of interdependencies which other organisational entities may induce risks in the activity of an organisational entity; which other organisational entities may be affected if risks materialise in the activity of an organisational entity;
- 5. to correlate the operational procedure and other internal regulations and to use a uniform terminology in order to bring the current way of working into line with the legislation in force.

In the event of risks materialising, control measures and checks for similar situations have been intensified in order to prevent risks from materialising or new risks from arising.

Control measures at the level of organisational entities are fully implemented or under implementation.

In 2023, risk management activity was properly carried out throughout the Company in full and timely compliance with legal requirements and internal regulations.

Relevant indicators

Rating

In 2023, Moody's confirmed its Baa3 rating with a stable outlook, which it awarded in 2021, showing very strong, stable and predictable financial values, a growth trend path characterised by consistent implementation of regulatory standards. The maintenance of the rating is justified by:

 low business risk profile given Transelectrica's strategic importance and natural, fully regulated monopoly as owner and

- operator of the electricity transmission network;
- strong financial profile with low debt levels;
- continuous improvement of the regulatory framework;
- government support in case of financial difficulties.

It is expected that this trend will continue in the coming years given the stability that the Company is showing.

Relevant financial indicators (203-1, 302-1)

427.23 million lei	4.720 million lei
Own investment expenditure in 2023	Total revenue at 31.12.2023
93.6% of estimated own expenditure	
112.47 million lei	654.82 million lei
Value RET 2023 Maintenance Programme	Total contracted value
99%	191,044,047 lei
Degree of achievement of minor and major	Amounts paid in 2023 to the State
maintenance planned for 2023	Budget
·	

Type of Transelectrica partner contractors for 2023

CONTRACTS SIGNED IN 2023	281	Percentage, relative to the number of TOTAL
CONTRACTS SIGNED WITH CONTRACTORS IN ROMANIA:	277	98.57%
CONTRACTS SIGNED WITH EU CONTRACTORS:	4	1.43%
CONTRACTS SIGNED WITH NON EU CONTRACTORS:	0	0

Investments in 2023 (203-1)

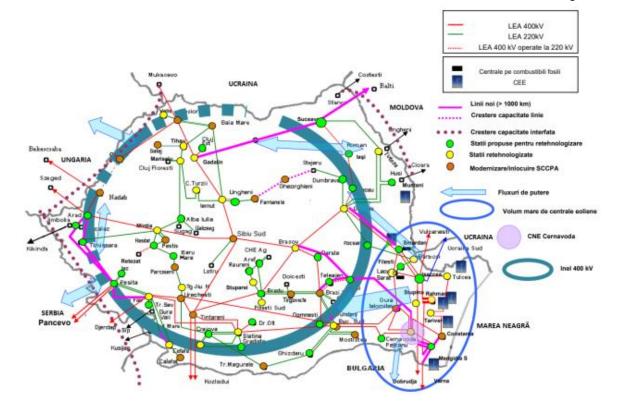
Main works contracts - works signed in 2023

Crt.	Objective
1	Increasing safety in the operation of the Arges - Vâlcea grid area, building the 400 KV Arefu station and installing a 400 MVA, 400/220 KV AT
2	220 kV double circuit Ostrovu Mare - RET OHL - Phase I
3	Installation of two modern means of reactive power compensation in 400/220/110/20 kV Sibiu South and 400/220/110/20 kV Bradu stations
4	Upgrade to 400 kV of the 220kV Brazi Vest - Teleajen - Stâlpu OHL including 400MVA 400/220/20kV AT acquisition and related 400kV and 220kV station extension works in the 400/220/110kV Brazi Vest station (Brazi Vest station extension (including AT4) and 400 kV Brazi Vest - Teleajen - Stâlpu OHL);
5	Optimization of the operation of the existing 400 kV OHLs in the NES, used in interconnection and for power evacuation from the Cernavodă nuclear power plant and renewable energy plants in Dobrogea, by installing on-line monitoring systems (SMART GRID type).
6	Increasing the transmission capacity of the 400 kV South Bucharest - Pelicanu OHL section (8 km);
7	Increasing the degree of safety in supplying consumers in the southern area of Bucharest connected to the 400/220/110/10 kV Bucharest South station

The benefits of carrying out this major investment programme

- sustainable development of its own infrastructure;
 strengthening the RET and
- strengthening the RET and increasing the operational safety of the RET;
- increase the capacity to respond to events with a particular impact on
- the security and functioning of the RET;
- facilitating the transmission of electricity from surplus production areas to consumption areas;
- the achievement of an economic regime for the operation of RET;

- increasing interconnection capacity both with neighbouring countries included in ENTSO-E and those outside the EU - Moldova, Serbia
- reducing RET's own technological consumption, increasing energy efficiency;
- > introduction of new technologies,



and closing the national 400 kV ring;

- reducing operating and maintenance costs;
- increasing electricity quality, improving performance indicators;
- implementation of SMART GRID concepts;
- digitalisation of the transmission, system and operational infrastructure of the electricity markets under management.

Transparency, stakeholder relations and material issues - dialogue between the Company and society

We strongly believe that an important part of Transelectrica's progress is to strengthen the links between the Company and society through continuous dialogue and engagement. Transelectrica maintains a strong commitment to society, facilitating access to relevant information.

Communication and transparency are key to building trust with partners

Transelectrica fulfils its obligations towards investors, shareholders and other stakeholders by conducting a transparent and constant dialogue.

The instruments through which the Company fulfils these obligations:

- information posted on the Company's website;
- current/periodic reports submitted to the BVB;
- regular meetings with investors and financial analysts.

Identification and selection of stakeholders (102-40, 102-42)

The sustainability approach management must take into account a of stakeholders who expectations of the organisation, who have an impact on the achievement of the organisation's objectives or who may be affected by the organisation's activities. Essentially, the main role of Transelectrica's stakeholders is to underpin support for the organisation, to ensure the long-term viability of the organisation and the Company's strategies and plans, provided that their interests and expectations are met at least at a minimum level, so that the support and collaboration mechanism is functional and the Company benefits from it.

Ignoring interest groups and information, and ignoring the power and interests they hold and manifest can have negative effects on the Company's business. Thus, the ability to pay well balanced attention to interest groups, their

information and power is an important pillar of strategic thinking and action at the management level of the Company, which contributes to the performance of the strategic business.

Transelectrica's strategic management processes that are based on a comprehensive set of appropriate stakeholder analyses are more likely to be successful, i.e. to achieve the Company's objectives and mission, to generate added value.

Using specific qualitative and quantitative analysis tools, the 16 most important stakeholders have been identified according to the information needs they may have in relation to those provided by Transelectrica.

At the same time, the most relevant topics of interest to stakeholders were identified, with the help of which the central themes of the report were formulated.

Grupuri interesate	Nivel de influență	Așteptări	
Acţionari	Mare	Obținerea profitului	
Angajaţi	Mare	Aceștia așteaptă condiții bune de muncă, recompense, programe motivaționale	
Parteneri / alte OTS-uri din Europa	Mare	Respectarea angajamentelor comune și dezvoltarea rețelei naționale pentru a crește nivelul de siguranță al rețelei regionale	
ANRE	Mare	Respectarea angajamentelor și a reglementărilor primare și secundare	
ASF / BVB	Mare	Respectarea reglementărilor pieței de capital	
Furnizori / Contractanți	Mare	Respectarea condițiilor contractuale. Influența este mare, întrucât constructorii în domeniul energetic sunt din ce în ce mai puțini, iar problemele financiare ale acestora sau lipsa de personal calificat sau suficient de bine pregătit afectează derularea investițiilor Transelectrica	
Management	Mare	De ordin financiar, brand awareness	
Guvern	Mare	Contribuție la funcționarea economiei și la siguranța energetică a țării	
Participanți la piața de energie	Mare	Respectarea obligațiilor și responsabilităților OTS	
Producători, Distribuitori de energie electrică	Mare	Dezvoltarea și adaptarea rețelei de transport al energiei electrice, în conformitate cu tendințele de dezvoltare a sectorului, cu adecvanța sistemului și menținerea siguranței în funcționare	
Organizații / instituții internaționale (ENTSO-E; Comisia Europeană; Centre regionale de securitate în care Compania este membru sau acționar)	Medie	Respectarea obligațiilor asumate; contribuția la elaborarea politicilor și strategiilor asumate la nivelul ENTSO-E; respectarea modului de implementare a proiectelor – în cazul Comisiei Europene (proiecte pe fonduri europene)	
Sindicate	Medie	Respectarea drepturilor angajaților și obținerea beneficiilor pentru aceștia	
Bănci, instituții financiare	Medie	Asigurări, administrare conturi și instrumente financiare	
Mass-media	Medie	Furnizare de știri	
ONG-uri	Mică (cu tendințe de creștere în noul context ecologic european)	Colaborare, parteneriate; respectarea principiilor de protecție a mediului în derularea proceselor de exploatare și dezvoltare a infrastructurii de transport; intensificarea politicilor de sustenabilitate	
Populația	Mică	Continuitatea în alimentare cu energie electrică; menținerea tarifelor de transport și sistem la un nivel cât mai scăzut în facturile la energie	

Stakeholder engagement approach (102-21, 102-43)

Since its listing on the BVB. Transelectrica has prioritised the involvement of stakeholders in the Company's activity, especially in terms of transparency of specific actions. From this perspective, Transelectrica has oriented its presentations of quarterly, half-yearly and annual results, respectively, towards getting closer to the needs of stakeholders and towards permanently streamlining the means of communication with them.

Their views were expressed in regular meetings with the Company's management. Subsequent actions have taken all these views into account and the

feedback received from stakeholders on the 2023 report has supported the continuous process of improving our activities.

Transelectrica has set itself the objective of improving communication relations with stakeholders and their continuous involvement in the Company's approaches, up to the level of strategic approaches.

Last but not least, the stakeholders identified in the previous report have been consulted during the previous reporting years to ensure that the information

Defining the content of the report and the list of material topics (102-31, 102-32, 102-44, 102-46, 102-47)

The content of Transelectrica's sustainability report was established following a complex process of qualitative and quantitative analysis, but also with the support of information obtained from stakeholders as feedback. The Global Reporting Initiative's recommendations on the level of detail with which each theme should be addressed, but especially the themes of interest that we have identified at stakeholder level, have been taken into account in designing the report.

Each theme is intended to clarify issues not covered in the other types of reporting and to outline the Company's sustainability outlook.

Each of the above categories is addressed within the report and new

information is added with each new reporting cycle with direct reference to the needs expressed by stakeholders and the topics of importance to them.

At the same time, Transelectrica is paying close attention to the implementation of European legislative changes so that stakeholders do not lose interest in the Company's shares and financing is not made difficult and at disadvantageous conditions.

Transelectrica is constantly adapting to the reporting obligations resulting from the application of European regulations/directives, which creates a higher level of transparency regarding the Company's sustainability impact.

List of material themes

Field	Material theme	GRI indicator/own	Related chapter
Corporate	Driving system	102-18	1
Governance	Assumption of corporate governance principles	102-16	1
	Delegation of powers	102-19	1
	Business ethics	102-16, 205-1, 205- 2, 205-3, 206-1, 418-1	1
Strategy, innovation	Financial indicators	203-1	1
and financial	Technical indicators	Own indicator	1
development	Risk management	Own indicator	1
	Energy efficiency	302-1, 302-4	7
	Objectives of the Research and Innovation Strategy	302-4, 302-5	8
Social and	Training and further training	404-2,	2
employee responsibility	Diversity, promoting parity, eliminating gender discrimination and promoting women in leadership positions	401-1, 401-3, 405- 1, 405-2, 406-1	2
	Occupational Safety and security	Own indicator	3
	Corporate social responsibility policy	Own indicator	5
	Dialogue between company and society	Own indicator	1
	Community needs	413-1	5
	Involvement in society	203-2	5
	Information, consultation of employees and relations with trade unions	403-4	2
Environment	Environmental management system	308-2	4

Environmental risks, opportunities and costs	Own indicator	4
Water, energy and waste management	Own indicator	4
Preventing and limiting environmental impacts	Own indicator	4

Business ethics (102-17)

Compliance management system (102-25, 103-1, 103-2, 103-3, 205-1, 205-3)

During 2023, measures included in the National Anti-Corruption Strategy (NACS) were implemented and the Code of Ethics and Professional Conduct for Transelectrica personnel remains applicable, with a continued focus on implementation and improvement.

The Company has also paid particular attention to the knowledge of the rules applicable to the conduct of business.

In 2023, no business ethics and anticorruption training was conducted.

Code of conduct and ethics (205-2)

The Code of Ethics and Professional Conduct for Transelectrica Personnel is the general document that contains the internal regulatory framework for the Company's employees and provides information on how they will conduct themselves morally and professionally, both during and outside of their

professional activity. At the same time, it is a guarantee that Transelectrica's personnel has all the information necessary to ensure ethical behaviour, and also a proof of the seriousness with which the Company treats its partners.

The Code was updated in 2023 and approved by the Company's Directorate.

Protection of personal data (418-1)

In view of the legal provisions on personal data, in particular the application of Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016 on the protection of individuals with regard to the processing of personal data and on the free movement of such data, known as GDPR, it should

be noted that Transelectrica has again this year taken continuous steps to comply with the provisions in force.

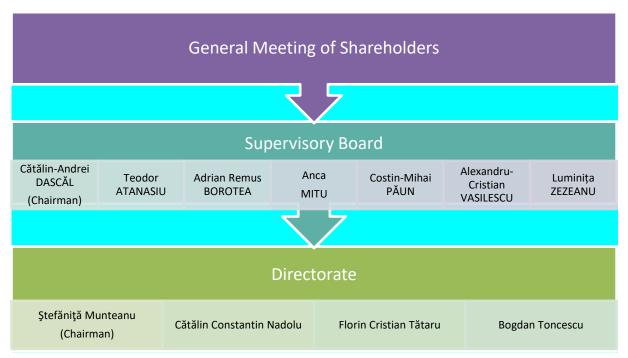
As a result, in 2023, no sanctions were recorded for breaches of personal data protection or for losses of personal data.

Anti-competitive or anti-trust behaviour (206-1)

Taking into account the specific nature of Transelectrica's activity, but also its special nature as a company holding a natural monopoly position in the electricity

transmission market, there were no situations of anti-competitive or anti-trust behaviour in 2023.

Corporate governance (102)



*on 31.12.2023

The primary focus of corporate governance is the creation of a balance between corporate bodies, for greater protection of shareholders, both majority and minority, in order to achieve constant economic growth, efficiency, profitability and confidence in the competitive market economy.

Company 31/1990, Law no. republished, with subsequent amendments and additions. transposed into Romanian law, on the occasion of the 2006 amendment, the principles of corporate governance having as its guidelines the harmonization imposed by the Community acquis in the field of companies, but also the adaptation of domestic legislation to the O.E.C.D. standards on corporate governance.

According to the law, there are three categories of bodies in a public limited company: deliberative and decision-making (general meeting of shareholders), executive and management (administrator, directors, board of directors, directorate or supervisory board) and management control (auditors or financial auditors).

The General Meeting of Shareholders (GMS) is therefore the deliberative and decision-making body of Transelectrica, with powers expressly provided for by the applicable legislation and the Articles of Association. The GMS may be ordinary or extraordinary, and its specific powers are set out both in the applicable legislation and in the Articles of Association. All shareholders have the right to attend the GMS and to cast their vote.

The company is managed under a two-tier system, according to the Company Law no.31/1990, republished, with subsequent amendments and additions, by a Directorate, under the supervision of a Supervisory Board. According to the Company's Articles of Association, the Supervisory Board consists of seven members, appointed following a selection procedure, for a period of four years. The Chairman of the Supervisory Board is elected by its members. The members of the Supervisory Board are appointed by the Ordinary General Meeting of Shareholders in accordance with the provisions applicable to listed companies and are selected in accordance with the provisions of GEO 109/2011 on corporate governance of public companies. However, as at 31.12.2023, the members of the Supervisory Board of the Company held a provisional mandate of 5 months, pursuant to art. 64¹ para. (3) and (4) of GEO no. 109/2011, until 21.03.2024.

According to the OECD principles, implementation of an effective corporate governance regime must lead to transparent and efficient markets, be compatible with the rule of law and clearly define the division of responsibilities between the competent supervisory, regulatory and enforcement authorities. A corporate governance regime should protect and facilitate the exercise of shareholders' rights and ensure fair treatment of all shareholders, including minority and foreign shareholders. previous years, substantial amendments have been made to the Articles of Incorporation in order to increase the effectiveness of corporate governance at Company level by reference to the applicable legal framework, including with regard to clarifying the separation of the Company's management management control so that each body of the Company fulfils its legally prescribed purpose, as well as avoiding potential confusion between the duties of the Supervisory Board and those of a Directorate. At the same time, it was envisaged to regulate in principle at the level of the statutory acts the delegation of certain powers and the specialised coordination of certain areas while maintaining responsibility at the level of the Directorate.

Assumption of governance principles

With the listing of its shares on the regulated market of the BVB, the Company has adopted the principles of the BVB's Corporate Governance Code. In accordance with the BVB's requirements, Transelectrica has made public to investors the revised Corporate Governance Rules of the Company.

Compliance with Corporate Governance principles is reflected in the Statement of Compliance with the BVB Corporate Governance Code that the Company prepares and publishes together with the Annual Report.

The Company's Supervisory Board also has a Nomination and Remuneration

Committee, an Audit Committee and an Energy Security Committee.

Throughout the term of office as a member of the Supervisory Board/ Directorate of the Company, the persons appointed must meet the eligibility criteria and must not find themselves in situations of incompatibility established by Applicable Law or applicable statutory provisions. In connection with this obligation, the Company shall have the right to request reasonably necessary assurances from the members of the Board regarding compliance with these obligations.

Delegation of powers (102 – 19)

In order to make the Company's management system more efficient and to achieve the established objectives in an effective and economical way.

Transelectrica has developed a system of delegation of powers.

Delegation of competence concerns, for example:

- a) approval of certain types of operations;
- b) approval/clearance of documentation prior and/or subsequent to the approval of certain types of operations, documentation required by law or internal regulations;
- c) approval of transactions with a pecuniary effect up to a certain maximum value;
- d) approval/clearance of documentation prior to and/or subsequent to the

approval of operations having a pecuniary effect up to a certain value maximum, documentation required by law or internal regulations.

Such delegations respect the limits of the Board's authority in terms of the content of the transaction and the value of the transaction, expressly establish the limits of the powers and responsibilities that the Board delegates, and comply with the rule regarding representation of the Company by joint signature.

National and international affiliations (102-12, 102-13)

Given Transelectrica's important role in the management of the National Electricity System and the electricity market, activities with a strong national and international dimension, the Company is a member of national and international organisations and bodies and intends to continue to participate in their activities.

The company, through its representatives, is part of the committees and working groups of these organisations, participates in decision-making, in the preparation of studies and scientific expertise.

Transelectrica is also involved in the development of projects with regional and pan-European impact.

As a collective member of national associations/organisations, Transelectrica wishes to maintain close cooperation relations with all the important players in the energy sector and to be present at the events organised by these entities.

The company has representatives in various national organisations and associations in the field who are part of the committees and working groups of these organisations, participate in decision-making, in the preparation of studies and scientific expertise.

Also, through these organizations, associations, national bodies there is the possibility of facilitating direct contacts,

exchange of information, experience and expertise, as well as the affirmation and recognition of the Company's leading position in the field of electricity transmission in Romania.

In 2023, Transelectrica was affiliated to a number of 9 national associations, organisations and bodies as follows:

 ALSTR - Association for Work Under Stress in Romania (www.smarsb/ro/alstr)

Date of affiliation Transelectrica:2000

 AmCham - American Chamber of Commerce Association in Romania (www.amcham.ro);

Date of affiliation Transelectrica:2014

 ARIR - Association for Investor Relations at the Romanian Stock Exchange (www.ir-romania.ro)

Date of affiliation Transelectrica:2018

 ASRO - Romanian Standards Association (www.asro.ro);

Date of affiliation Transelectrica:2008

Transelectrica representatives are part of the following Technical Committees:

- **Technical Committee 164** 'Electricity metering and load control equipment';
- **Technical Committee 165** "Overhead Power Lines":
- **Technical Committee 176** 'Equipment and tools for live working',
- **Technical Committee 374** 'Conformity Assessment'.
- CNR-CIGRE CIGRE Romanian National Committee Association (www.cigre.org.ro)

Date of affiliation Transelectrica: 2007

CIGRE - International Council of Large Electricity Systems - Their main objectives are to design and implement the energy system for the future, optimise existing energy equipment and systems, respect the environment and facilitate access to information.

Date of affiliation Transelectrica: 2007

 CNR-CME - Association of the Romanian National Committee of the World Energy Council (www.cnr-cme.ro) - a non-governmental organization member of the World Energy Council (WEC) since 1924;

Date of Transelectrica affiliation: 2000.

 CRE - Romanian Energy Centre (www.crenerg.org)

Projects carried out by CRE in collaboration with Transelectrica:

- CROSSBOW "CROSS BOrder management of variable renewable energies and storage units enabling a transnational Wholesale market"
- PHOENIX "Electrical Power System's shield against complex incidents and extensive cyber and privacy attacks"
- RESERVE

Transelectrica affiliation date: 2011

• ENTSO-E - European Association of Transmission System Operators for Energy (www.cnr-cme.ro) - is the cooperation structure between Transmission System Operators (TSOs) in Europe, both at pan-European and regional level, playing a key role in promoting the internal electricity market and cross-border trade, as well as ensuring the optimal management, coordinated operation and coordinated technical evolution of the European electricity transmission network. The participation of European TSOs in ENTSO-E is governed by the European legislation in force (Regulation 943/2019).

Date of Transelectrica affiliation: 2000.

- LWA International Working Under Stress Association
- **SIER** Society of Energy Engineers of Romania (www.sier.ro)

Date of affiliation Transelectrica: 2000

 IRE - Association of the Romanian National Institute for the Study of the Development and Use of Energy Sources (www.ire.ro)

Date of affiliation Transelectrica:2019

ISSA - International Social/occupational Security
 Association

ISSA (International Social Security Association) is an organisation that brings together institutions, companies and administrative entities from different countries of the world that deal with one or more aspects of social/occupational security.

Awards and distinctions obtained by the company

During 2023, the Company or representatives of Transelectrica have received a number of awards and distinctions as follows:

 Event: "ENERGY CEO FORUM & AWARDS 2023" organised by The Diplomat-Bucharest on 10 May 2023

NPG CO. Transelectrica SA received an Award in the Industry-University Collaboration Initiative of the Year category for the academic collaboration and strategic partnership between Transelectrica and the Politehnica University of Bucharest - building the DIGITEL laboratory at UPB

 Event: "InvesTenergy 2023 Gala Let's Put Energy People in the Light", organised by InvesTenergy publication on 10 October 2023.

Mr. Mircea Anton - Manager of the Balancing Market Operator Department of the National Energy Dispatcher, was awarded the "Diploma of Excellence for professionalism, dedication and performance".

 Event: "Focus Energetic 20 years Gala", organised by Focus Energetic on 20 November 2023.

NPG CO. Transelectrica SA received the "Diploma of Excellence for the professional and responsible operation of the National Energy System".

 Event: "The Diplomat Bucharest Awards Gala", organised by The Diplomat Bucharest on 13 December 2023.

NPG CO. Transelectrica SA received *the* "Energy Grid Resilience" Award

 Event: Conference "Romania CST Index 2023 - Best Practices in Corporate Sustainability", organised by The Azores agency, on 19 December 2022.

NPG CO. Transelectrica SA - Diploma "Silver level recognition according to Romania CST Index 2023 for obtaining a total score of 67 out of 100 points".

Our people - Human resources development and diversity

Human Resources Strategy

Vision

Objectives

Action lines

Developing the human resource strategy in line with the Company's strategic objectives and with the critical employee needs Initiation, development and implementation project to develop organisational culture

Developing a library of professional and behavioural competence both at managerial and executive level, where each competence should be defined and developed by 3 levels (junior, standard,

Implementing the performance and career management system

Physical and electronic archive of employee files in order to develop a database enabling the transfer of as many Human Resource processes as possible to online

Standardisation and online transfer of documents specific for personnel administration

Implementation and capitalisation of the Human Resource Senior Expert (HR BP) role

Reorganisation of the Human Resource Department based on Company objectives and on those assumed by the Division

Reducing bureaucry within the Human Resource Department

Restoring the balance between the volume of personnel administration versus personnel development activities, which rates now about 80% vs 20% in favour of administration

Developing competence for the Human Resource Department so that it can sustain the proposed projects

dDeveloping a working environment suitable for professional evolution, based on profile competence, a personnel motivation strategy, developing the brand of successful employer, turning dynamic the personnel administration processes meant to draw new resources and motivating the professional development of existent resources (recruitment, Company integration, performance and career management)

Professional training strategy for 2023

The aim of training and professional development activities in 2023 was to increase the professional efficiency of employees by acquiring, improving and diversifying professional skills, leading to increased professional performance of the Company's personnel.

The programme for 2023 aimed to:

- √ development of employees' knowledge, skills and abilities
- √ increasing employees' professional skills

in order to perform their job tasks efficiently and to strengthen the feeling of confidence in their own skills, which leads to increased job satisfaction and thus to increased professional motivation.

The principles underlying the implementation of the "Maintenance, Training and Development Programme for Company Employees" were: efficiency, effectiveness, coherence, equal treatment between categories of employees, effective planning and transparency.

The training strategy for the year 2023 aimed to achieve the professional training of employees in order to meet the operational and strategic objectives of the Company. Following the complex process of identifying all the training, education and development professional needs Company level, the Centralizer of training, education and professional development needs was drawn up, which was the basis for the preparation of the Maintenance, Training and Professional Development Programme for the year 2023, a programme that took into account both the professional activity and specific duties of the Company's employees and the organization's business objectives.

Therefore, the objectives have been revised, with the main line of action being to ensure that training/training/refresher training sessions are carried out for personnel who, in their professional activity, require authorisation/re-authorisation, as well as strictly emergency training;

To this end, training programmes have been developed for:

- ✓ completion and updating by the participants of the technical knowledge, legislation, regulations and standards specific to the electrical field electricians, in the ISCIR regulated field responsible for the supervision and technical verification of installations;
- ✓ acquiring the technical and organisational skills that allow the handling of equipment and materials specific to the forklift, for those who will take over the archiving activity;
- ✓ obtaining and developing general and specific skills for the Internal Auditor for the Integrated Management System;
- ✓ acquisition and certification of new skills: archiving, public procurement, internal auditor, SSM.

With the main aim of carrying out training sessions, leading to the development of an accessible, attractive, competitive and relevant training system for Transelectrica's objectives, and considering the trend of training service providers to conduct courses online, Transelectrica has conducted some of the courses online in 2023.

Promoting parity, eliminating gender discrimination and promoting women in leadership positions (102-8, 103-1, 103-2, 103-3, 401-3, 405-1, 406-1)

Our policy ensures that there is no discrimination in recruitment, hiring and promotion on the basis of gender, marital status, sexual identity, religion, political choice, ethnicity, race, nationality, genetic characteristics, age, etc. The *Company's internal rules* include, among other things, rules on compliance with the principle of non-discrimination and the elimination of any form of violation of dignity. Thus, in 2023, there were no incidents of discrimination and, due to prevention, no corrective actions were necessary.

The age and gender structure of Transelectrica's employees is specific to the Company's field of activity, with a slight ageing trend due to the considerable weakening of vocational education, the general ageing of the population or the intensive development of alternative prosperous fields (e.g. IT).

From the perspective of eliminating discrimination, women gender advanced considerably in recent decades in terms of their careers, so the chances of them developing successful careers have increased. Globally, more and more women are moving into leadership positions, whether it be in large companies or even governments.

In this context, within Transelectrica, the percentage of women employed in the executive area is over 28%, the percentage of women in top management positions was 32% of the total in 2023 and over 25% in middle management.

The gap between women's and men's earnings in Transelectrica continues to narrow, with the gap narrowing.

Moreover, the Company employs 8 employees with disabilities and, in this regard, there were no incidents of discrimination in 2023.

Employee structure (401-1, 405-2)

32% of top management positions filled by women in 2023 In terms of employee dynamics, a total of 54 people were employed in 2023, while 98 left the company, with the average age of all

employees on 31.12.2023 being 47 years.

In 2023, 22 women and 8 men were on parental leave, benefiting from the articles dedicated to this case in both the Labour Code and the Collective Labour Agreement.

Number of employees at 31 December 2023 - 2037 persons

Gender structure (distinct for executive, managerial and top management positions)							
Position type	Total		Ages		Ger	nder	
	number of employees	Up to 30 years	30-50 years	Over 50 years	M	F	
Top management	80	0	38	42	54	26	
	(3.92%)	(0%)	(47.50%)	(52.50%)	(67.50%)	(32.50%)	
Senior management	311	3	141	167	233	78	
(excluding top management)	(15.26%)	(1%)	(45.30%)	(53.70%)	(74.92%)	(25.08%)	
Executive personnel	1646	123	759	764	1180	466	
	(80.82%)	(6.04%)	(46,11%)	(47.85%)	(71.68%)	(28.32%)	
Total personnel	2037	126	938	973	1476	570	

Job performance review and remuneration policy (102-35, 102-36)

The criteria and principles on the basis of which the current pay system was established are:

- Equal pay for equal work" principle, implemented following the grading of functions on the basis of a uniform instrument;
- the award of basic salary mainly on professional criteria - depending on the role of the post within the organisation, the complexity of the profession/job performed, responsibility and the qualifications required for the position. These were determined through an objective job evaluation process;
- ensuring internal equity by eliminating discrimination based on years of service or seniority within the Company;
- Pay commensurate with the importance of the job and attention to performance levels creates the conditions for both retention and attraction of qualified personnel.

The remuneration system is organised into 9 job classes structured according to the nature of the work performed and the type of contribution made to the Company.

The annual performance appraisal is carried out in the first quarter of the year for the previous year's work and is used to establish the annual overall appraisal rating, which characterises employees' work over a 12-month period.

Managerial personnel will need to have, on the managerial side, a range of skills covering elements of planning, organising, coordinating, monitoring, directing and controlling activities, as well as other managerial skills:

At the same time, personnel in management positions will also need to have professional and executive skills, as well as communication, collaboration and representation skills. Last but not least, the principles of professional ethics must be respected.

From an employee benefits perspective, we distinguish:

- ensuring internal equity by eliminating discrimination based on years of service or seniority within the Company;
- granting salary increases, bonuses or promotions based on performance-related criteria, following a performance appraisal process conducted annually according to criteria established and communicated at the beginning of the appraisal cycle.

In 2023 no compensation was granted.

Training programmes (103-1, 103-2, 103-3, 404-2)

Transelectrica is constantly looking at continuous personnel development through annual training and professional development programmes.

A total of 182 Company employees benefited from external training programmes in 2023

and 1584 employees participated in internal training courses

The employee development process aims to ensure that personnel are as well prepared as possible so that the Company's objectives are met in a world where success depends on performance, efficiency, timeliness, the ability to deliver quality, diversity.

The aim of the process and therefore of the training and professional development activities in 2023 was to increase the professional efficiency of the employees by acquiring, developing and diversifying the professional skills of the employees, thus leading to an increase in the professional performance of the Company's personnel.

The training programme for the year 2023 aimed at developing the knowledge, skills and abilities of employees and increasing their professional competences, in order to perform their professional duties efficiently and to strengthen the feeling of confidence in their own competences, which leads to increased job satisfaction and therefore to increased professional motivation.

These results could be achieved mainly due to the fact that the vocational programmes (courses) training were designed and designed according to (personalised curricula, specific needs topics adapted to the concrete needs identified), categories of employees and levels of knowledge, the objectives being to professional efficiency improve and effectiveness, to increase confidence in one's own strengths and capabilities and last but not least to offer a concrete and realistic perspective in career development.

The principles underlying the implementation of the "Maintenance, Training and Development Programme for Company Employees" were: efficiency, effectiveness, coherence, equal treatment between categories of employees, effective planning and transparency.

Specific maintenance, training and professional development programmes were aimed at employees regardless of their hierarchical position. There was no distinction, exclusion, restriction or

preference in the constitution of the series/groups of courses and equal and fair treatment was ensured.

Priority objectives envisaged in 2023:

- development of employees' knowledge, skills and abilities
- increasing employees' professional skills

In 2023, a total of 1766 participants took part in maintenance, training and further training programmes. The total number of training hours was 32,024 hours, with an average of 18 hours/participant.

The courses that were organised in 2023 were designed and planned according to specific needs (personalised curricula, topics adapted to the concrete needs identified), categories of employees and levels of knowledge, the objectives being to improve professional efficiency and effectiveness, to increase confidence in one's own strengths and capabilities and last but not least to offer a concrete and realistic perspective in career development.

The professional training activity at the National Power Grid Company Transelectrica S.A. level in 2023 was carried out in accordance with the "Annual maintenance, training and professional development programme for the Company's employees", approved on 22.02.2023 by the Company's Directorate.

The priority in 2023 was to ensure the organisation and conduct of training sessions for personnel whose professional activity requires certification, authorisation, recertification or reauthorisation. To this end, the courses required for technical authorization and reauthorization were organized and conducted for a total of 23 participants.

Courses were also organised in the fields of technical, procurement, integrated

management, environment, etc., courses considered a priority for the Company's personnel.

Training and professional development activities in 2023 were primarily based on urgent needs, rigorously identified, assessed, analysed and prioritised.

If this causal link is established (organisational need - educational intervention) there is every chance that lifelong learning will correct real problems and demonstrate its viability and relevance to management. Also:

 the learning process (training and further training) must be coherent and focused on specific objectives so that it supports and can contribute

- to the achievement of organisational goals;
- the training and development strategy must be consistent, but not rigid, in order to be improved and sustainable;
- Maintenance, training and further training programmes must be flexible and respond to a variety of needs at different levels; courses must also be deliverable in different ways and in different locations;

For strategic human resource development, training practitioners need to be aware of and generate, through the means at their disposal, an essential change in the role of the trainer in an organisation, i.e. from training provider to learning facilitator.

Internships

Transelectrica supported the training of the young generation of energy specialists through annual internship programmes in 2023.

Transelectrica SA grants private scholarships in accordance with the provisions of Law no. 376/2004 on private scholarships, as amended and supplemented, Order no. 1759/5371/2004 approving the instructions for application of Law no. 376/2004 and the internal procedure.

Also in 2023, Transelectrica students from Bucharest and from all over the country took part in internships.

Internships at Transelectrica are confirmation of the Company's ongoing concern to actively support and encourage the younger generation, to direct them towards the energy sector in general and the electricity transmission sector in particular.

A total of **110** students and trainees completed internships during 2023, both at the Company's headquarters and at the territorial transmission branches.

The participants in the internship programs organized within NPG CO. Transelectrica SA come mainly from and technical faculties energy high schools, such as: National University of Science and Technology Politehnica Politehnica Bucharest, University Timisoara, University of Craiova, Technical University "Gheorghe Asachi" Iasi, Danube University of Galati, High School of Energy Constanta, but also students from other faculties, as follows: Titu Maiorescu University, Academy of Economic Studies of Bucharest, National School of Political and Administrative Studies.

Benefits of internships:

- familiarising students with the Company's field of activity,
- students acquire specialist knowledge,

- Involvement of personnel in introducing pupils and students to the practical training programme,
- attracting potential candidates for vacancies.

During 2023, a total of 11 private scholarships were awarded, of which 9 scholarships by the Executive and 2 scholarships by STT Timisoara. These were awarded to students from technical faculties such as: Politehnica University of Bucharest Faculty of Energetics, specializing in Electrical Power Systems Engineering, Politehnica University of Timisoara Faculty of Electrical Engineering and Electroenergetics, Faculty of Electrical Engineering and Energetics, as well as a student from the Academy of Economic Studies - Faculty of Finance, Insurance, Banking and Stock Exchange.

In December 2023, 7 more scholarship contracts were signed for students from the Politehnica University of Bucharest - Faculty of Energetics and Faculty of Electrical Engineering. The awarding of these scholarships will start in January 2024.

Private scholarships are awarded to students in their fourth or third year of study for the duration of the academic year. For students in their third year of study, private scholarships are awarded during both the third and fourth year.

Benefits of private scholarships:

- supporting young students with very good academic results,
- Students have the opportunity to learn and become familiar with the Company's field of activity,
- to employ scholarship holders, on completion of their studies, in a position corresponding to their professional training, insofar as vacancies exist,

 improving communication with specialist higher education institutions.

In addition to the private scholarships granted under Law no. 376/2004 on private scholarships, the Company also grants scholarships to support students in dual education, through the European Affairs, Strategy, Development and Access to European Funds Department. Scholarships for dual education are regulated by Order no. 5732/29.09.2022 approving the methodology for the organization and operation of dual education.

Internships:

Within the Company, in 2023 a pilot program was started to organize **4 internships** according to the Law no. 176/17.07.2018 on internship, in the fields of commercial (public procurement), communication and public relations in the field of energy, legal, design of stations and power lines.

The internship programme runs from December 2023 for 4 months in the following organisational entities: Communication and Public Relations Directorate, Commercial Directorate, Legal and Litigation Directorate and Technical, Energy Efficiency and New Technologies Directorate.

Participants in the internship programme come from the following faculties: the Academy of Economic Studies of Bucharest, the National School of Political and Administrative Studies, Ion Mincu University of Architecture and Urbanism, Titu Maiorescu University.

Benefits of internships:

 developing interns' professional skills in carrying out the duties and responsibilities of the field in which the internship programme is organised,

- carrying out activities and familiarising yourself with the Company's requirements,
- internal knowledge of the specifics of the Company's business and its requirements,
- gaining professional experience, practical skills and/or competences,
- facilitating the transition from education to the labour market.

Students who receive a private scholarship from NPG CO. Transelectrica SA are employed by the Company upon completion of their studies, within the limit of available vacancies and have the obligation to stay for a period of at least 3 years within the Company.

During the year 2023, **7 scholarship students have been hired** within the Company, with the remainder to be hired in the year 2024 after graduation.

Information, consultation of employees and relations with trade unions (102-41, 103-

1, 103-2, 103-3, 403-4)

Trade unions play an important role in the employment relationship between employees and employers. The union promotes and protects the rights of its members, taking into account their needs and opinions. A good employer-employee relationship is built on effective communication between employee and company representatives.

98.5% of the Company's employees are union members, showing that they recognise the usefulness of a trade union

body set up to promote their interests in their relationship with their employer.

At the same time, the absence of any labour disputes in the last year is a relevant indicator of the effectiveness of mediation between employees and employers.

Given the profile of the Company, no specific documents were required concerning the freedom of association of employees.

Responsibility to employees

Training programme and processes to ensure occupational safety and health (103-1, 103-2, 103-3)

The entire training process is carried out on the basis of *Article 20 of Law no. 319/2006* "Law on Occupational Safety and Health", with subsequent additions and amendments, on the basis of Decision no. 1425/2006 for the approval of the Methodological Norms for the application of the provisions of the Law on



Occupational Safety and Health no. 319/2006, Chapter V - Training of workers in the field of Occupational safety and health and the Internal Operational Procedure code TEL 18.02 "Training of employees in the field of Occupational health and safety ".

Prevention and protection services dedicated to occupational safety and health activities are established (according to Law no. 319/2016 "Law on Occupational Safety and Health" Section 2), under the methodological coordination of the Integrated Management Department with duties in accordance with the legislation in force.

A person responsible for occupational safety and health activities is appointed in the Department and regularly manages the work.

The training activity has a unitary character, the regular training is combined

every six months and the SSM topics are presented on a 3-year cycle.

Training of employees is carried out by the workplace managers on the basis of the topics approved by the Company's management, recorded in the individual training sheets.

In order to prevent the disruption of the Company's activities, additional technical and organisational measures have been taken to prevent, control and limit the effects of the spread of SARS-CoV-2 infections.

The documents drawn up and applied on technical and organisational measures to prevent, control and limit the effects of SARS-CoV-2 virus transmission have been updated according to legislative changes at the level of the authorities/economic operators.

The training of workers in occupational safety and health consists of 3 phases defined by specific legislation.

IIntroductive general training	is delivered by personnel from the prevention and protection departments dedicated to labour health and security.
Training on the job	is provided by the working job manager
Periodical training	is delivered by personnel from the preventive and protective departments dedicated to labour health and security or by the manager of the working place in ca se of monthly and half yearly training, under guidance of personnel from prevention and protection departments dedicated to occupational security and health

Prevention actions (403-2, 403-3)

In order to carry out preventive actions, training topics are developed for each phase defined by the legislation by the prevention and protection services dedicated to occupational safety and health activities in relation to the risk assessments for each corresponding workplace.

The risks of each individual workplace are also assessed and

measures are taken to reduce them or keep them under control through the measures set out in the Prevention and Protection Plans. The concrete measures take the form of annual programmes of occupational safety and health measures carried out by qualified occupational safety and health personnel. In order to ensure proper prevention, training is carried out with the following frequency:

- annually, minimum one training per employee;
- every six months for other categories of authorised technical personnel in Energy Dispatches;
- on a monthly basis for operational personnel and/or personnel authorised in terms of Occupational health and safety in electrical stations and every six months for periodic combined training.

Company-wide, there are a total of 19 persons responsible for prevention and protection services dedicated to occupational safety and health activities.

These include occupational medicine doctors and a psychologist who provide support to the Company's personnel, both TESA personnel and operational personnel in the centres and power stations.

There are 24 safety and security personnel across the Company.

At the same time, simulations are carried out every year, which capture elements of occupational safety and health, environment and emergency situations coordinated by specialized entities (ISU, Police, etc.), as well as those carried out entirely with own personnel.

All personnel are trained from the first day of work (on hiring) and continue

with regular training at different frequencies (monthly, half-yearly and yearly) depending on the risk assessments for each job.

Training of personnel in occupational safety and health is carried out using training means, methods and techniques, such as: exposition, demonstration, case study, films, slides, projections, computer-assisted training.

Trainings are conducted at different frequencies with all personnel on how to get personnel to and from work. Each employee completes a Journey Declaration on recruitment setting out the duration of the journey and the route.

The responsible personnel of the prevention and protection services dedicated to occupational safety and health is the structure in charge of investigating Occupational accidents.

In 2023, there was 1 work accident followed by temporary incapacity for work.

The number of sick leave days recorded for work-related accidents in 2023 was 150 days.

There have been no fatalities due to workplace accidents and no cases of employees with occupational diseases or high exposure to occupational diseases.

In terms of training, various areas are addressed as follows:

Organisation of joint SSM committees (management - employees) and relevant activities by 2023 $_{(403-1)}$

For the consultation and participation of workers in the discussion of all issues related to occupational safety and health, Occupational Safety and Health Committees are set up in accordance with Articles 16, 17, 18 of the Occupational Safety and Health Law no.319/2006. The

discussed according to the agenda of each meeting were: endorsement of the annual occupational safety and health programme at the Company level, analysis of occupational safety and health issues raised by employees in the Territorial Transmission Branches and DEN, follow-

Presentation of specific egislation in occupational health and safety Information and awareness building for all kinds of risks identified for each working place

Presentation of work instructions depending on the activities performed

Describing first aid measures and providing examples

Description and awareness building for measures required for fire extinguishing and employees' evacuation

Employees are informed about all new items, labour accidents, event that have taken place

The manner in which people travel on public roads both for pedestrian employees and those using public means of transport or Company and/or personal car to travel to / from work and the other way round

Occupational Safety and Health Committees operate on the basis of their operating regulations.

The Committees shall be organised in accordance with Chap. IV of the Decision no. 1425/2006 for the approval of the Methodological Rules for the application of the provisions of the Law on Occupational Safety and Health no. 319/2006.

The Company-wide Occupational Safety and Health Committee met three times in 2023. Among the issues

up of the implementation of occupational safety and health programmes of measures, endorsement of the Company's own occupational safety and health instructions, operational procedures in the field of occupational safety and health, how working conditions and provision of personal protective equipment for workers are ensured, analysis of the occupational safety and health activity carried out in the past year, based on the report prepared and endorsement of the report.

Environmental responsibility

Environmental management system (103-1, 103-2, 103-3)

protection Environmental is important objective for Transelectrica, with a view to the sustainable and sustainable development of the Company. Thus, the environmental protection policy is an integral part of the general policy, with the objectives of maintaining an efficient environmental management system, preventing and reducing pollution, complying with national and European requirements sustainable and development.

Transelectrica's management has established the environmental protection policy as an integral part of the general policy, with a view to planned, effective and sustained action aimed implementing environmental management throughout its structure and in all its activities leading to а change in organisational culture by promoting an attitude towards environmental protection and sustainable development.

Transelectrica's Environmental Management System, certified according to the requirements of SR EN ISO 14001:2015 by SC SRAC CERT SRL (IQNet partner), has created the necessary conditions for the provision of the electricity transmission and dispatching service and for the administration of the electricity market, in compliance with legal and other requirements, to which the Company has subscribed, applicable to its environmental aspects and for demonstrating concern for the prevention of pollution and the improvement of environmental performance.

No pollutants are discharged into the environment under normal operating conditions of RET installations. Some polluting chemicals may be accidentally released into the environment in the event of equipment leaks, incorrect operation, damage or during construction and maintenance work.

Identification and assessment environmental aspects for technology and construction are carried out from the first phase. this desian On basis. the environmental management plan (for construction, operation and decommissioning of the facility) developed, including the programme of measures for pollution prevention and impact mitigation and the monitoring programme of environmental factors.

In order to reduce the negative environmental impact of the RET, priority must be given to the implementation of the measures established bγ the environmental protection authorities, both contained in the compliance programmes, which are conditions for the environmental or water granting of management permits, and those resulting from the controls carried out by the regulatory and control authorities on the Company's sites.

As regards the environmental objectives and targets, as well as the main directions for achieving the environmental objectives, we note that these are discussed in detail in the section on the EU Taxonomy related to Transelectrica's activity under the Taxonomy Regulation (EU) 2022/852.

Environmental risks, opportunities and costs

High-voltage electrical installations, consisting mainly of overhead power lines and transformer and connection stations, are installations with a significant impact on the environment, both in terms of the technical complexity of the installations and in terms of the areas of land occupied and the length of the lines (in the order of tens or even hundreds of kilometres), usually in several counties.

No pollutants are discharged into the environment under normal operating conditions of RET installations. Some polluting chemicals may be accidentally released into the environment in the event

of equipment leaks, incorrect operation, damage or during construction and maintenance work.

Identification and assessment of environmental aspects for technology and construction are carried out from the first design phase. On this basis. Environmental Management Plan (for construction, operation and decommissioning of the facility) is drawn up, including the Programme of Measures for Pollution Prevention and Impact Mitigation and the Environmental Monitoring Programme.

Types of impact and effects/manner of occurrence caused by the activities carried out during the construction - assembly phase of Transelectrica installations

Environmental aspects related to construction

Type of impact	Manifestation modes (effects)					
Physical	 soil damage through the opening of new access roads, ground stripping and excavation occupancy of land with site organisation, including warehouses damage to flora (through deforestation) damage to wildlife (through habitat fragmentation and noise from machinery, transport, etc.) affecting birds (by creating aerial obstacles in the flight path) generation of waste (porcelain, glass, concrete, metals, waste oil, packaging, debris, etc.) 					
Chemical	 pollution of soil and/or water by accidental spills of fuel, oil and other chemicals air pollution by: emissions of combustion gases (SO_x, CO_x, NO_x, VOC, particulate matter) from heating installations or means of transport sulphur hexafluoride (SF₆) emissions - accidental leaks during gas handling or due to equipment leaks dust emissions due to construction-assembly works emissions of volatile organic compounds from paints and thinners, etc. 					
Socio-economic	 disruption of certain social activities, including population displacement 					

Type of impact	Manifestation modes (effects)
Physical	 occupancy of land with OHL routes and station locations damage to flora through systematic clearing of vegetation wildlife damage (habitat fragmentation, electrocution, etc.) damage to birds and aircraft (aerial obstacles placed in the flight path, collision, electrocution, etc.) danger of electrocution or burns from contact or falling OHL near or crossing roads, railways, water, buildings, etc. fire hazard due to damage to insulation or accidental touching of conductors by objects or dry vegetation the effects on the population and wildlife of noise and vibration caused by the operation or vibration of RET elements the effects on the population and wildlife of corona noise from high-voltage installations sound and light effects of the corona phenomenon disturbances of radio and television systems caused by the electromagnetic field electromagnetic field influences on telecommunications installations or other electrical networks at their junctions and approaches effects of electromagnetic fields on living beings
Chemical	 pollution of soil and/or water by accidental spills of fuel, oil and other chemicals air pollution by: emissions of combustion gases (SO_x, CO_x, NO_x, VOC, particulate matter) from heating installations or means of transport sulphur hexafluoride (SF₆) emissions - accidental leaks during gas handling or due to equipment leaks ozone and nitrogen oxides - corona effect at high voltage sulphuric acid vapour - from batteries.
Visual	landscape damage
Psychic	 fear of the approach and the visual and sound effects of RET

Transelectrica has adopted measures aimed at preventing pollution and reducing the environmental impact of both operating activities and maintenance and investment activities involving construction and installation work.

The determination of risks associated with the significant environmental aspects identified for the activities/processes carried out in Transelectrica has led to a number of beneficial effects and opportunities:

- Identification of new wastewater treatment technologies generated in power

stations (water-oil separators, spill alarm/control equipment) that reduce polluting discharges outside the station premises,

- SF6 alarm/emission control devices on SF6 equipment,
- concrete platforms for storage of oil equipment removed from installations/new oil equipment and temporary waste storage,
- equipment operating with low noise and electromagnetic field values, in compliance with the specific rules in force.

Finding out new technologies to treat waste water generated in electric substations (water oil separators, spill warning / control devices) which reduce pollutant leaks outside substations

Utilisation of warning gauges control of SF6 emissions from SF6 containing equipment

Results of risk determinations associated to environmental aspects

Construction of concreted platforms to store equipment containing oil which was withdrawn from operation / new oil containing equipment and temporary waste storage

Using pieces of equipment that operate at low noise levels and providing little electromagnetic field, observing also the specific applicable norms

Management of environmental factors (304-2, 304-4, 308-2)

a) Land occupation

Area occupied by power lines and stations:

	No safety zone	[m] ²	With safety zo	ne [m]²
	UTT	READ	UTT	READ
Total Transelectrica	3.988.066	2.893.289	7.137.572	551.176.743

b) Sources of soil, groundwater and land pollution

From the normal operation of RET installations, no noxious substances are discharged to the ground, groundwater or land. Accidental pollution may occur due to leaking/leaking of equipment containing hazardous substances or insulating oil or due to faults in the oil

regeneration/supply/discharge installations in or from the equipment.

Oil/car fuel spills from machinery and vehicles may also occur during construction and maintenance work (oil spilled into the environment has been contained with absorbent, biodegradable soil).

c) Sources of air pollution

No significant quantities of pollutants are released into the atmosphere during construction, maintenance and normal operation of RET installations. The following emissions into the atmosphere

may occur during construction, maintenance and normal operation of RET installations: particulate matter - during construction work, combustion gases - from vehicles, generators and thermal

power plants, negligible quantities of ozone (Corona effect), sulphur hexafluoride - due to equipment leaks or improper handling of the gas.

In the event of fires or explosions, combustion gases (SOx, COx, NOx, VOCs, etc.) may result. High-voltage OHLs generate atmospheric pollution with ozone and nitrogen oxides as a result of corona discharges occurring around active conductors, especially in rainy weather. The additional contribution of these

pollutants to the existing background is not major and cannot lead to exceedances of the legal information threshold values, beyond which there is a risk to human health.

As regards greenhouse emissions, the values for 2023 have not been calculated as the reporting deadline is June 2024. In the last report in May 2023 on SF6 emissions from equipment operated by Transelectrica, the value was 75,863.64 kg.

Type of information				Year 20	23				TOTAL
	UTT Bacau	UTT Buchares t	UTT Cluj	UTT Constanta	UTT Craiova	UTT Pitesti	UTT Sibiu	UTT Timisoara	
Total SF6 capacity for equipment on site (kg)	3820.5	27121.82	3058.1	14332.4	8752.22	5750.4 6	8714.6 4	4313.5	75863.64
of which closed, pressurised equipment * (kg)	3755.1	27089.82	2981.9	14332.4	8752.22	5750.4 6	8714.6 4	4279	75655.54
of which sealed, pressurised equipment ** (kg)	65.4	32	76.2	0	0	0	0	34.5	208.1
Total capacity of new equipment filled on site (not at manufacturer) (kg)	129.2	48	0	389	10	0	730.80	0	1307
Total capacity of equipment withdrawn (kg)	0	0	0	150	94.9	0	0	0	244.9
Emissions at installation- quantity of SF6 used for filling new equipment (closed, pressurized) (kg)	0	0	0	0	0	0	0	0	0
Emissions in use - amount of SF6 used for refilling closed pressurized equipment during service/maintenance activities (kg)	0	0	0.85	0	5	0	7.5	1	14.35
Emissions in use - amount of SF6 used recovered from closed pressurized equipment during service/maintenance activities (kg)	0	0	0	0	0	0	0	0	0
Disposal emissions - capacity of end-of-life equipment (kg)	0	0	0	0	0	0	0	0	0
Disposal emissions - amount of SF6 recovered from retired equipment (kg)	0	0	0	0	0	0	0	0	0
From which year do you use equipment containing SF6	2002	1999	1999	1994	1995	1997	1965	1998	1965

The objective for 2024 is to reduce emissions below the previous year's level and to identify ways in which this reduction can be sustainable in the long term, not just in a single year under review,

especially in the context of European recommendations and obligations.

Prevent and reduce greenhouse gas emissions by providing equipment maintenance services as scheduled and monitoring emissions. Transelectrica currently has a fleet of vehicles equipped with high-performance technologies to reduce greenhouse gas emissions, complying with air pollution standards required by national and European legislation.

d) Wastewater sources

No technological wastewater results from the electricity transmission process.

The wastewater generated on the site of the RET facilities is as follows:

-household wastewater from human activity - discharged directly into the city sewer or drained and transported to a municipal wastewater treatment plant or disposed of locally in micro-wastewater treatment plants and discharged to land or groundwater;

-stormwater collected in oil equipment tanks and in concrete pads for waste and equipment storage (may contain oil from leaks) - mechanically cleaned in oil-water separators and

e) Waste generation

There is no direct waste from electricity transmission. Waste results from construction, maintenance and human activity. The quantities of waste vary from

The prevention and reduction of greenhouse gas emissions is achieved through the of closed/sealed use pressurized providing equipment. by maintenance services to the equipment as scheduled and also by monitoring emissions.

discharged to the city sewer or drained and transported to a municipal wastewater treatment plant or discharged to land or groundwater within maximum allowable limits for pollutants discharged to the environment.

In order to carry out its activity, Transelectrica used 29,065 cubic meters of water during 2023, a 4.5% decrease compared to the previous year. The water used comes from the local networks of each territorial unit/station/centre or from underground (drilled wells).

Transelectrica does not currently use recycled water.

year to year, depending on the volume of investment and maintenance work.

The waste generated was disposed of/recovered by authorised companies.

f) Electromagnetic field generated by RET installations

Transformer/connector stations and overhead 220kV and 400kV power lines have a relatively limited impact on neighbourhoods, existing only around RET installations. Α large part of the disturbance effects are caused electrical induction (in ungrounded metal objects or structures) and interference (radio interference). phenomena The solutions adopted design the construction of high-voltage power lines and stations ensure adequate protection effects caused by against the exposure of living organisms to the electromagnetic field as well as reducing the impact of these installations on the environment. According to studies carried out by specialist institutions, in the vicinity of overhead 220kV and 400kV lines, the intensity of the electric field decreases with distance, so that at a distance of about 25 to 30 m from the axis of the line, the field intensity is zero.

In the year 2023, measurements showed that no exceedances of the values required by the regulations in force were recorded at station premises and at crossings over roads, railways and areas with heavy traffic.

g) Acoustic pollution

During the construction period, noise may be produced due to the execution of works and the operation of equipment and vehicles. During operation, noise pollution is due to noise from operation, vibration of RET installations or corona discharges in the space around active conductors. The noise level produced by the corona effect at a distance of 25 m from the active conductor varies between 53 dB in rainy weather and 33 dB in fine weather.

Transelectrica defines and applies preventive and corrective measures to reduce the environmental impacts of its facilities and activities. The diversity of environmental conditions for each site of the RET installations (overhead power lines, transformer and connection stations, buildings) determines, as at different stages (design, construction and operation) of each installation, specific environmental impacts, so that measures are defined in each case for the existing conditions at each site.

No exceedances of the maximum permissible noise level were recorded in 2023.

h) Impact on wildlife

The impact on wildlife is significant, especially on birds, manifested by collision or electrocution by RET installations in migration corridors or protected areas. The main migration corridors of various types of birds have been identified in the Banat, Dobrogea and Danube Delta areas.

To remove birds from the OHL area, anti-bird-trapping equipment that prevents birds from sitting on the poles (protects both birds from electrocution and insulators from being punctured) is mounted on the poles above the insulator chains, and "deflectors" (equipment that prevents birds from sitting on OHL conductors) or coloured panels, usually imitating raptor figures, are mounted on OHL conductors in the migration corridors to reduce the impact of birds on the OHL.

i) Impact on vegetation

The impact on vegetation is determined by the permanent or temporary occupation of land and the removal of vegetation exceeding a certain

height from the safety zones of the RET installations to avoid the occurrence of fires. This impact can only be significant in protected areas.

j) IUCN Red List and National Conservation List species with habitats in areas affected by operations and measures taken to conserve their habitats

For the conservation of the endangered Danube Falcon, artificial nests have been installed on high voltage poles, as follows:

-at UTT Timisoara: 34 nests;

-at UTT Bucharest: 4 nests;

-at UTT Constanta: 31 nests:

Artificial nests are metal or wooden boxes and have been placed on power poles because the Danube falcon prefers nests that offer good visibility of the area and favourable feeding sites nearby. It is necessary to place nests on artificial supports, such as power poles, as there are no tall, solitary trees on farmland and pasture (historical nesting sites).

The artificial nesting action is part of the project "Conservation of the Danube falcon in north-eastern Bulgaria, Hungary, Romania and Slovakia", a multinational project with European funding, as the importance of protecting and conserving the species is also recognised at EU level.

Elaborating the documentation

•Elaborating documentation and submitting files to license / re-license the objectives managed by the Company in terms of environmental protection and water management

Executing work such as

- Construction or maintenance of drainage networks for domestic waste water and / or rainwater;
- •Installing oil-water separators to the tanks of oil-containing equipment and storage platforms;
- Building concreted platforms for temporary storage of equipment and waste;
- Maintenance of oil- or SF6-containing equipment in order to prevent leaks;
- Painting the towers of overhead lines (OHL) using colours adequate to landscapes;
- •Tree cutting / maintenance of safety corridors for OHL;
- •Restoring / developing the land to bring it to its initial condition (when work is complete).

Procurements of services regarding

- Monitoring the quality of waste water from Company substations and offices and proposing solutions to reduce pollution in accordance with the requirements from environmental permits and water management licences;
- •Monitoring the pollutant emissions in the atmosphere (noise, electric and magnetic field, pollutant emissions, ozone concentrations); the values obtained for determined parameters have been examined and interpreted, resulting conclusions regarding the extent of pollutant emissions and the compliance with limit values admitted by legislation;
- •Waste collection, sorting, transport and capitalisation / disposal of.

Environmental management plan

 Elaborating environmental management plans for the maintenance, refurbishment / modernisation projects

Transelectrica aims, through its future activity, to reduce the environmental impact of the installations, mainly through actions such as reducing the land area occupied, reducing the impact on fauna

and flora or reducing the electromagnetic field strength on the ground and the losses through Corona effect. In 2023 there were no significant spills with environmental impacts.

Classification of waste by type and disposal method (306-4)

No.	Type of waste	Code from HGR	Exp	loitation	Disposal	
			Recycling	Co- incineration	Incinerati on	Storage
1	Plastics (personal equipment)	07 02 13	-	-	х	-
2	Printer toner waste	08 03 18	х	-	-	-
3	Hydraulic mineral oils	13 01 10*	х	-	-	-
4	Synthetic engine, transmission and lubricating oils	13 02 06*	х	-	-	-
5	Non-chlorinated mineral insulating and	13 03 07*	х	-	-	-

	heat transmission oils					
6	Other engine, gear and lubricating oils	13 02 08*	-	-	х	-
7	Namols from water-oil separators	13 05 02*	-	-	х	-
8	Oily water from water-oil separators	13 05 07	-	-	х	-
9	Paper and cardboard packaging	15 01 01	х	-	-	-
10	Plastic packaging	15 01 02	х	-	-	-
11	Absorbents contaminated with hazardous subtrates	15 02 02*	-	-	х	-
12	Metal packaging	15 01 04	х	-	-	-
13	Other unspecified waste	07 02 99	-	-	х	-
14	Protective clothing	15 02 03	-	-	х	-
15	Scrap tyres	16 01 03	х	-	-	Х
16	Lead batteries	16 01 06*	Х	-	-	-
17	Oil filters	16 01 07*	Х	-	-	Х
18	Brake pads	16 01 12	Х	-	-	Х
19	Ferrous metals	16 01 17	Х	-	-	-
20	Non-ferrous metals	16 01 18	Х	-	-	-
21	Discarded equipment containing hazardous components	16 02 13*	х	-	-	-
22	Waste electrical and electronic equipment (WEEE)	16 02 14	х	-	-	-
23	Dismantled components from scrapped equipment	16 02 16	х	-	-	-
24	Lead batteries	16 06 01*	х	-	-	-
25	Alkaline batteries	16 06 04	х	-	-	-
26	Batteries	16 06 05	х	-	-	-
27	Demolition waste	17 01 07	х	-	-	-
28	Ceramic tiles and materials (Porcelain insulators)	17 01 03	-	Х	-	0
29	Wood	17 02 01	-	Х	-	-
30	Glass	17 02 02	Х	-	-	-
31	Plastics	17 02 03	х	-	-	-
32	Copper, bronze, brass	17 04 01	х	-	-	-
33	Aluminium	17 04 02	Х	-	-	-
34	Iron and steel	17 04 05	Х	-	-	-

35	Ol-Al (cables)	17 04 11	х	-	-	-
36	Metal mixtures (cast iron)	17 04 07	х	-	-	-
37	Mixtures of construction and demolition waste	17 09 04	-	-	-	Х
38	Sharp objects	18 01 01	-	-	x	-
39	Infectious-infectious medical waste	18 01 03*	-	-	х	-
40	Medically	18 01 09	-	-	x	-
41	Paper and cardboard	20 01 01	х	-	-	-
42	Textile	20 01 11	Х	-	-	-
43	Fluorescent tubes and other mercury- containing waste	20 01 21*	х	-	-	х
44	Discarded electrical and electronic equipment	20 01 36	x	-	-	-
45	Rubber	19 12 04	-	-	х	-
46	Plastics	20 01 39	х	-	-	-
47	Metal	20 01 40	х	-	-	-
48	Mixed municipal waste	20 03 01	-	-	-	х
49	Namols from septic tanks	20 03 04	-	-	-	х

Exceedances of limits allowed by environmental regulations and remedial means (307-1, 308-2)

Following the monitoring of physicochemical quality indicators conventionally clean stormwater, contaminated stormwater in the area of power transformer/balancing coil tanks, before and after oil separators, observation groundwater in wells. domestic wastewater and wastewater from car garages, taken from power stations belonging to Transelectrica, during the year 2023 and from the interpretation of the results, exceedances of the limits allowed by the regulations in force were recorded for the indicators: solvent extractable substances, suspended matter content, chemical oxygen consumption (CCO-Cr), biochemical oxygen consumption (CBO5) and ammonium. To eliminate exceedances, bioactivators will be purchased, the separators will be cleaned in accordance with their operating procedures, and the separator filters will be replaced where necessary.

In 2023 an inspection was carried out by the National Environmental Guard - CJ Mehedinţi, as a result of which STT Craiova received 2 major/minor measures which are in progress.

Future measures to mitigate the local problems (103-1, 103-2, 103-3, 203-2)

Protecting the environment

Transelectrica, as a transmission and system operator, considers that it has a major responsibility towards future generations and is constantly striving to find economically sustainable solutions to develop and modernise its facilities in line with the European Union's environmental protection requirements, all the more so as its membership obligations, in the context of Greendeal and other such agreements, are extremely important and have a direct impact on the steps taken at national level.

Our environmental policy embodies a commitment to conducting all of our specific activities in a responsible manner, giving appropriate attention to environmental impact and sustainable performance through a set of clear objectives, outlined in the table below:

Rational use of natural resources

Reducing and measuring pollutant emissions in the environment

Proper management of waste resulting from maintenance and refurbishment activities

Periodical monitoring of environmental factors (water, air, soil, noise, electromagnetic field, waste)

Upgrading and refubishing installations using best-in-class technologies by which environmental pollution is prevented or reduced

Providing acknowledgment and observance of environmental legislation by all Company employees, by information, training and motivation

Corporate volunteering

In Romania, more and more employees consider the social and ethical values of their company to be important.

Education

Our orientation from the perspective of corporate social responsibility is to support education in order to increase its quality, both from the perspective of the technical area, specific to the Company, and from the perspective of the supporting areas. To support these ideas, we will continue our active involvement in increasing the quality of education in the specific area of Transelectrica's activity.

Health

The health of our employees and of those around them is a priority for Transelectrica, that's why we will continue to help, in the coming year, associations that will submit eligible projects to improve the health system in Romania.

Therefore, employees are an important audience for Transelectrica's corporate social responsibility strategy. Corporate volunteering is the most relevant form of team-building, as a result of the much greater involvement of employees in organised actions, the Company's aim being to promote this activity as much as possible in the future.

In 2023 we continued the corporate volunteering project "Waiting for Santa Claus", in partnership with the Story Told Association and the Cured Hospitals Association, which consisted in preparing 180 Christmas presents for children from disadvantaged families in two counties and for children who spent the winter holidays hospitalized at the Bucharest Oncological Institute.

Environmental protection is becoming an increasingly pressing issue,

especially because of the problems caused by climate change and the alarming consumption of products whose management has an irreversible impact on the quality of nature. Environmental protection is an important objective for Transelectrica, with a view to the sustainable and sustainable development of the Company.

In this context, Transelectrica has joined the voluntary project of the Association Capace cu Suflet in their action of collecting plastic caps, which they recycle and the money obtained in this way goes to children with health problems or from disadvantaged backgrounds.

Corporate social responsibility policy (103-1, 103-2, 103-3)

Transelectrica continues to participate in the evolution of the society in which it operates, which is of major importance to the company's core values. Through its social responsibility projects, the company takes into account the interests of society as well as those of employees, shareholders, the community and the environment.

The Company's main corporate social responsibility objectives are:

- investing in the education and development of young people;
- supporting humanitarian initiatives of non-governmental associations;
- participation in the development of culture and communities;
- supporting employees in the event of major health problems;
- employee involvement in corporate volunteering programmes;
- investment in environmental protection.

Community needs analysis (203-2, 413-1)

From the perspective of community needs, the most important problems currently facing Romania include social (poverty and social inclusion of disadvantaged groups) and economic (unemployment, low income), but also complementary areas such as quality and

access to education, health, electricity, drinking water.

We will always be concerned about the situation of local communities and believe that we must constantly contribute with effective solutions and actions.

Involvement in the community (413-1)

In order to support the development of a sustainable and successful Romanian society, Transelectrica is involved in the communities in which it operates, while trying to get as close as possible to the needs of people outside the company's area of impact.

In 2023, we were with organizations such as ELTH Alumni Association, Politehnica

Timisoara Foundation. Charity Merci Boutique Association. Gift Factory Association, Intelligent Energy Association, Procred Music Association, Christian and Charity Foundation "Life and Health", Coach Coaching Life Transformation Association.

The main projects in which Transelectrica is involved in 2023

Education and training

Supporting students in technical colleges and high schools in Romania

The company is actively involved in supporting learning with the aim of providing young learners with a learning environment. Over the years, we have collaborated with educational institutions in the energy sector by equipping research laboratories and awarding scholarships to outstanding students.

In order to support education and encourage young people to pursue a career in the energy sector, Transelectrica has offered monthly scholarships to 14 students and this scholarship programme will continue in 2024.

ALUMNI ELTH Association

Transelectrica sponsored the "ALUMNI ELTH" Association in the purchase of teaching and research equipment to train future specialists in the field of cyber security for electrical networks

Politehnica Timisoara Foundation

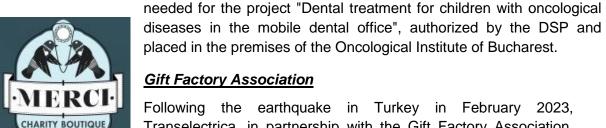
Continuing the partnership from previous years, the Company has granted support to the Politehnica Timisoara Foundation to complete the budget needed to organize the workshop "Modern Electrical Equipment in Electricity and Energy".



Humanitarian actions

Merci Charity Boutique Association

Transelectrica sponsored the Merci Charity Boutique Association to complete the budget



Following the earthquake in Turkey in February 2023, Transelectrica, in partnership with the Gift Factory Association, has been involved in supporting the needs of the victims through

the project "ALARTS FOR TURKEY", which consisted in raising funds for the purchase of non-perishable food, personal hygiene products, various equipment and materials, which were given as humanitarian support to people affected by the earthquake.

Intelligent Energy Association

As part of the "Energy for Life" project, Transelectrica supported the Intelligent Energy Association in the installation of photovoltaic panels for five households without electricity in remote areas of Leşu Commune, Bistriţa Năsăud.

Arts and culture

Diversity and creativity are values we value and promote in the arts and culture.

Procred Music Association

Transelectrica sponsored the Procred Music Association to organize a concert by 144 Romanian artists in the Kennedy Center, Washington D.C., managed by the White House.

Christian and Charitable Foundation "Viaţă şi Sănătate"

In 2023, Transelectrica granted financial support to the Procred Music Association for the organization of the Extraordinary Easter Concert - Jerusalem, historical site "Tower of David". The orchestra was composed of 120 instrumentalists who performed under the aegis of the Romanian National Opera and the Israel National Opera.

Health

In case of serious illnesses, Transelectrica provides financial support to employees for special medical treatment.

In 2023, the Company decided to grant financial aid to 57 people diagnosed with various medical conditions to cover treatment expenses.

Coaching Life Coach 4 Transformation Association

In the medical field, a sponsorship was granted to the Coaching Life Coach 4 Transformation Association for the project "On time!...intervention in AUTISM!", which consists of activities for early diagnosis, neuropsychological assessment, preparation of personalized intervention plans, 1 to 1 personalized therapy services: ABA therapy, speech therapy, kinesiotherapy, sensory integration, play therapy, art therapy, music therapy, occupational therapy, behavioral therapy.



In 2023, Transelectrica continued the social responsibility actions initiated in recent years and got involved in new programs, becoming increasingly visible and constant, being alongside associations, non-governmental organizations and energy/technical educational establishments.

Energy efficiency (102-15, 103-1, 103-2, 103-3, 302-1, 302-4)

Romania became a Member State of the European Union on 1 January 2007 and during the pre-accession period committed to review and adapt its legislation to increase energy efficiency, including the development and upgrading of the electricity transmission network.

Transelectrica shall draw up and submit to the competent authority each year:

"Declaration of Total Annual Energy Consumption and Energy Consumer Energy Analysis Questionnaire"

"Energy efficiency improvement programme including short, medium and long-term measures"

The regulations have been designed so as to address distinctly the industrial sector (economic operators in the sector), the tertiary sector (economic operators, public institutions, non-governmental organisations, etc.) and the residential sector (population). The aim of regulations aimed at energy efficiency is to promote and stimulate approaches and mechanisms such as:

- energy management at the consumer;
- developing energy-efficient technologies;
- promotion of new and renewable energy sources;
- development and diversification of energy efficiency services;
- training and education in energy conservation;
- promoting international cooperation programmes for energy efficiency.

The energy efficiency activities at Transelectrica level are based on the requirements of national legislation, in line with the European legislation in force, namely:

- Directive 2012/27/EU of the European Parliament and of the Council of 25 October 2012 on energy efficiency, amending Directives 2009/125/EC and 2010/30/EU and repealing Directives 2004/8/EC and 2006/32/EC;
- Directive (EU) 2018/2002 of the European Parliament and of the Council of 11 December 2018

- amending Directive 2012/27/EU on energy efficiency;
- Directive (EU) 2023/1791 of the European Parliament and of the Council of 13 September 2023 on energy efficiency and amending Regulation (EU) 2023/955 (recast D2012/27/EU);
- Act No 121 of 18 July 2014 on energy efficiency (for the implementation of Directive 27/2012 on energy end-use efficiency and energy services), updated;
- National Integrated Energy and Climate Change Plan (NEEAP);
- Law 372/2005 on the energy performance of buildings, republished.
- The templates for the declaration of total annual energy consumption and the energy consumer analysis questionnaire, submitted by the Ministry of Energy;
- Transelectrica Energy Efficiency Strategy 2020 2029.

According to Transelectrica's Energy Efficiency Strategy, the Company's approach to Energy Efficiency has five main directions, namely:

- reduction of the quantities of electricity to compensate for losses in RET (OTC);
- reducing electricity consumption to power own services in the power stations;
- 3. reducing electricity consumption to power administrative offices;
- reducing heat consumption for buildings (both by rethinking installations and by increasing the energy efficiency of buildings);
- 5. reducing fuel consumption for the fleet.

Given that Transelectrica falls into the category of industrial consumers with more than 1,000 toe (tonnes of oil equivalent), the requirements of the law establish certain obligations for the Company, such as:

- energy audit once every 4 years on an energy consumption contour at Company level; the audit is prepared by the energy auditor and is the basis for the determination of energy efficiency improvement measures. determined by the economic operator, representing at least 50% of the economic operator's total energy consumption;
- assigning the responsibility of Energy Manager to an authorised specialist;

- the preparation of the "Declaration of Consumption" and the "Energy Analysis Questionnaire" reported for the previous year;
- annual preparation of the "Energy Efficiency Improvement Programme, including short, medium and longterm measures, within the National Power Grid Company Transelectrica S.A.";
- annual preparation of the "Energy Efficiency Improvement Programme, including short, medium and longterm measures, within the National Power Grid Company Transelectrica S.A.";

Current activities in the field of energy efficiency

In general, measures to improve energy efficiency within Transelectrica are included in the investment programmes based on the 10-year RET Development Plan.

Current activities in the field of Energy Efficiency concern:

- carrying out energy audits of both technology and buildings;
- optimising electricity and heat consumption for Transelectrica buildings;
- update the specific requirements for upgrading transmission network assets in line with energy efficiency targets;
- the use of the ENTSO-E (costbenefit) methodology to validate investment projects, including energy efficiency indicators.

Specific activities in 2023 in the field of energy efficiency include:

 Launch of the project for the construction of photovoltaic power

- plants (PPS) and energy storage facilities (ESF) to supply internal services from Transelectrica stations - project called STARES, with non-reimbursable funding.
- 2. Update the specific chapter on Energy Efficiency and New Technologies in the RET Development Plan 2024 2033.
- Carrying out of the NPG CO. TRANSELECTRICA SA Energy Audit Study, on the meter related to the own technological consumption (OTC) in the electricity transmission network (RET);
- 4. Drawing up a Plan of Measures to reduce energy consumption at Company level during the winter period 2022 2023 (disseminated within the Company via the internal platform).

Use of electricity from renewable sources

Transelectrica purchases electricity to cover its own technological consumption (CPT) and consumption related to internal services from the 81 high-voltage power stations under the company's management:

- long-term electricity on the centralised markets administered by OPCOM - the Centralised Market for Bilateral Electricity Contracts, Continuous Trading (CCBP - NC);
- Short-term Day Ahead Market to cover differences between the OTC forecast at the beginning of the year and the daily forecast and the Intraday Market (IP) if there are forecast changes during the day as close as possible to the time of delivery. Differences between the hourly quantities actually realised and those purchased after trading on the CBMP, DAM and IDM are cleared on the Balancing Market (BM) on the day of operation.

There are no particular elements to ensure the purchase of energy used for own technological consumption from renewable sources, trading on centralised markets in the short, medium and long term is done without advance knowledge of the distribution by energy source.

At the full year 2023 level the OTC in RET increased by 4.2% compared to 2022. Relative to the energy entering the contour the losses increased from 2.2% to 2.37%, as the energy entering the RET contour decreased by 3.1%.

For electricity purchased from DAM, IDM and BM, the producer/supplier/trader associates the national structure of primary energy sources and the annual environmental national averages of indicators, calculated and published by ANRE by 1 April each year for the previous year. In the year 2023, the structure by type of renewable primary energy sources of electricity production in Romania follows: was as

Structure of electricity generation by fuel type in 2023

Fuel type	Energy [GWh]	Installed capacity [MW]	Available power [MW]
	raw	net	
Coal	8.160,00	7.046,00	2.151,00
Hydrocarbons	9.907,00	9.434,00	2.397,21
Nuclear	11.192,00	10.294,00	1.413,00
Hydro	18.552,00	18.183,00	6.378,91
Wind	7.548,00	7.474,00	2.998,78
Biomass	352,00	347,00	133,25
Photovoltaic	1.658,00	1.641,00	1.350,95
Geothermal	0,00	0,00	0,00
Storage batteries	2.2,00	93.40	
Total	52.841,00	16.557,80	16.823,00

New technologies

The strategy at European level aims at increasing the use of renewable electricity sources in the energy mix, strengthening the position of customers and putting households and businesses at

the centre of the European energy market. The ENTSO-E Roadmap proposes the use of new technologies to meet these challenges.

Among the directions of use of new technologies are:

- 1. digitalisation;
- standardisation and data exchange;
- 3. integration of storage systems;
- increasing efficiency in the use of RET.

For Transelectrica the need to accelerate technological innovation is obvious. The development of new technologies for grid equipment and will modelling methods enable the company to fulfil its mission in an evolving energy system. This mission is shared by the Energy Regulator who encourages network operators to seek innovative solutions.

The company focuses more on technology integration than on innovation or the production of new technologies per se.

At the same time, the strategy argues that the development of smart technologies requires a significant effort to implement a large number of "smart initiatives".

According to the programmes carried out or initiated in recent years, Transelectrica's projects for the development of new technologies include:

- implementation of technologies for monitoring and controlling the network and its components;
- installing sensors and developing smart infrastructure to monitor the technical condition of critical assets;

- 3. implementation of security solutions regarding confidentiality, availability and integrity of information;
- non-destructive systems to investigate inaccessible OHL pole elements (underground anchors).
- anti-climbing protection systems complying with the requirements of the Environmental Guard. These are measures to protect birds with habitat in the vicinity of power lines;
- 6. OHL galloping mitigation systems with pendulum type elements;
- determining and using dynamically determined transmission capacity as a complementary method for more efficient use of existing infrastructure.

During 2023, new projects of interest in the use of new technologies were identified and promoted, including:

- Installations for the regulation of active power flows in order to limit congestion in the RET
- Develop the infostations application by creating a unified database with history (BDU) to be used jointly by internal entities. The BDU must contain the volume of hardware and enable interactive, collaborative applications.
- National Phasor Data System connected to International Phasor Data Exchange National Phasor Platform connected to the International Phasor Data Exchange (IPDE).

European projects which Transelectrica is a partner into

This type of projects are based on concepts or ideas from the research-innovation area and are implemented through projects financed by European funds through the European Commission's Horizon 2020, CEF axis.

CARMEN (Carpathian Modernization of Energy Network) Project of Common Interest

the National Power Grid Company "Transelectrica" - S.A., Delgaz Grid S.A. and Elektroenergien Sistemen Operator EAD, the Bulgarian Transmission and System Operator, as active Partners in the Project, will apply for Project funding in the form of a single application to be submitted under the call/calls for proposals to be launched in 2024 through the CEF.

Under the CARMEN Project, the National Power Grid Company "Transelectrica" - S.A. will benefit from non-reimbursable funds for the following Investment Objectives:

- "Optimization of voltage regulation and power quality parameters by installing FACTS equipment in Gutinaş, Suceava and Roşiori stations;
- "Modernization and increase of the transmission capacity of the 220 kV OHL: Fântânele - Ungheni, Dumbrava - Stejaru and Gutinaş -Dumbrava";
- "National Synchrophasors Platform, connected to the International Synchrophasors Data Exchange Platform (IPDE);
- "Installations for the regulation of active power flows in order to limit congestion in the RET";
- EMS SCADA module Automatic voltage and reactive power regulation system.

Positive effect expected through the achievement of the investment objective:

The main objectives of the project are to modernise and digitalise the electricity transmission and distribution network, helping to improve:

- the stability and capacity of the grid to integrate renewable energy through the modernisation of existing equipment;
- coordinated voltage regulation in transmission and distribution networks;
- quality and cost-efficiency of the services offered to customers;

- Network security and flexibility by introducing Demand Side Management technology;
- network management through data exchange and implementation of Smart Grid functionalities;
- interconnection with the transmission infrastructure by increasing the security, flexibility and quality of the distribution network in the region;
- monitoring the status of the interconnected system in real time through active and reactive power flows on both interconnection and internal lines.

The benefits anticipated from the implementation of the Project can be highlighted in three major categories:

- 1. Economic and societal benefits:
- -Reduced operating and maintenance costs;
- -Reduction of electricity losses;
 -Increasing the efficiency of services
 by implementing smart grid technologies;
 - -Increasing the degree of interconnectivity in terms of security, availability and flexibility of national and European transmission and distribution infrastructure:
 - -Increase the level of observability of the cross-border network and operational capacity at dispatcher level.
 - Benefits for customers / prosumers:
- Improving the quality indicators of the electricity network;
- Implementation of Demand Side
 Management technology to analyse
 and optimise electricity consumption;

 Increasing the capacity to capture
 energy from renewable sources,
 including energy from prosumers;
 - -Automation of the distribution network through SCADA integration and implementation of primary

voltage and reactive power regulation.

- 3. Environmental benefits:
- -Reducing emissions by modernising and digitalising the electricity transmission infrastructure;
- -Providing renewable energy take-up capacity;
- Implementing non-polluting, stateof-the-art Best Available Technologies;
 - -Increasing the long-term sustainability of the network by replacing technically worn primary equipment.

Estimated project duration : 36 months

The CARMEN project has been included in the Union's first list of Projects of Common Interest (PCI) and Projects of Mutual Interest (PMI) under the revised TEN-E Regulation (EU) No 2022/869, which was adopted by the European Commission on 28 November 2023.

Following ongoing scrutiny by the European Parliament and the Council, the list is expected to enter into force at the end of April 2024.

European research project FUTURE FLOW

Transelectrica is part of the consortium dedicated to the "FutureFlow" project coordinated by the Slovenian Transmission System Operator (ELES), within the framework of the European Commission funded programme on the implementation of a competitive pan-European market, with the achievement of the EU emission reduction targets, Horizon 2020 - "Call for competitive low-carbon energy" in the section "Transmission grid and wholesale market".

The project has an implementation period of 4 years and aims to address a number of issues in the context of the emergence of new grid codes for

balancing electricity systems and the creation of regional markets for system services.

The FutureFlow project addresses of secondary scope frequency regulation from generation to consumption and will deliver world-class performance to this specific power system activity. With this objective in mind, FutureFlow project partners are exploring new solutions for balancing the power system managing flows in the European electricity grid. The "modern" consumers addressed by the FutureFlow project will be able to increase or reduce their consumption in seconds and thus perform the control functions that are today mainly performed by traditional hydro and thermal power plants.

The project is aimed at Transmission and System Operators, traders in the electricity market and manufacturers of industrial and communication components for the electricity sector.

Among the achievements of the project to date we mention:

- Study of balancing markets at four Transmission and System Operators in terms of regulation potential, technical characteristics of controllable consumers (Demand Response - DR) and Distributed Generation (DG). Study of market adaptation for participation secondary regulation of large wind power plants and the impact of forecast errors of wind power generation secondary in the regulation market;
- Development of the overall architecture of the Future Flow (FF) platform for automatic, ioint activation of secondary the regulation reserve (aFRR) and identification of links and implications redispatching. **Analysis** controllable consumers load modification for industrial

- consumers, commercial consumers, self-generating industrial platforms, and renewables with installed capacities greater than 1 MW;
- Identification of reserves and participating entities, processes to be developed, data requirements to be exchanged for secondary
- adjustment (aFRR) and redispatching capabilities;
- Identification of requirements for interactions between FRR aggregation platforms and analysis of cybersecurity concepts in data transmission.

Research and innovation

Present and future challenges for transmission system operators (TSOs) (302-4)

The research and innovation strategy reinforces the Company's vision for the sustainable development of the national energy sector, providing the necessary support for the implementation of the priorities that are included in the RET

Development Plan, supporting the implementation of the digitalization concept.

The relevant technological trends that will together create a new reality in

energy systems are shown in the following figure:

Digitalisation

It will lead to higher volumes, quality and topicalness of information about the actual operation of the RET. This will contribute to informed decision-making, better RET planning and maintenance processes, so as to simultaneously minimise risks together with operational costs.

Solar energy

The developments of photovoltaic generating technologies will reduce the solar energy cost up to 40% in the next ten years, while the price of modules will drop more than 20% for each capacity doubling. By 2025 the photovoltaic technology will provide the cheapest electricity generation in many parts of the world.

Energy storage

For its better management in the context of technological development.

Bidirectional communications

For a better involvement of end clients into the improvement of services they benefit of.

Smart grids

Smart grids will begin to provide self-management and will include characteristics enabling self-configuration in order to manage security, safety and reduce losses; self-regulation to approach voltage variations and self-optimisation to damp disturbances. New modelling techniques will be developed for the design, testing and verification of electricity network management..

Main challenges for electricity transmission system operators from a research and innovation perspective:

Using HPC data extraction (High Performance Computing)

 Developing the information technology sector society-wide and economy-wide will also impact power systems. Passing from a supply system based on copper to one increasingly integrating information technology, data management and nodes, which also sustains cyber-security issues acquires capital significance.

Using new materials and technologies

 It is required to continue the efforts to use new materials, concepts, standards, instruments and algorithms that will process ever more information in order to address the security issue and that of power system stability.

Developing methodologies and instruments to operate the network closer to its physical limits, without endangering its security

To better manage the network closer to its physical limits.

Enhanced utilisation of renewable resources

In order to increase network flexibility.

Developments of other sectors

•• Such as accumulator batteries that have brought about new solutions and challenges in the power system and the need to extend the range of options contributing to system services.

Digitalisation of the power system

 Digitalising the power system and the cybersecurity issues associated to such developments; more active client participation on the electricity market represent challenges which the power system respond to by investments into research and innovation activities

Maintaining sysem security and stability

• TSOs will have to develop expert systems and support instruments for decision-making with a view to anticipate possible emergency circumstances, to provide early warning to system operators and suggest possible solutions with their success likelihood in real time...

Objectives of the Research and Innovation Strategy (302-4)

The research and innovation strategy reinforces the Company's vision for the modernisation of the transmission network, providing the necessary support for the implementation of the priorities contained in the Development Plan, the Management Plan and the Management Plan, supporting the implementation of the digitalisation concept.

The main directions foreseen in the "Transelectrica Research and Innovation Strategy" are:

- Innovation is the prerequisite for success in achieving the Company's vision and mission;
- II. Innovation will be promoted as a priority for the Company's core activities, bringing added value by digitalising processes, improving services and increasing personnel skills:
- III. innovative solutions, technologies, systems and concepts required for key activities will be implemented across the Company after:
 - testing and validation in *pilot* projects;
 - or their critical evaluation in projects already completed in other organisations;
- IV. Innovation will be the engine that will enable the Company to implement the Learning *Organization* concepts;
- V. Innovation and research will support "Digitalisation" as a major objective;
- VI. Research within the Company will focus on developing the following pillars:
 - international national and partnerships in basic research technological research (observation of basic principles, formulation of concepts for technologies, experimental demonstration concepts, of

- validation of technologies in laboratories);
- Partnerships with solution and equipment providers for product/technology demonstrations (technology validation in relevant environments and operational environments);
- partnerships in competitive procedures (for delivery and commissioning of products and solutions).
- VII. personnel participation in events with an important innovation and research component both nationally and internationally (e.g. ENTSO-E, CIGRE, congresses, round tables, symposia, etc.) will also include the development of knowledge sharing and spreading of best practices within the Company in an integrated and regulated way;
- VIII. the structuring of general and specific objectives will be done in relation to the methodology promoted in the ENTSO-E strategy in the field of research and innovation;
- IX. the research and innovation strategy within the Company will follow the centralised organisational model (steering committee, strategy manager, process procedures, well-defined roles, objective-based management);
- X. funding of research and innovation work will be ensured as a priority both from own and other sources reaching the most consistent group of European network operators (e.g. grant programmes, subsidies, grants, partnerships, etc.).

The objectives contained in the "Research and Innovation Strategy" add value in the following areas:

- the Company's strategic vision;
- asset management;
- improving performance indicators (KPIs);
- developing essential capabilities in network operation;
- to seize opportunities to improve the Company's performance;
- skills development for Company personnel;
- maintenance and operation;
- developing partnerships with technology and solution owners.

The research and innovation strategy also ensures that the vision of all stakeholders to implement a flexible, open and interoperable infrastructure in a digital portfolio where traditional, mainly manual processes are eliminated or digitalised so that information is accessible in real time is operationalised.

Digital transformation in the energy industry will bring new challenges for management teams, operational specialists and the Company's partners. The company is well placed to become a "Learning Organisation" if it fully utilises the potential of new technologies in achieving digital transformation.

To support these objectives, the Digital Transformation Concept Implementation Programme (2018-2027) has been approved and implemented.

The actions and activities included in the Digital Transformation portfolio of initiatives aim to increase the Company's performance by:

- innovation in operational and managerial processes;
- innovation through the introduction of digital technologies;
- innovation by introducing new concepts that will transform the company's business model;

 developing the Company's strategic capabilities (e.g. people, strategic assets, structure, processes, etc.).

The strategy argues that Grid Digitalisation is a clear opportunity for efficient development and effective management of the energy system, with proven cost-effectiveness in terms of improved service quality and operating costs.

The following tactical documents in the field of digitalisation are in place:

Part I: "Technical policy on the digitalisation of assets in the framework of modernisation initiatives within Transelectrica":

Part II - Concept: "Technical policy on asset digitalization in the framework of modernization initiatives within NPG CO. Transelectrica SA;

"Geographic Information System and Outage Management System";

Part III Concept - "Digital Technology Testing and Personal Skills Development Lab";

Part IV - Concept "RET Asset Health Centre.

The pilot projects that will test the innovative concepts and technologies proposed by the strategic documents approved at Company level are those started under the acronym DigiTEL.

The objectives foreseen to be implemented in the DigiTEL flagship projects relate to the following targets:

- implementation, testing and validation in modernisation projects of the following concepts, methodologies, standards and elements of good practice:
 - the concept of online monitoring of the technical condition of the Company's critical assets (e.g. transformer units, power lines, etc.);
 - o asset management;
 - digital technology testing lab and personal skills development;
 - o RET asset health centre;

- GIS and WHO systems concept;
- the concept of active health;
- the concept of risk index on RET assets:
- methodology for developing and implementing Smart Grid concepts (e.g. architectures, interoperability standards, telecommunication standards, customer interfaces, etc.);
- E-learning concept;
- Smart Building concept;
- the concept of augmented/virtual reality.
- training and certification of personnel to develop strategic capabilities in the field of digitalisation;
- definition and implementation of projects with a strong innovation and learning component (e.g. digital station projects, IT&C infrastructure modernisation projects, asset management platform, environmental impact equipment, etc.);
- continue to participate in grantfunded projects to prepare the conditions for the adoption of new models, concepts and methodologies in the operational or enterprise area of the Company;
 - further develop partnerships with consultants and solution and service providers to understand new technological and managerial trends that may influence the future performance of the Company.

Portfolio of innovative digitalisation projects, under the acronym DigiTEL:

DigiTEL Pilot Project - "Upgrading the 220/110/20 kV Alba Iulia station to a digital station concept"

Within the investment objective "Pilot Project - Upgrading the 220/110/20 kV Alba Iulia station to a digital station

concept" the following objects were defined:

Object 1 - Refurbishment of Alba Iulia station

Object 1.1. Electricity station Alba Iulia

The 220 kV station will be an outdoor, air-insulated, conventional equipment type, located on the disused area of the existing 220 kV station.

The 110 kV station will be an indoor type, with SF6 insulation, located on the decommissioned surface of the current 110 kV station.

The 20kV station will be located in two containers

Within the "Pilot Project - Retrofitting of 220/110/20 kV Alba Iulia station in digital station concept", the "Condition Monitoring System (CMS)" will implemented in accordance with the Smart Grid reference architecture for asset management at Alba Iulia station, the role of this module is to monitor the "technical condition status" of the equipment at Alba Iulia station, in order to detect failures in advance, with the aim of extending their lifetime. The Condition Monitoring System provides data to the active Health Care Center at STT Sibiu.

The new building of the control block will be a ground floor + 1 storey construction, designed in the concept of a passive and intelligent house.

The 220/110/20 kV Alba Iulia station will be equipped with the Integrated Safety System.

Object 1.2 Related systems

This project object is composed of the following systems:

-GIS (Geographic Information System);

-Photovoltaic system;

-Active Health Centre.

The "GIS (Geographic Information System)" application platform/SW and the

"OMS (Outage Management System)" application platform/SW will be installed on the HW and SW infrastructure specified for the "laaS Private Cloud HW&SW Extension".

Object 1.3 HW&SW Private Cloud Extension

In view of the implementation of this project, the existing laaS private HW&SW Cloud will be extended to cover the basic HW and SW data processing and storage needs, mainly dedicated to the following IT applications at NPG CO. Transelectrica/STT Sibiu level.

Object 2 - E-Mobility

In this project, the following components of the E-Mobility system will be purchased: electric car charging stations, central lockers with related equipment for data acquisition from the charging stations and the charging station management platform.

system The equipment to delivered will be based on digital technology, will be high-performance and will make up a complete system. The hardware equipment of the system will be placed in dedicated cabinets in the following locations: 220/110/20 kV Alba Iulia Station, STT Sibiu Head Office, respectively CTSI Sibiu (common premises with 400/220/110/20 kV Sibiu South Station). At CTSI Sibiu will be located the E-Mobility platform that will manage all the charging stations managed by STT Sibiu.

Object 3 - Learning Platform

The "Learning Platform" within the Pilot Project - Upgrading the 220/110/20 kV Alba Iulia station in the concept of a digital station will serve the personnel of NPG CO. Transelectrica - STT Sibiu and the "Digital Laboratory".

Object 4 - Telecommunications with Hidroelectrica

This chapter presents the telecommunications solution for the Alba Iulia - Gâlceag and Alba Iulia - Şugag overhead power lines (AEL), managed by NPG CO. Transelectrica SA. The Gâlceag and Şugag stations are managed by HIDROELECTRICA.

Object 5 - Digital Lab

The Digital Laboratory, part of the investment objective "Pilot Project - Retrofitting the 220/110/20 kV Alba Iulia station in the concept of a digital station" will be located in a building provided by the Faculty of Energetics of the Politehnica University of Bucharest and has the following objectives:

- -the realization of a laboratory with new digital technologies, which will be used both for the training of the National Power Grid Company Transelectrica SA personnel and for the training of students from Politehnica University Bucharest.;
- -integration of VR, AR or Digital Twin technologies in the learning and/or training process, with the aim of subsequent large-scale introduction in as many entities belonging to the National Power Grid Company Transelectrica SA as possible.

Objectives expected to be achieved: General objectives:

- GC1 Increasing the operational reliability of the National Energy System;
- GL 2 Standardisation of RET asset monitoring solutions;
- GL3 Ensure interoperability between the operational and organisational level;
- GL 4 Implementation of asset management standards requirements;
- GL 5 Increase operational performance.

Specific objectives:

OSp 1 - Digitalisation of information needed for management decisions;

OSp 2 - Replacement of all primary and secondary equipment;

SOp 3 - Implementation of the concepts of "Health Index" and "Risk Index":

OSp 4 - Application of Smart Grid standards;

OSp 5 - Implementation of the Performance Testing and Validation Laboratory for digital equipment and technologies, in collaboration with the Politehnica University of Bucharest;

OSp 6 - Optimization of the lifetime expenses of the monitored assets by implementing the NPG CO. Transelectrica SA Active Health Centre concept at the UTT Sibiu level:

OSp 7 - Implementation of the digital building concept;

OSp 8 - Optimising CO2 consumption by implementing the E-Mobility concept;

OSp 9 - Implementation of Geographic Information System (GIS) and Outage Management System (OMS) concepts at UTT Sibiu;

OSp 10 - Optimization of training activities at UTT Sibiu level by implementing the Learning Platform concept.

The positive effect expected through the achievement of the investment objective, specifically the improvement of the operational safety of the facilities through actions aimed at:

- Optimisation of the primary electrical scheme;
- upgrading primary and secondary energy equipment;
- ensuring remote control of the entire station from the central and territorial dispatching centres;
- Improving personnel security;

- increase the quality of electricity transmission service;
- improving services for users of the electricity transmission network;
- lower operating and maintenance costs:
- improving the energy performance of the station:
- improving the operational capabilities needed to implement standards associated with asset management and smart grids;
- improving response times in identifying and remedying nonconformities that have occurred;
- improving the management of risks associated with the operation and maintenance of the station;
- reducing environmental impact through the use of modern equipment and technology;
- developing specific skills needed to digitalise processes.

The investment will take 62 months to complete (18 months SF+CS / 44 months turnkey contract).

DigiTEL Pilot Project - "Upgrading of 220/110/20 kV Alba Iulia station to digital station concept" is in the stage of public procurement procedure for "Design and execution" (design services, equipment supply, works execution).

DigiTEL Green pilot project - "Upgrading the 220/110/20 kV Mostistea station to a digital and low environmental impact concept"

The pilot project "DigiTEL Green - Upgrading the 220/110/20 kV Mostistea station to a digital and low environmental impact station" is a flagship project for the Company in the field of digital and sustainable power stations.

It brings together the same set of digital technologies that will be

implemented through the Alba Iulia digital station pilot project and will extend the infrastructure created through it.

Through the Mostistea project, non-SF6 technology will be implemented for the first time in the RET at the primary switchgear level, using 99% lower emission gases than conventional technologies. At the same time, both the transformer units will use natural oils instead of mineral oils and the station buildings will be energy-efficient nZEB. This retrofit will also follow the principles of the circular economy concept throughout the entire implementation chain to support its sustainability.

In addition to the technologies associated with the digital and sustainable station concepts, the Mostistea project will also implement for the first time in the RET robotic technical assistance and supervision technologies, using Artificial Intelligence systems through physical robots and drones.

The main objectives expected to be achieved through the implementation of this project include:

General objectives:

- GL 1 increasing the operational reliability of the National Energy System;
- GL 2 standardisation of RET asset monitoring solutions;
- GL 3 ensuring interoperability between the operational and organisational level;
- GL 4 implementation of asset management standards requirements;
- GL 5 increasing operational performance.
- GL 6 Implementing the concept of sustainability in the field of power stations;
- GL 7 Implementation of agreed EU environmental policies.

Specific objectives:

OSp 1 - digitalisation of information needed for management decisions;

- PSO 2 implementation of the "Health Index" concept;
- OSp 3 implementation of the "Risk Index" concept;
- OSp 4 implementation of the concept "Statistical determination of lifetime";
- OSp 5 application of Smart Grid and Asset Management (ISO 55000) standards;
- SOp 6 Improve personnel performance in making decisions related to the operation, maintenance, upgrading or replacement of assets;
- OSp 7 optimising expenditure over the lifetime of the monitored asset:
- OSp 8 Implementation of the concept of advanced digital design both in the DigiTEL Smart Lab and in the organisational entity responsible for design within the Company;
- OSp 9 Critical analysis of the solutions of the pilot project "Retrofitting of the 220/110/20 kV Alba Iulia power station in the concept of a digital station" and their extension or upgrade within the Mostistea station retrofitting project;
- OSp 10 Adoption of innovative concepts related to the reduction of environmental impact associated with technologies, equipment, solutions used in the project;
- OSp 11 Introduction of robotic assistance solutions in the act of supervision and control in installations;
- OSp 12 Implementation of the "Control Room of the Future" concept at Mostistea station and "DigiTEL Smart Lab";
- OSp 13 Implementation of the advanced digital design concept in the digital lab and at the contracting entity;
- OSp 14 Implementation of the BIM (Building Information Modelling) concept at the Mostistea station, the digital laboratory and the contracting entity;

Osp 15 - Adopting international best practices in the operationalisation of the Industry 4.0 concept.

The duration of the investment is 48 months (15 months SF+CS / 7 months tender organisation / 26 months turnkey contract).

The pilot project "DigiTEL Green - Refurbishment of the 220/110/20 kV Mostistea station in the concept of a digital station with reduced environmental impact" is in the public procurement stage for design services SF + CS (tender analysis stage).

Pilot project - DigiTEL 3D LineVision (Lidar scanning of TEL targets).

The project aims to test new LiDAR (Light Detection and Ranging), RGB (Red, Green, Blue) and infrared technologies and to evaluate the benefits of these technologies in case of a large-scale application in the Electricity Transmission Grid.

General objectives:

- testing new technologies, understanding and adopting geospatial standards;
- increase safety by limiting human intervention;
- ensuring scalability by managing more assets with fewer technicians;
- reducing or eliminating downtime;
- testing and validating technologies in real operational environments;
- · training and personnel development.

Specific Objectives:

Testing new LiDAR (Light Detection and Ranging) and RGB (Red, Green, Blue) technologies and assessing the benefits of these technologies for the Power Transmission Grid:

 220 kV Mintia - Timisoara line: poles 367 - 386;

- 220 kV Reşiţa Timişoara line: poles 17 - 42;
- 220 kV Timişoara Arad/Timişoara -Săcălaz: poles 1 - 40 - double circuit area up to the Săcălaz connection;
- 220/110 kV Hasdat station;
- 400 kV Cernavodă Stâlpu line: pylons 19 - 22 - Danube crossing and pylons 57 - 60 - Borcea arm crossing, (Danube crossing portion.

The main potential benefits of this technology are:

- reduce inspection time by up to 90%;
- reduce the cost of aerial inspections by up to 90%;
- increase safety by limiting human intervention;
- increase the efficiency of aerial inspections by covering a larger area compared to traditional ground methods.

Other benefits:

- training and further training of Transelectrica personnel on the operation of flight means;
- training and further training of Transelectrica personnel in the management and operation of spatial data;
- Transelectrica technical support on the adoption of standards, methodologies and best practice guidelines in the field of aerial inspections.

The implementation period of the Pilot Project is 48 months (06.10.2021-06.10.2025).

DigiTEL - 3D LineVision is a project run by our own forces.

The "DigiTEL - 3D LineVision" pilot project is ongoing. Scans are currently being carried out on the OHLs concerned by this project.

Pilot project "DigiTEL Smart Vision" - "Increasing safety in operation and maintenance activities at Domnești station through the use of digital technologies".

The DigiTEL - Smart Vision - Increasing safety in operation and maintenance activities at Domnești station using digital technologies pilot project aims to implement Augmented Reality, Virtual Reality and Digital Twin technologies at RET level, for the first time in a real operating environment on the whole set of equipment and installations of a power station.

The implementation of an Augmented Reality system in the 400/110/20 kV Domnesti station will lead to a reduction in the risk of human error through constant assistance in operation of equipment and installations. Such a system will include a database that will allow a simple scanning with a tablet of a sub-assembly (e.g. transformer unit, primary equipment, secondary equipment) in the station to provide real-time information about its status, a history of events, supporting documents, reports, graphs, 3D digital twin (3D virtual tour) but also suggestions on actions to be taken to maintain a high level of "health" for it.

By using the system it is possible to perform all these actions, and additionally the possibility of technical assistance by a remote expert who can support the operational work of the personnel on site.

General objectives:

- GL 1 training and preparation of operational personnel on how to carry out certain operations;
- OG 2 remote expert-assisted operation possible.
- GL 3 Ensuring high availability of assets in the CRR

Specific objectives:

- OSp 1 quick access to information and technical characteristics of equipment and facilities:
- OSp 2 augmented visualisation of equipment and installations at power stations:
- OSp 3 collection of all equipment and installation information in a single database with quick access to maintenance and operation procedures;
- OSp 4 easy access with smart devices;
- OSp 5 developing remote technical assistance skills for experts.

The main benefits expected to be achieved through the implementation of this project include:

- decrease the risk of human error in equipment operation;
- streamlining the work process of operational personnel;
- increasing digital skills for personnel;
- decrease the time needed to investigate the technical condition of assets.
- Easy accessibility from your smartphone, tablet, laptop or smart glasses to the documentation required for the activity (procedures/technical instructions) as well as reports and graphs automatically provided by the AR system;
- on-site training of personnel involved in operational activities;
- filling in reports and registers directly in the AR system on the spot;
- improving the learning process of specific activities in the power station.

The duration of the investment is 9 months (3 months PTE design / 6 months execution).

The pilot project "DigiTEL - Smart Vision" - Increasing safety in operation and

maintenance activities at Domneşti station through the use of digital technologies is in the implementation stage.

DigiTEL Power Lines of the Future Pilot Project - "Transition of 400 kV Isaccea - Tulcea West OHL from single circuit to double circuit"

The DigiTEL Power Lines of the Future project will upgrade the 400 kV Isaccea - Tulcea West OHL from single to double circuit using tubular poles. At the design stage, the technical requirements for the poles will be established so that they are optimised in terms of size and footprint, and have an innovative design, sustainable materials with a low carbon footprint, innovative visual design.

The construction of the new double circuit lines of the 400 kV Isaccea - Tulcea West OHL will be carried out using the existing locations of the poles related to the single circuit line, without the need to occupy additional land areas on most of the line.

The project will test and validate state-of-the-art technologies in RET:

- Autonomous surveillance of OHLs using drones;
- OHL monitoring systems;
- Equipping TEL personnel (design, operation and research-innovation) with advanced equipment and devices for technical condition determination;
- Advanced learning solutions for personnel by enhancing DigiTEL Lab's existing E-learning learning platform.

General objectives, expected to be achieved:

OG1. Increase transfer capacity to integrate renewable energy production in the Dobrogea area;

- OG2. Ensure high availability of assets in the RET;
- OG3. Strengthening the RET and increasing its operational efficiency;
- OG4. Increased flexibility in operation;
- OG5. Training of personnel simultaneously with actions to modernise/introduce new technologies;

OG6. Increase the observability of the OHL technical condition through the use of autonomous drones.

Positive effect expected through the achievement of the investment objective:

- Increased network throughput;
- Digitalise network elements through intelligent monitoring;
- Develop the existing design capabilities of the Company.

The design, testing, approval and installation of tubular poles will bring the following benefits:

- Low environmental impact;
- Reduction of occupied land areas:
- Long lifespan (over 70 years);
- · Reduced maintenance in operation;
- Low carbon footprint through sustainable manufacturing processes and materials;
- Short installation times of infrastructure in case of disasters;
- Reducing vandalism, etc.

The duration of the investment is 50 months (12 months SF+CS / 8 months tender organisation, 30 months turnkey contract).

The project is at the stage of drafting the design brief and specifications for the procurement of design services.

DigiTEL Smart Lines Project -"Optimization of the operation of the existing 400 kV OHLs in the SEN, used in interconnection and for evacuation from the power Cernavodă nuclear power plant and renewable energy plants Dobrogea, by installing on-line monitoring systems (Smart Grid type)"

The DigiTEL Smart Lines project aims at the acquisition and installation of on-line monitoring systems in order to increase the operational reliability of the OHL, which will be achieved through the on-line diagnosis and assessment of the technical condition of overhead power lines based on the data acquired on-line and the operationalization of the Dynamic Line Rating (DLR) concept.

The objective of the DLR (Dynamic Rating) is to provide the System Operator with accurate and real-time information that will allow better use of the OHL's transmission capacity and increase it according to current weather conditions, reduce risk and increase its reliability and efficiency in operation.

The project consists of 23 overhead 400 kV power lines, of which 13 are transmission and power evacuation lines from Cernavodă and the renewable energy plants to the Moldavia area and Bucharest and 10 interconnection lines.

Objectives expected to be achieved : General objectives:

GL 1 - Ensure high availability of assets in the RET;

GL 2 - Increasing flexibility in operation;

GL 3 - Achieving cost optimisation. Specific objectives:

OSp 1 - Digitalisation of information needed for management decisions;

OSp 2 - Application of Smart Grid standards;

OSp 3 - Improve personnel performance in making decisions related to the operation, maintenance, upgrading or replacement of assets;

OSp 4 - Optimising expenditure over the lifetime of the monitored asset;

PSO 5 - Implementation of the "Health Index" concept;

PSO 6 - Implementation of the "Risk Index" concept;

OSp 7 - Implementation of the concept "Statistical determination of lifetime".

Positive effect expected through the achievement of the investment objective:

- Obtain real-time data on OHL operating and status parameters;
- Correlation between the actual OHL load rating, projected load capacity and weather conditions;
- Provide advance warning in case of operating problems near or above the permissible limits (traction forces near limit, conductor sag above permissible limit, alarming gallop);
- Fast reaction time for unforeseen situations and increased weather capability;

Eliminate unnecessary and often risky interventions;

Minimal interruptions in RET;

Creation of a database to assess the technical condition and technical lifetime of the OHL;

Alignment with the latest regulations on the reliability of electricity transmission facilities to improve the operation of existing RETs, increase reliability and safety of the NES.

Other advantages of installing online monitoring equipment using DLR are:

Increased OHL transmission capacity (with maximum applicability especially on interconnecting lines);

Avoiding costs related to OHL reinforcements (reconductoring, pole replacements, new lines, etc.);

Postponement of some modernisation works;

Avoiding congestion costs;

Increasing social welfare through access to cheaper energy;

Improved visibility on OHL operation and risks.

The project implementation period is 28 months.

The project is currently at the execution stage, with the monitoring system to be installed on the first OHL.

DigiTEL Trafo Expert Project "Purchase and installation of 21
integrated monitoring systems for
transformer units in NPG CO.
Transelectrica SA stations"

The DigiTEL Trafo Expert project contributes to the following objectives:

General objectives:

GL 1 - Ensure high availability of assets in the RET;

GL 2 - Increasing flexibility in operation;

GL 3 - Achieving cost optimisation. Specific objectives:

SPO 1 - Increased capacity to respond to events with a particular impact on the security and functioning of the RET;

OSp 2 - Increase the time scheduled for the execution of some of the preventive maintenance works at the monitored transformer units and reduce the costs per type of intervention;

OSp 3 - Reducing the number of incidents by data-driven anticipation of normal scheme vulnerability.

Benefits resulting from the implementation of the project:

- increase the time scheduled for the execution of some of the preventive maintenance works at the monitored transformer units and reduce the costs per type of intervention;
- reducing the number of incidents by anticipating based on real data the vulnerabilities of the normal scheme;
- contribution to keeping in operation the monitored transformer units with expired normal operating life;
- reduce the cost of undelivered energy due to the decommissioning of monitored power transformers for maintenance or replacement;
- Data acquisition in the monitoring process allows the implementation of a totally redundant data acquisition structure, with major implications on the verification and elimination of erroneous data and decisions based on it.

The project implementation period is 42 months.

Phase I of the project has been completed, Phase II is currently being implemented and Phase III is to be implemented.

DigiTEL Next-Gen Power Grid "Optimization of operation activities
in NPG CO. Transelectrica SA
stations using Digital Twin
technology and autonomous
drones"

The DigiTEL Next-Gen Power Grid project aims in the first phase to transform unstructured information into an intelligent digital asset. The system operator will be able to visualise, build and manage complex power systems, ensuring safe

and efficient operation throughout their lifecycle.

Autonomous drones will be purchased for aerial inspections equipment in the power stations managed by the Company, which will allow the identification of potential non-conformities such as wear and tear, damaged components or uncontrolled growth of vegetation. They will navigate through complex terrain and reach places that are difficult for human operators to access, significantly reducing the time and resources required for regular inspections by operational personnel.

Compared to traditional inspection approaches that may involve the use of helicopters, autonomous drones have a lower environmental impact, are more energy efficient and generate fewer emissions.

Objectives expected to be achieved: General objectives:

- OG1 Training and coaching of operational personnel on digital design, drone operation and Digital Twin use;
- GL 2 Standardisation of RET asset monitoring solutions;
- GL 3 Ensure high availability of assets in the RET;

Specific objectives:

- OSp.1 Quick access to information and technical features of equipment and installations using smart devices;
- OSp.2 Augmented view of component sub-assemblies inside equipment and facilities;
- OSp.3 Collection of all equipment and facility information in a single database with quick access to maintenance and operation procedures;
- OSp.4 Development of remote technical assistance skills by experts;
- OSp.5 Improving the day-to-day supervision of the station;
- OSp.6 Digitalisation of information needed for management decisions;

OSp.7 - Improve personnel performance in making decisions related to maintenance, upgrading or replacement of assets.

Positive effect expected through the achievement of the investment objective:

- Extending equipment life through the use of sensors and IoT (Internet of Things) technology;
- Optimise the maintenance process by efficiently collecting data on the condition of electrical equipment;
- Reduced risk to operational personnel involved in day-to-day station supervision;
- Reducing human error by conducting aerial inspection using autonomous drones;
- Lower environmental impact as drones are more energy efficient compared to traditional aerial inspection methods;
- Continuous adaptation to changes in the condition and structure of the equipment with Digital Twin;
- Safe and efficient operation throughout the lifecycle of complex electrical systems by managing and operating them in a dedicated Digital Twin platform.

The project implementation period is 24 months.

At the moment, the project is at the stage of drafting the specifications for the procurement of design services, equipment supply, works execution.

Collaboration agreements:

Research & Innovation collaboration agreement "DigiTEL - Advanced 3D Station Design"

The purpose of the agreement is the collaboration between NPG CO.

Transelectrica SA and Entegra GMBH (Primtech 3D), with the main goal of testing new Digital Twin and Advanced Digital Design technologies for power stations, as well as evaluating the benefits of these technologies and solutions in case of large-scale application in the Romanian Transmission Grid.

The implementation of the Project creates mutual benefits for both partners, such as:

- increase operational safety by limiting human intervention;
- · ensuring scalability of solutions;
- · reducing or eliminating downtime;
- completing databases by digitalising and 3D modelling of assets;
- sharing information jointly to improve the operation, inspection and design of facilities;
- testing of Digital Twin platforms with real-world applicability;
- exchange knowledge through technical visits to learn about new innovative technologies applicable to power stations;
- the possibility to develop a reliable basis for future POCs (Proof of Concept projects);
- training and further training of Transelectrica personnel on the operation of Digital Twin and Advanced 3D Digital Design solutions:
- technical support in the adoption of standards, methodologies and best practice guidelines in the field of Digital Twin and Advanced 3D Digital Design;
- Organising presentation sessions from the portfolio of projects and solutions in the field of research and innovation at partners' premises;
- the opportunity to present both the advantages of Digital Twin, Virtual Reality and Advanced 3D Digital Design solutions and the working

method applied for use in operation, and the results obtained in conventions, scientific symposia, scientific articles and publications (CIGRE, IEEE, etc.).

Research and Innovation Collaboration Agreement "DigiTEL 3D Line Vision"

The object of this agreement is the collaboration between NPG CO. Transelectrica SA and Skyline Drones SRL in order to test new LiDAR (Light Detection Ranging), RGB (Red, Green, Blue) and infrared technologies, and to evaluate the benefits of these technologies in case of a large-scale application in the Electric Transmission Grid.

The implementation of the project brings mutual benefits to the partners, such as:

- reduce inspection time by up to 90%;
- increase safety by limiting human intervention;
- ensuring scalability by managing more assets with fewer technicians;
- increase efficiency by covering a larger area compared to traditional land-based methods;
- completing the overview of the condition of the scanned items;
- identification of intrusive vegetation, illegal constructions, etc.;
- the opportunity to present both the advantages of the equipment, sensors and working method applied for OHL inspections and the results obtained in scientific conventions and symposia, scientific articles and publications;
- Joint sharing of information to improve the inspection procedure, workflow and final report in relation to OHLs and component elements of interest;

- testing state-of-the-art aerial scanning equipment on significant OHL segments with real-world applications;
- the possibility to participate in other projects developed by Transelectrica S.A.;
- technical support in the adoption of standards, methodologies and best practice guidelines from
- the field of aerial inspections;
- training and further training of Transelectrica personnel on the operation of flight assets and the management and operation of geospatial data.

DigiTEL BIM Tools Research and Innovation Collaboration Agreement

The research and innovation collaboration agreement between NPG CO. Transelectrica SA and TIAB SA aims to test and validate advanced technical innovations in digital design (e.g. BIM - Building Information Modelling) and digital twin standards for power stations, and to evaluate the benefits of these technologies and solutions in case of large-scale application in the Electricity Transmission Grid.

The implementation of BIM, digital twin, virtual and augmented reality standards, concepts and methodologies creates mutual benefits for both partners, such as:

- Improved operational efficiency compared to traditional operating methods;
- increase operational safety by limiting human intervention;
- ensuring scalability of solutions by managing multiple assets with a reduced number of operators;
- reducing or optimising the downtime of electricity transmission services;

- completing the databases by digitalising and 3D modelling RET assets;
- generating a three-dimensional model of the energy infrastructure, including information on equipment, installations and electricity networks;
- Shared sharing of information to improve the operation, inspection and design of facilities;
- the possibility to develop a reliable basis for future POCs (Proof of Concept projects);
- Training and development of Transelectrica personnel on the operation of augmented reality/virtual reality, Digital Twin and BIM solutions;
- active involvement in evaluating and confirming the effectiveness of digital technologies related to energy systems, which will subsequently be integrated into the modernisation and expansion projects of the power stations in the Company's portfolio.

Research & Innovation collaboration agreement "DigiTEL - Asset Test"

The agreement involves collaboration between NPG CO. Transelectrica SA and Omicron GMBH (FirstTech) and its main purpose is to test new verification technologies and asset management solutions and exchange know-how.

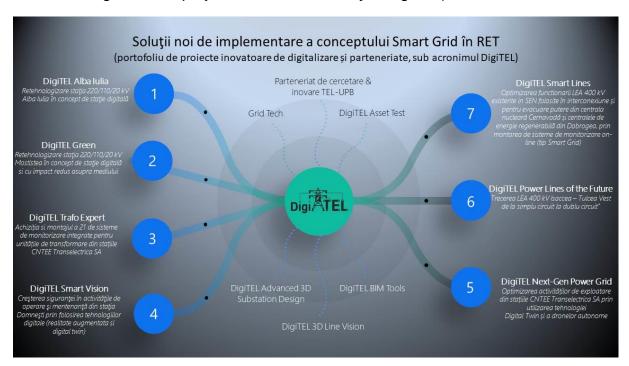
The agreement will generate a number of important benefits for the level of knowledge of testing solutions for new energy equipment verification technologies and new energy asset management solutions, as well as the exchange of know-how.

The benefits anticipated through project implementation can be highlighted as follows:

- increase safety through the use of modern technologies for testing and validating the technical condition of primary and secondary equipment in power stations;
- optimising downtime;
- gain knowledge in the use of modern test kits and in the management of the data provided by them;
- improving operating, inspection and design procedures for installations, based on experience gained;
- obtaining data/ information/ documents that support the

- Company's Research and Innovation objectives.
- Real-world validation of primary and secondary equipment test solutions in power stations;
- training and further training of Transelectrica personnel on the operation of primary and secondary equipment test kits;
- technical support in the adoption of standards, methodologies and best practice guidelines in the field of technical condition assessment of primary and secondary equipment in power stations.

New solutions for implementing the Smart Grid concept in RET (portfolio of innovative digitalisation projects, under the acronym DigiTEL)



Asset management challenges at the Transmission System Operator (TSO)

Transelectrica's SMART GRID policy assumes objectives and targets for a 10-year period (2018-2027) and supports Transelectrica's Asset Management Strategy.

From a Smart Grid perspective, asset management will enable important developments in the following areas:

 network planning (new asset management methods will enable efficient network planning by increasing infrastructure enabling the condition of network assets to be monitored, allowing a more efficient maintenance and development programme);

- network operation (dynamic asset management tools will enable proactive measures to improve network security and resilience. Monitoring the status of network assets enables network operators to fully utilise the capacity in the assets, increasing network flexibility and continuity);
- socio-economic impact (asset management innovation can improve network development by balancing different aspects of risk related to the operation of systems and can help reduce system failures).

The operationalization of the concepts will be achieved through the Technical Policy on Asset Digitalization in Modernization Initiatives that will be

applied by the Company's entities and design service providers:

- in the case of the implementation of Company's **RET** the asset development projects that promote the full digital station concept or partially the digital station concept (concepts that support the Company's digital transformation processes).
- for the preparation of design documentation by the company, the design service provider or the contractor.

The pilot projects that will test the innovative concepts and technologies proposed by the strategic documents approved at Company level are those started under the acronym DigiTEL.

Participation as representatives of NPG CO. Transelectrica SA in committees and working groups within ENTSO-E

On behalf of NPG CO. Transelectrica SA - DTEETN there are representatives with permanent activity in the RDIC - Research, Development and Innovation Committee (ENTSO-E). The role of RDIC and its working groups is:

- To ensure that the interests of the TSO in R&D are properly addressed to relevant stakeholders:
- To facilitate research and development between TSOs
- Provide comprehensive support and a mutually built vision for the research and development activities of ENTSO-E committees and other stakeholders
- Promote the research and development concepts, methods and technologies that will make up and drive energy systems in the future

- Support activities related to standardisation and interoperability.
 There are also 6 working groups within the RDIC with members from Transelectrica:
 - WG1 Assets and Technologies;
 - WG2 Security and System operation of tomorrow;
 - WG3 Flexibility and Markets;
 - WG4 Future of energy systems;
 - WG5 Digital & Communication;
 - Research, Development and Innovation Planning

In 2023, various workshops were held with topics of interest and high degree of novelty in which Transelectrica representatives also participated.

Benefits of applying Smart Grid concepts and standards (302-5)

The benefits of applying Smart Grid concepts and standards to support efficient asset management:

- improving financial performance;
- investment and asset maintenance decisions are well consolidated:
- risk management related to the operation of energy systems;
- improved services and results;
- increase operational efficiency and effectiveness:
- extending the lifetime of assets.

Regular preventive maintenance actions based on asset reliability will

support grid operators' decisions to improve the overall flexibility of energy systems, contributing to a higher level of integration of energy sources.

Improving risk management in transmission networks requires the implementation of predictive maintenance policies based on more accurate estimates of asset lifetime.

Real-time monitoring of power flows in networks and the status (condition) of network assets can contribute significantly to asset management decisions (maintenance, upgrade, replacement).

EU taxonomy related to Transelectrica's activity under the Taxonomy Regulation (EU) 2022/852

Introduction

In 2018, the European Commission published the "Action Plan: financing

sustainable growth", launching an ambitious and comprehensive strategy on

sustainable finance. Sustainability and the transition to a secure, climate-neutral, climate-resilient, resource-efficient and circular economy are key to ensuring the long-term competitiveness of the EU economy.

The Commission has therefore set out measures to achieve the following objectives: redirecting capital towards sustainable investment to achieve and sustainable inclusive growth, managing financial risks arising from climate change, resource depletion, environmental degradation and social issues, and promoting transparency and a long-term vision for financial and economic activity.

its Communication In of 11 December 2019, entitled The European Green Deal, the European Commission committed to review the provisions on nonfinancial reporting in Directive 2013/34/EU of the European Parliament and of the Council. Its aim is to transform the Union into a modern, resource-efficient and economy competitive with net greenhouse gas (GHG) emissions by 2050.

The climate and energy targets that the EU has set itself for 2030 and 2050 to implement the European Green Deal also require the involvement of the private sector in order to direct investment towards sustainable projects and activities.

In this context, the provision of relevant, comparable and reliable nonfinancial information is a key element in managing the transition to a sustainable global economy that combines long-term profitability with social iustice and environmental protection. Users' information needs have grown significantly in recent years and are likely to continue to grow. One of the main reasons for this is the increasing level of awareness among investors that sustainability issues can jeopardise the financial performance Thus, companies. non-financial disclosure helps to measure, monitor and manage the performance of companies and their impact on them.

The most important trend in the capital markets in recent years is the prioritisation and development of green and sustainable assets. With this in mind, the European institutions have introduced a taxonomy of economic activities that can be considered "sustainable", i.e. potentially able to contribute to the achievement of pre-established environmental objectives.

In recent years, the European Commission has therefore adopted a number of pieces of legislation in an effort to address both climate change and other sustainability challenges. The new legislative changes require greater transparency from companies on their sustainability impacts and how they manage related risks.

Establishing the regulatory framework for sustainability



1. Taxonomy Regulation - Regulation (EU) 2020/852 establishing a framework to facilitate sustainable investment and amending Regulation (EU) 2019/2088 (Regulation (EU) 2020/852, Taxonomy Regulation)

The need for uniform criteria for reporting on economic activities that can be considered environmentally sustainable, criteria that ensure greater transparency and consistency in the classification of these activities and limit the risk of environmental misinformation, led to the adoption in 2020 of Regulation (EU) 2020/852¹.

Thus, Regulation (EU) 2020/852 aims to provide investors, businesses and public organisations with reliable common criteria and methods for identifying sustainable economic activities. In addition, it allows quantification of the extent to which individual company activities adhere to and contribute to pre-

determined objectives, thus ensuring greater transparency for all stakeholders.

The Taxonomy Regulation establishes a common classification system to help define environmentally sustainable economic activities.

According to Regulation (EU) 2020/852, an economic activity can be defined as "environmentally sustainable" if:

- meets the technical monitoring criteria defined, on a scientific basis, for each activity. Compliance with the technical monitoring criteria ensures that an activity:
- contributes substantially to the achievement of at least one of the six environmental objectives;
- does not significantly harm (DNSH) any of the other five environmental objectives;
- respects minimum safeguards, recognising the importance of human rights and the international rights and standards set out in: the Organisation for Economic Cooperation and Development (OECD) Guidelines for

-

¹ Transposed into national law by OMFP no. 1239/2021 amending and supplementing the accounting regulations applicable to economic operators.

Multinational Enterprises, the United Nations (UN) Guiding Principles on Business and Human Rights and the International Labour Organisation (ILO) core conventions.

Therefore, companies subject to the non-financial reporting requirement should consider a number of key climate performance indicators, such as the proportion of turnover derived from products or services associated with (EU) 2020/852 by establishing technical criteria for the examination of whether an economic activity qualifies as an activity contributing significantly to climate change mitigation or adaptation and whether that economic activity causes significant damage to any of the other environmental objectives (Delegated Regulation (EU) 2021/2139)

In June 2021, the European Commission adopted the Delegated Regulation, which sets out technical



economic activities that qualify as environmentally sustainable in accordance with the requirements of the Taxonomy Regulation, the proportion of capital expenditure and the proportion of operating expenditure related to assets or processes associated with economic activities that qualify as environmentally sustainable.

Delegated Regulation (EU) 2021/2139² supplementing Regulation

² Amended by Commission Delegated Regulation (EU) 2022/1214 of 09.03.2022 and Commission Delegated Regulation (EU) 2023/2485 of 27.06.2023.

monitoring criteria for determining the conditions under which an economic activity qualifies as making a substantial contribution to climate change mitigation or adaptation and for determining whether that economic activity does not cause significant damage to any of the other environmental objectives.

delegated regulation The complements Article 8 of Regulation (EU) 2020/852, which requires entities publish non-financial required to information to provide information to investors the environmental performance of their assets and

economic activities. Thus, the Delegated Regulation specifies the content, methodology and nature of the information to be disclosed in the non-financial report, taking into account the particularities of financial and non-financial companies and the technical screening criteria set out in the Delegated Regulation.

3. Delegated Regulation (EU) 2021/2178³ supplementing Regulation (EU) 2020/852 of the European Parliament and of the Council by specifying the content and format of the information to be provided by undertakings subject to Article 19a or 29a of Directive 2013/34/EU in relation to environmentally sustainable economic activities and specifying the methodology for compliance with this (Delegated information obligation Regulation (EU) 2021/2178)

Delegated Regulation (EU) 2021/2178 specifies the content and presentation of the information to be disclosed by undertakings subject to Articles 19a or 29a of Directive 2013/34/EU.

4. Delegated Regulation (EU) 2023/2486 supplementing Regulation (EU) 2020/852 of the European Parliament and of the Council by establishing technical criteria for the examination to determine the conditions under which an economic activity qualifies as an activity which makes a substantial contribution to the sustainable use and protection of water and marine resources and to the transition towards а circular economy, prevention and control of pollution or the protection and restoration of biodiversity and ecosystems and to determine whether economic activity concerned is significantly detrimental to any of the other environmental objectives and amending Commission delegated Regulation (EU) 2021/2178 as regards the publication of specific information on those economic activities (delegated Regulation (EU) 2023/2486)

Delegated Regulation (EU) 2023/2486 contains the technical examination criteria for determining the conditions under which an economic activity qualifies as an economic activity:

- activity that contributes substantially to the sustainable use and protection of water and marine resources,
- activity that contributes substantially to the transition to a circular economy,
- activity that contributes substantially to pollution prevention and control,
- activity that contributes substantially to the protection and restoration of biodiversity and ecosystems.
- **5.** Delegated Regulation (EU) 2023/2772 supplementing Directive 2013/34/EU of the European Parliament and of the Council with regard to sustainability reporting standards (Delegated Regulation (EU) 2023/2772)

Delegated Regulation (EU) 2023/2772 sets out the sustainability reporting standards that companies must use for their reporting, and applies from 1 January 2024 for financial years beginning on or after 1 January 2024.

6. Corporate Sustainability
Reporting Directive (CSRD) - Directive
(EU) 2022/2464 amending Regulation
(EU) No 537/2014, Directive 2004/109/EC,
Directive 2006/43/EC and Directive
2013/34/EU as regards sustainability
reporting by companies (Directive (EU)
2022/2464)

The Directive, transposed at national level by Order of the Minister of Finance No 85/2024 to regulate sustainability reporting issues, is the new regulatory framework, introducing into non-financial reporting more detailed reporting requirements and mandatory auditing of disclosures (ensuring that

³ Amended by Commission Delegated Regulation (EU) 2022/1214 of 09.03.2022 and Commission Delegated Regulation (EU) 2023/2486 of 27.06.2023.

reported information is accurate and reliable).

The CSRD aims to ensure a unified reporting framework containing adequate information available to stakeholders on:

- the risks that sustainability issues pose to companies;
- the impact of societies on people and the environment.

This requires, on the one hand, that companies from whom users need sustainability information report such information and, on the other hand, that they report all information that users consider relevant.

According to Article V of the Order of the Minister of Finance No 85/2024, **for**

the financial year 2023, the reporting of non-financial information required by the Accounting Regulations on the individual annual financial statements and consolidated annual financial statements, approved by OMFP No 1802/2014, respectively by the Accounting Regulations in accordance with Reportina International Financial Standards, approved by Order of the Minister of Public Finance No 2844/2016, shall be carried out in accordance with the provisions of the aforementioned regulations, in force on 31 December 2023.

EU taxonomy related to Transelectrica's activity

The Taxonomy distinguishes between taxonomy-eligible economic activities and taxonomy-aligned economic activities as follows:

- taxonomically eligible economic activity: an economic activity described in delegated acts adopted accordance with in Regulation (EU) 2020/852, of regardless whether that economic activity meets one or all of the technical selection criteria set out in those delegated acts;
- taxonomy-aligned economic activity: an economic activity: an economic activity that makes a substantial contribution to one of the six EU environmental objectives (fulfils the technical selection criteria set), does not significantly harm any of the other five and is carried out in compliance with minimum social safeguards.

In the process of studying and analysing the eligibility and alignment of Transelectrica's activities with the Taxonomy, the following steps were taken:

- a) classification and grouping of Transelectrica's economic activities;
- b) analysis of the eligibility of the activities identified;
- c) assessment of compliance with the technical criteria set out in Delegated Regulation (EU) 2021/2139 for the contribution to the environmental objectives of mitigation of and adaptation to climate change and Delegated Regulation (EU) 2023/2486 for the contribution to the environmental objectives of sustainable use and protection of water and marine resources, transition to a circular economy, prevention and control of pollution, protection and restoration of biodiversity and ecosystems;
- d) The activities must not cause significant damage to other EU environmental objectives defined in Regulation (EU) 2020/852;
- e) checking compliance with minimum social guarantees.

Among Transelectrica's main objectives relevant to the taxonomy, we recall:

- providing electricity transmission and system service at the level of customer requirements and expectations and performance standards defined in regulations and contracts;
- optimising the operation of the RET infrastructure to ensure the quality of the electricity transmitted in accordance with **ENTSO-E** requirements and the **RET** Technical Code, the limiting negative impact the on

- environment to a European acceptable level;
- ensuring that participants have access to the RET, as the backbone of the wholesale electricity market, in a transparent, fair and non-discriminatory manner;
- development and modernisation of the RET in line with users' needs;
- supporting the development and diversification of the internal and regional electricity market with a view to integration into the European market;
- major contribution to ensuring the sustainable development of the national economy.

Transelectrica's activities	Description of the activity according to Commission Delegated Regulation 2021/2139	Eligible activities	Aligned activities
National energy infrastructure management and operation Includes electricity transmission, system operation and transmission grid management for the national electricity system.	Activity: Transmission of electricity. Description: including activities in the Regulated Activities segment, mainly concerning the development, operation, exploitation and maintenance of the RET, which is part of the European interconnected system, as well as dispatching and metering activities.	Yes. 100% eligible	Yes. 100% aligned
Turnover		97,9%	97,9%

Following the assessment of compliance with the technical screening criteria for determining under which conditions an economic activity is deemed to make a substantial contribution to the 6 environmental objectives (climate change mitigation, climate change adaptation, sustainable use and protection of water

The environmental objectives and targets set at Transelectrica level were aimed at maintaining an efficient environmental management system, preventing and reducing pollution so that the impact of the electricity transmission network and the activities carried out by the Company on the environment would



and marine resources, transition to a circular economy, prevention and control of pollution, and protection and restoration of biodiversity and ecosystems), it is considered that the Company's activities that meet these criteria, and therefore make a substantial contribution to these objectives, are the following:

 Management and operation of energy infrastructure at national level. be within the limits of national and European requirements.

These objectives and targets were achieved through the actions included in the annual Environmental Management Programme for the reduction of air, water and soil pollution, reduction of noise and vibration levels, improvement of waste and wastewater management, restoration of the natural environment after maintenance/upgrading/refurbishment works, protection of fauna and flora and monitoring of environmental factors.

In 2023, the main directions pursued by Transelectrica to achieve the environmental objectives were:

Αt Tanselectrica level, an "Environmental Management and Protection Programme" is drawn up annually, which includes the actions and works required to achieve the Company's environmental objectives and targets, including deadlines, resources required and personnel responsible for implementing programme. The the creation and use of this program is important for the implementation, maintenance and improvement of the Company's environmental management system.

How Transelectrica is pursuing each of the 6 environmental objectives set by Regulation (EU) 2020/852. Transelectrica defines and implements preventive and corrective measures to reduce the environmental impact of its installations and activities. The diversity of environmental conditions for each site of the RET installations (overhead power lines, transformer and connection stations, buildings) determines, at various stages operation (design, construction, decommissioning) of each installation, specific environmental impacts. Preventive and corrective measures are therefore defined on a case-by-case basis for the existing conditions on each site.

During the design phase, preventive and corrective measures for an installation are defined by impact studies, appropriate assessment studies and the environmental management plan. The measures set out in the design are applied during construction.

Maintenance of the installations in operation is carried out systematically according to internal technical instructions. Environmental management plans are drawn up by the companies carrying out the maintenance work.

Main actions and measures taken to prevent and/or limit environmental impacts:

- a) preparation of documentation and submission of files for the authorisation/reauthorisation of the objectives under the Company's management in terms of environmental protection and water management;
- b) execution of works of:
 - -construction or maintenance of sewerage networks for domestic wastewater and/or rainwater;
 - -installation of water-oil separators on oil equipment tanks and storage platforms;
 - -installing septic tanks;
 - -construction of concrete platforms for temporary storage of equipment and waste;
 - -maintain equipment with oil or SF6 to prevent leaks;
 - -painting of overhead power line (OHL) poles in landscape-appropriate colours:
 - -cooling/maintenance of safety corridors for OHL:
 - -restoration/rehabilitation of the land to restore it to its original state (after completion of the works);
- c) procurement of services relating to:
 - -monitoring the quality of wastewater from the Company's plants and premises and proposing solutions to reduce pollution as required by environmental and water management permits;
 - -monitoring of pollutant emissions into the atmosphere (noise, electric magnetic field, pollutant and emissions, ozone concentrations); the values obtained for the determined parameters were analysed interpreted, resulting in conclusions on the level of pollutant emissions and compliance with the limit values allowed by legislation;

-collection , sorting, transport and recovery/disposal of waste.

The Company's substantial contribution to environmental objectives is fully described in the section on Environmental Responsibility. However, we make the following clarifications:

a) climate change mitigation:

In line with European trends, the modernisation and upgrading actions aim to implement equipment with a lower impact on environmental factors.

The prevention and reduction of greenhouse gas emissions is achieved through the use of closed/sealed pressurised equipment, the provision of equipment maintenance services as scheduled and also through emissions monitoring.

At present, Transelectrica has a fleet of cars that are equipped with high-performance technologies to reduce greenhouse gas emissions (EURO 5 and EURO 6), complying with air pollution standards imposed by national and European legislation.

- b) Adaptation to climate change: Not the case.
- c) sustainable use and protection of water and marine resources:
 Not applicable.
- d) the transition to a circular economy:

The management of all categories of waste is carried out in accordance with the provisions of GEO no. 92/2021 on the waste regime, taking into account, in particular, the application of the waste hierarchy, namely: prevention, preparation for reuse, recycling, other recovery and disposal operations, without endangering human health and especially without negatively impacting the environment.

There is no direct waste from electricity transmission. Waste results from construction, maintenance and human activity. The quantities of waste vary from year to year, depending on the volume of investment and maintenance work.

The waste generated was disposed of/recovered with authorised companies.

waste (t)	waste (t)	waste (t)	waste (t)	waste disposed of, recovered/ generated waste
6061,93	2117,54	2653,77	1290,62	78.71 %

(e) pollution prevention and control;

As previously stated in the section on Environmental Liability and explained at length:

- No noxious substances are discharged to the ground, groundwater or land from the normal operation of RET installations; however, accidental pollution may occur;
- during construction, maintenance and normal operation of RET installations, no significant quantities

- of pollutants are released into the atmosphere; however, accidental pollution may occur;
- High-voltage OHLs generate ozone and nitrogen oxide pollution of the atmosphere as a result of corona discharges around active conductors, especially in rainy weather;
- no process wastewater results from the electricity transmission process; wastewater generated on the site of RET installations is specified in the

section on Environmental Responsibility;

- Transformer/connector stations and 220 kV and 400 kV overhead power lines have relatively limited impact on the neighbourhood, existing only around RET installations;
- during the construction period, noise may be produced by the execution of works and the operation of equipment and vehicles.
- During operation, noise pollution is caused by noise from operation, vibration of RET installations or corona discharges in the space around the active conductors. The noise level produced by the corona effect at a distance of 25 m from the active conductor varies between 53 dB in rainy weather and 33 dB in fine weather.
- emissions, for greenhouse the values for 2023 have not been calculated as the reporting deadline is June 2024. In the last statement in May 2023 on SF6 emissions from equipment operated bv Transelectrica, the value was 75,863.64 kg (table in the section on Environmental Liability).

Transelectrica has taken measures to prevent pollution and reduce environmental impact, both in its operating activities and in maintenance and investment activities involving construction and installation work.

The determination of risks associated with the significant environmental aspects identified for the activities/processes carried out in Transelectrica led to a number of benefits and opportunities presented in the section on Environmental Responsibility.

Transelectrica defines and applies preventive and corrective measures to reduce the environmental impacts of its facilities and activities. The diversity of environmental conditions for each site of

the RET installations (overhead power lines, transformer and connection stations, buildings) determines, as at different stages (design, construction and operation) of each installation, specific environmental impacts, so that measures are defined in each case for the existing conditions at each site.

f) protection and restoration of biodiversity and ecosystems:

The choice of station locations and the routing of overhead power lines (OHL) shall be made in such a way as to lead to the least possible occupation of land and the least possible degradation of land during construction.

The impact on wildlife is significant, especially on birds, manifested by collision or electrocution by RET installations in migration corridors or protected areas. The impact on vegetation is caused by the permanent or temporary occupation of land and the removal of vegetation exceeding a certain height from the safety zones of the RET installations to avoid fires.

The following measures have been taken to maintain the favourable conservation status of species and habitats of Community interest during maintenance and repair works:

- fitting devices on OHL protective conductors with features that make them visible to birds to avoid collision;
- fitting of bird-removal devices to prevent the risk of electrocution;
- only carry out clearing/maintenance of safety corridors at the OHL outside the vegetation period and after the end of the bird nesting season:
- prohibiting the Company's personnel and those carrying out the works from any form of harvesting, capturing, killing, destroying or harming specimens in their natural environment, at any stage of their biological cycle; damaging, destroying and/or intentionally

collecting nests and/or eggs in the wild; damaging/destroying breeding or resting places;

• controlled waste disposal to avoid endangering wildlife.

At the design stage, preventive and corrective measures for an installation are defined through impact studies, appropriate assessment studies and the environmental management plan. The measures set out in the design are applied during construction.

Transelectrica's future activity aims to reduce the environmental impact of the installations, mainly by reducing the area of land occupied, reducing the impact on fauna and flora, reducing the electromagnetic field strength on the ground and the Corona effect losses, etc.

As regards the Company's expectations in terms of the relationship with the regulatory authorities regarding the implementation of new projects that bring elements of sustainability, we would like to point out the following:

At the national level, ANRE - as the energy regulator - plays an important role in achieving the objectives of decarbonising the electricity generation mix. Below we present by way of example a number of relevant national processes from a sustainability perspective, in which ANRE plays an important role.

Control of investments in the extension and development of electricity networks of public interest. electricity transmission In the and distribution network sector, **ANRE** approves the development plans of network operators. As part of this process, ANRE ensures that the electricity network development plans are linked to the integrated energy-environment policy and strategy objectives (e.g. the targets set in the NESCAP), i.e. that these development plans ensure the necessary network capacity connect sufficient RES generation capacity to meet the

environmental objectives within the set timeframes. ANRE monitors the state of implementation of investments in public electricity networks and has at its disposal the instruments established by law to sanction any significant delays in the implementation of investments. ANRE is also responsible for ensuring an adequate framework for the recovery by the operators of the public electricity networks of the costs of carrying out investments that create the capacity to connect new electricity generation capacity.

Establish an appropriate regulatory framework to facilitate the process of connecting resources the decarbonisation supporting process to the public electricity grid. ANRE establishes the rules governing the process of connecting generation and consumption capacities and electricity storage facilities to the grid. In recent years, ANRE has issued rules that make it possible to connect additional electricity generation capacity to the grid, with the use of operational limitations in contingency (N-1) situations. Also in recent years, ANRE has made a number of changes to the connection regulations to the process of connecting facilitate generation units, consumption and storage facilities to the grid. Very recently, ANRE launched a public consultation on a project that provides for the allocation of grid connection capacity through market-based methods (auctions), in order to ensure transparent and equitable conditions of access to the grid for new generation capacity and at the same time to make investors in new generation capacity more responsible for the realisation of this capacity and arid operators more responsible for the realisation of the necessary reinforcement works for the evacuation of production.

Establish an appropriate regulatory framework for the operation of support schemes for low greenhouse

gas emission technologies. ANRE plays important roles in the implementation of the support scheme for RES generation capacities (green certificates) and in the implementation of the support scheme for high efficiency cogeneration. ANRE will most likely also have an important role to play in the CfD (contracts for differences) support scheme for low carbon technologies, which is on the energy agenda of Romania's national authorities.

Establish an appropriate regulatory framework for the optimal functioning of the balancing market in the context of an increasing presence of RES in the NES. ANRE sets the rules governing the functioning of the balancing market, an extremely important component of the energy market in view of the integration of an increasing amount of generation capacity from RES with intermittent generation into the NES.

Fulfilment of ANRE's obligations under the plan to decarbonise Romania's electricity generation mix established by GEO no. 108/2022. ANRE supervises compliance with the decarbonisation plan by the owners of hard coal-fired lignite and power generation capacities.

As regards the RET maintenance activity, it complies with the Maintenance Assurance Programme (MAP) developed on the basis of the Regulation on the management and organisation of the maintenance activity approved by the Order of the National Energy Regulatory Authority (ANRE) no. 96/2017, with subsequent amendments and additions, for the approval of the Regulation for the

organisation of maintenance activity, Transelectrica's internal technical standard -Regulation for preventive maintenance of installations and equipment within the RET - having the code NTI-TEL-R-001-2007 and the RET Annual Maintenance Programmes (PM RET).

NTI-TEL-R-001-2007 stipulates that maintenance work/services shall be carried out only at the appropriate times, in the quantity and quality required, so that the following important desiderata are met:

- -maintain an appropriate level of operational safety of RET installations;
 -maintain intrinsic levels of reliability of functional assemblies and component equipment;
- -increasing the availability of facilities:
- -Optimising total costs over the lifetime of use.

In the future it is envisaged to streamline the RET maintenance activity by:

- emphasise preventive maintenance operations to reduce corrective maintenance;
- continuation of the OHL multispectral inspection programme;
- the use of non-invasive methods to ascertain the technical condition of electrical installations;
- the execution of the sector contract for the supply of medium and high voltage primary equipment and making it available for installation in the Company's installations.

KPI: Turnover, CAPEX and OPEX associated with activities aligned to the taxonomy

According to Article 8 of the Taxonomy Regulation, non-financial

corporations have the obligation to disclose the following information:

- a) the proportion of their turnover (revenue) derived from products or services associated with economic activities that qualify as environmentally sustainable according to the Taxonomy Regulation;
- b) the proportion of their capital expenditure (CAPEX) and the proportion of their operating expenditure (OPEX) related to assets or processes associated with economic activities that qualify as environmentally sustainable in accordance with the Taxonomy Regulation.

It also describes the quantitative and qualitative information to be reported (KPIs) and the criteria for drafting such indicators.

With regard to the calculation of KPIs, Annex I of Commission Delegated Regulation 2021/2178 includes in point 1 the content of the KPIs to be reported by non-financial corporations, specifying categorically that the following information must be reported for each of the indicators:

Turnover (Revenue). The proportion of turnover is calculated as the share of net turnover derived from products or services, including intangible assets, associated with economic activities aligned to the taxonomy (numerator) divided by net turnover (denominator).

Investment in fixed assets The denominator (CAPEX). includes additions to tangible and intangible fixed assets during the financial year under review before depreciation, amortisation and any revaluations, including those resultina from revaluations and impairments, for the relevant financial year and excluding changes in fair value. The denominator also covers additions to tangible and intangible assets resulting from business combinations.

The numerator equals the portion of capital expenditure included in the denominator that: a) relates to assets or processes that are associated with taxonomy-aligned economic activities; b) is part of a plan to expand taxonomy-aligned economic activities or to enable taxonomy-eligible economic activities to align with the taxonomy.

Operational expenditure (OPEX). The denominator covers direct noncapitalised costs related to research and development, building refurbishment measures, short-term leases, maintenance repairs. and anv other expenditure related to the ongoing maintenance of tangible fixed assets by the enterprise or the third party to which activities are outsourced that necessary to ensure the continued efficient operation of these assets.

The numerator includes the part of the operational expenditure included in the denominator that: a) relates to assets or processes associated with the economic activities aligned to the taxonomy, includina training and other human resource adaptation needs, and the direct uncapitalised costs of research development activities.

In addition, in October 2022, there was a Communication from the European Commission on the interpretation of certain legal provisions of the delegated act on the publication of information under Article 8 of the EU Taxonomy Regulation on the reporting of economic activities and assets eligible for the taxonomy, which clarifies a number of issues that had been highlighted in relation to the application of Article 8 of the Regulation.

In view of the considerations set out in Annex I to the Regulation, it should be noted that the procedures followed for determining the numerator and denominator of each Transelectrica KPI meet the requirements of the Regulation.

Also, the accounting regulations referred to in Revenue, CAPEX and OPEX correspond to the accounting regulations applicable to Transelectrica. Therefore, no adjustment or interpretation was necessary in this respect.

Based on the above, Transelectrica's information for the year 2023 in accordance with the Taxonomy Regulation is as follows:

Activities eligible for the taxonomy and aligned to the taxonomy. KPIs:								
	2023							
Revenues	97,9%							
CAPEX	CAPEX 100%							
OPEX	100%							

Exercițiul financiar 2023		Anul 2023			Criterii privind contribuția substanțială "Criterii aferente principiului de" a nu aduce prejudicii semnificative (Does Not Significantly Harm – DNSH) (†)												
Activități economice (1)	Cod- ul (°)(2)	Cifra de afaceri (3)	Proporția din cifra de afaceri, anul 2023 (4)	Atenuarea schimbărilor climatice (5)	Adaptarea la schimbările climatice (6)	Ара (7)	Poluaren (8)	Economia circulară (9)	Biodiversitaten (10)	Atenuarea schimbărilor climatice (11)	Adaptarea la schimbările climatice (12)	Ара (13)	Poluaren (14)	Economia circulară (15)	Biodiversitaten (16)	Garanții minime (17)	Proporția din cifra de afaceri aliniată la taxonomie (A.1.) sau eligibilă din punctul de vedere al taxonomiei (A.2.) cifra de afaceri, anul N-1 (18)
Gestionarea și exploatarea infrastructurii energetice la nivel național	4.9	Moneda	96	100%	N/A	N/A	100%	78,71%	100%	D	N/A	N/A	D	D	D	D	100%

Transelectrica publishes its seventh sustainability report, which continues the path started in 2018, using previous experience to present increasingly relevant indicators for stakeholders.

This report has been prepared in accordance with the Global Reporting Initiative Standards (GRI Standards - Core option) and covers the reporting period 1 January 2023 - 31 December 2023.

The information contained in Transelectrica's Sustainability Report does not deal exhaustively with the non-financial aspects of the Company, but is based on what stakeholders have reported to us as areas of interest. In addition to updated information on indicators known from the past, this report brings new points that place the Company in line with institutions that pay additional attention to

areas of global importance - environmental protection, employee protection and welfare, reducing gender inequality or promoting sustainable business.

We have further chosen this reporting standard ensure that to stakeholders receive information that is relevant and in line with current trends in the international space, without limiting ourselves to the mandatory reporting specified the applicable topics in legislation.

Continuing its reporting practice, Transelectrica intends to report nonfinancial information annually.

The contact point for questions or any other information is at Transelectrica's head office at 2-4 Olteni Street, sector 3, Bucharest, Department of Corporate Strategy and Non-financial Reporting.

GRI INDEX

General aspects

Indicator	Indicator details	Related	Page
		chapter in	
		the report	
102-1	Organisation name	1	6
102-2	Activities, brands, products and services	1	12
102-3	Location of headquarters	9	100
102-4	Location of operations	1	12
102-5	Shareholding and legal form	1	12
102-6	Markets in which it operates	1	12
102-7	Organisation ladder	1	25
102-8	Information about employees	2	33 13
102-11 102-12	Precautionary approaches External initiatives	1	27
102-12	Memberships	1	27
102-13	Message from the Directorate	1	4
102-14	Key impacts, risks and opportunities	7	4 59-65
102-15	Values, principles, standards and norms	1	11
102-10	Code for consultation and ethical concern	1	25
102-17	Corporate governance structure	1	26
102-10	Delegation of powers	1	26-27
102-13	Responsibilities at executive level on economic,	1	21-23
102-20	environmental and social issues	'	21-20
102-21	Stakeholder consultation on economic, environmental and	1	22
.02 2.	social issues	·	
102-22	Composition of the highest governing body and its	1	26
	committees		
102-23	President of the highest governing body	1	26
102-24	Nomination and selection of the highest governance body	1	26
102-25	Conflicts of interest	1	25
102-26	The role of the highest governance body in setting purpose,	1	26
	values and strategy		
102-27	Informing the higher forum	1	26
102-28	Evaluating the performance of the higher forum	1	26
102-30	Effectiveness of risk management processes	1	13
102-31	Review of economic, environmental and social themes	1	21-22
102-32	The role of the highest governance body in reporting	1	21-22
102-33	Communicating critical concerns	1	23-24
102-35	Remuneration policy	2	33
102-36	Process for determining remuneration	2	33
102-40	List of interested groups	1	22-24
102-41	Collective labour agreements Identification and selection of stakeholders	2	38 21
102-42		1	22-24
102-43 102-44	Stakeholder engagement approach Key topics and concerns	1	22-24
102-44	Entities included in the consolidated financial statements	1	13
102-45	Defining report content and boundaries	1	21
102-46	List of material themes	1	21
102-47	Corrections to the information in the report	9	100
102-48	Changes in reporting	9	100
102-49	Reporting period	9	100
102-50	Date of most recent report	9	100
102-51	Reporting cycle	9	100
102-52	Contact point for questions	9	100
102-54	Compliance with GRI standards - Core or Comprehensive	9	100
102-55	GRI Index	9	100

Topics covered

Indicator	Theme/indicator name	Related chapter in the report	Page	Comments
	Business ethics and anti-corruption policies	1	25	
103-1	Explaining the material basis and limits	1	25	
103-2	Components of the management approach	1	25	
103-3	Evaluation of the management approach	1	25	
205-1	Operations undertaken to manage corruption-related risks	1	25	
205-2	Communication and training on anti-corruption policy and procedures	1	25	
205-3	Confirmed incidents of corruption and actions taken	1	25	
206-1	Legal action for anti-competitive, anti-trust or monopolistic behaviour	1	25	
418-1	Confirmed complaints about protection breaches/loss of customer data	1	25	
	Human resources development and diversity	2	31-38	
103-1	Explaining the material basis and limits	2	33,36-38	
103-2	Components of the management approach	2	33,36-38	
103-3	Evaluation of the management approach	2	33,36-38	
401-1	New employees and personnel turnover	2	34	
401-3	Parental leave	2	34-35	
403-4	Occupational health and safety issues covered by formal agreements with trade unions	2	31, 38	
404-2	Employee skills development and transitional assistance programmes	2	36	
405-1	Diversity in governing and executive bodies	2	33-34	
405-2	Ratio of basic pay to pay for women and men	2	34	
406-1	Incidents of discrimination and corrective action taken	2	33-35	
	Information, consultation of employees and relations with trade unions	2	38	Own indicator
	Occupational Safety and health	3	39-42	
103-1	Explaining the material basis and limits	3	39	
103-2	Components of the management approach	3	39	
103-3	Evaluation of the management approach	3	39	
403-1	Employee representation in ptte (management- employee) SSM committees	3	41	
403-2	Types of Occupational accidents, occupational diseases, sick leave days and absenteeism and number of deaths caused by Occupational accidents	3	40-41	
403-3	Workers with a high incidence of occupational diseases or at high risk of occupational disease	3	40-41	
	Strategy and sustainability plan	8	66-85	Own indicator
	Risk management	1	13	Own indicator
	Responsible community relations	6	56-58	
103-1	Explaining the material basis and limits	6	54-58	
103-2	Components of the management approach	6	54-58	
103-3	Evaluation of the management approach	6	54-58	
203-2	Significant indirect economic impact	6	54-58	
413-1	Operations involving local communities, impact and	6	58	
	development programmes			
	Environmental protection	4	42-53	
103-1	Explaining the material basis and limits	4	42	
103-2	Components of the management approach	4	42	
103-3	Evaluation of the management approach	4	42	
304-2	Significant impacts of activities, products and services on biodiversity	4	45-48	
304-4	IUCN Red List and National Conservation List species with habitats in areas affected by operations	4	45-48	
306-3	Significant spills	4	50	

Indicator	Theme/indicator name	Related chapter in the report	Page	Comments
306-4	Classification of waste by type and disposal method	4	51	
307-1	Non-compliance with environmental laws and regulations	4	53	
308-2	Negative environmental impacts and actions taken	4	45-48, 53	
	Innovation, grid improvement and energy efficiency approach	7,8	60-77	
103-1	Explaining the material basis and limits	7	60	
103-2	Components of the management approach	7	60	
103-3	Evaluation of the management approach	7	60	
203-1	Investment in infrastructure and related services	1	19	
302-1	Energy consumption within the organisation	1, 7	17, 60	
302-4	Reducing energy consumption	7,8	60-67, 67-77	
302-5	Reducing the energy needs of products and services	8	77	
	EU taxonomy related to Transelectrica's activity under the Taxonomy Regulation (EU) 2022/852	9	86-99	Own indicator

GLOSSARY

GMS - General Meeting of Shareholders

ANRE - National Energy Regulatory Authority

BVB - Bucharest Stock Exchange

EC - European Commission

OTC - Own Technological Consumption

CRE - Romanian Energy Centre

dB - decibels

EGRC - Company Risk Management Team

ENTSO-E - European Network of Transmission System Operators for Electricity

GRI - Global Reporting Initiative

GWh - Gigawatt hour

KPI - Performance Indicators

kV - Kilo-volt

OHL - Overhead power lines

MW - Megawatt

MWh - Megawatt hour

TSO - Transmission and System Operator

DAM - Day Ahead Market

IDM - Intra-day market

BM - Balancing Market

RET - Electricity Transmission Network

NES - National Electricity System

NAS - National Anti-Corruption Strategy

TWh - Terrawatt hour

UNO-DEN - National Energy Dispatcher Operational Unit