



CONTENTS

Đ,	Abo	out This Report	02
and the second s	Me	ssage from the Chairman	03
بم ج. ک	Sta	tement from the Board of Directors	04
	Abo	out ENN Energy	05
	1. 2.	Sustainable Development Management1.1ESG Governance and Management1.2Risk Control1.3Stakeholders Engagement1.4Materiality AssessmentCore Issues	06 08 09 10 12
		 2.1 Response to Climate Change Risk and Transition 2.2 GHG Emission Reduction 2.3 Biodiversity and Land Use 2.4 Equal Employment and Health & Safety 2.5 Business Codes of Conduct and Supply Chain Management 2.6 Customer Privacy and Information Security 	12 17 23 28 34 37
	3.	Practical Performance3.1Intelligent Operations3.2Environmental Protection3.3Talents Cultivation3.4Corporate Citizenship	38 38 50 58 65
	4.	Social Recognition	69
	5.	Outlook	70
	6.	Key Performance Indicators	71
	7.	List of HKEX's ESG Indicators	75
	8.	Reader's Feedback Form	78

ABOUT THIS REPORT



This is the fourth Environmental, Social and Governance ("ESG") Report (hereinafter referred to as "this report") of ENN Energy Holdings Limited. This report reflects ENN Energy's active fulfilment of its economic, social and environmental responsibilities to achieve sustainable development and its response to stakeholders' concern. The company's Board of Directors ("Board") has reviewed this report and is responsible for the authenticity and validity of the information contained.



Reporting Period

The content of this report covers 1 January to 31 December, 2020. The time period may be extended appropriately for some of its contents.



Scope of this Report This report focuses on ENN Energy and its subsidiaries.



Data Source

All information and data herein are from the Company's official documents, statistics and financial reports, as well as ESG information compiled, summarised and reviewed by the Company. The report is published in Chinese and English, if there are any discrepancies between the two versions, the Chinese one shall prevail. Unless otherwise specified, the currency unit is RMB.

ESG

Preparation Basis

This report is mainly based on the reporting principles and the requirements of the Environmental, Social and Governance Reporting Guide under Appendix 27 of the Listing Rules of the Hong Kong Exchanges and Clearing Limited ("Stock Exchange"), and also refer to GRI Standards by Global Sustainability Standard Board (GSSB).



Reporting Specifications

For ease of presentation and reading, ENN Energy Holdings Limited is hereinafter referred to as "ENN Energy", "the Company" or "We" in this report.



Access to this Report

This report is available for browse and download at the website of the Stock Exchange (www. hkexnews.hk) and the Company (http://www.ennenergy.com/).

MESSAGE FROM THE CHAIRMAN





Serving for **177,128** Commercial & Industrial Users



In 2020, in the face of the COVID-19 pandemic, ENN Energy forged ahead in adhering to our mission of "Building a Modern Energy System, Improving the Quality of People's Lives, and Becoming a Respected Innovative Smart Enterprise.³ ENN Energy strived for economic growth, while also prioritising the environment and society. We invested resources in response to climate change, biodiversity conservation, employee safety and health, and an environmentally responsible supply chain, among other issues We are committed to creating long-term, stable corporate value and achieving sustainable development.

In 2020, Chinese government continued to actively promote energy restructuring and multi-energy complementation. Compared with other alternative energy sources, natural gas continued its appeal to the government and market thanks to its high combustion efficiency, relatively low carbon emissions, and low cost. As of December 31, 2020, the number of industrial and commercial users served by the Company reached 177,128. In 2020, installed designed daily capacity of "coal-to-gas" users amounted to 4.78 million cubic meter, accounting for 28 % of newly developed industrial and commercial users. At the same time, the Company fully grasped multiple opportunities such as carbon neutrality, industrial transfer, clean heating, and energy system reform, and continued to expand the integrated energy business market with heat, electricity, and gas according to local conditions. During the year 21 integrated energy projects have been put into operation, accumulatively 119 integrated energy projects have been put into operation, generating a total of 12.042 billion kWh of integrated energy sales including cooling, heating, steam and electricity, representing an increase of 75.9% yearon-year. Our integrated energy solutions not only brought sustainable benefits to ENN Energy, but also successfully

reduced energy consumption by more than 1,476,085 tons of standard coal for customers, reduced 4,444,264 tons of carbon dioxide emissions, and effectively promoted energy transformation and environmental benefits.

We closely monitor climate change related issues and deeply understand the relationship between our business and the national strategic goal of achieving carbon neutrality before 2060. In 2020, we established a governance structure which identified potential climate risks and opportunities, set carbon emission reduction targets, and formulated step-bystep plans and practical measures to seize transformation opportunities in response to climate change. At the same time, we implemented the concept of green production across our gas distribution and integrated energy businesses by adopting a variety of effective measures to improve energy efficiency, conserve resources, and strictly monitor various emission indicators. We actively participated in biodiversity conservation and vigorously support ecological restoration projects to fulfill our commitment to environmental protection.

2020 was ENN Energy's "Safety Compliance Year". The Company established the concepts of "know the key points, see the facts and assign responsible person". We increased investment in safety across the business through safety inspections, optimisation of safety management systems, and promotion of safety digitalisation to foster a safe culture within the Company and protect employee health. In 2020, the Company had no major safety production accidents. In addition, as the COVID-19 outbreak at the beginning of 2020 posed a serious threat to public health, we actively cooperated with the government to prevent and control the pandemic. We adopted strict disinfection measures, provided employees with adequate infection prevention materials, and monitored the well-being of our employees.

Adhering to our people-centered principle, ENN Energy prioritises the development of employees by building a broad platform for career development in order to encourage and help employees realise their value and dreams. Additionally, the Company actively participates in public service and poverty alleviation, assuming social responsibility to fight the pandemic in coordination with the local government. In 2020, the Company's charitable donations totaled RMB52.85 million.

With years of steady growth in performance and an innovative business model that is constantly adapting to market changes, ENN Energy won the S&P Global Platts Global Energy "Award of Excellence: Downstream", and IR Magazine Greater China "Best Investor Event" Award in 2020. The Company was also included in numerous influential rankings in capital market. ENN Energy has been awarded "Most Honored Company" in Institutional Investors' "All-Asia Executive Team" for four consecutive years and ranked No.3 in "Best IR Program" (SellSide) in 2020. The Group also ranked No. 996 in Forbes' annual Global 2000 list, up 438 places from 2019; No.24 in The World's 50 Most Valuable Public Utility Brands (No.3 among Chinese shortlisted companies), reported by Brand Finance, a UK brand valuation consultancy; No. 148 in "China's Top 500 List" by Fortune Magazine, an international financial magazine highly recognised by investment professionals.

All great journeys begin with a single step, for us this involves actions with sense to passion, wisdom, responsibility and creativity. Let's work together to witness the expansion of the clean energy industry in China and globally.

Chairman of ENN Energy Wang Yusuo

STATEMENT FROM THE BOARD OF DIRECTORS

ENN Energy is committed to improving sustainable business practices, establishing robust ESG governance mechanisms, while striving to harmonise with the environment and society in order to create long-term and stable environmental, social and corporate values.

The Board of Directors (Board) attaches great importance to ENN Energy's sustainable development performance, and has established an ESG Committee to assist the Board in formulating the Company's ESG-related strategies and supervising the implementation of ESG initiatives. An ESG working group has been set up under the ESG Committee to ensure that risks related to all aspects of ESG are properly managed and implemented. We regularly hold internal and external events to communicate closely with stakeholders, identify and evaluate material ESG issues, and discuss and review the evaluation results on the ESG Committee. Based on the external macro environment and the Company's development strategy, the ESG Committee discusses and determines the Company's risks and opportunities in terms of environmental, social and corporate governance, and pursues the management and improvement of key issues as an annual strategy for sustainable development. In 2020, with reference to the internationally leading disclosure framework related to climate change, we identified the risks and opportunities that the climate change might pose to the Company's future operations, assessed the relevance of risks, and set greenhouse gas (GHG) emission reduction targets. We paid attention to the impact of potential extreme weather and natural disasters on the gas transmission and distribution, storage and transportation and pipeline network safety, and formulated corresponding response strategies timely. In order to further implement its green development strategy in its own operations and the upstream and downstream of the value chain, the Company set mid to long term targets for the GHG emission intensity of its city gas business, i.e. a decrease of 20% by 2030 based on the GHG emission intensity (Scope 1 and Scope 2 GHG emissions combined /natural gas sales) in 2019, and promises to be carbon neutral by 2050. We formulated a carbon reduction action plan to monitor and review the achievement of the targets. In addition, we will regularly track sustainable development trends at home and abroad and continue to increase investment in sustainable development.

This report fully discloses the progress and effectiveness of ENN Energy's ESG work in 2020. It was reviewed and approved by the ESG Committee and the Board on March 19, 2021 and March 21, 2021, respectively.

ABOUT ENN ENERGY

ENN Energy Holdings Limited (02688.HK) started its city gas distribution business since 1992, is one of the largest clean energy distributors. The Company is currently focusing on building core businesses of gas distribution, pipe network operation, and integrated energy services to achieve transformation and business upgrade.

As of December 31, 2020, ENN Energy had operated 235 city gas projects across the country, providing gas services for 23.21 million residential users and 177 thousand industrial and commercial users, covering a connectable population of more than 112 million, 63 thousand kilometers of transmission and trunk pipelines, 119 operating integrated energy projects and 24 projects under construction.

In the digital age, ENN Energy has implemented a new "self-driven + empowering" relationship between different departments and individuals to realise a comprehensive digitalisation and to build a smart enterprise. ENN Energy is willing to work with ecological partners to make unremitting efforts to create a modern energy system and improve people's quality of life.





1

06

SUSTAINABLE DEVELOPMENT MANAGEMENT

ENN Energy has always adhered to the core values of sustainable development and continued to optimise and improve its ESG management system, incorporated ESG factors into the Company's decision making processes and daily operations, and comprehensively promote the Company's sustainable development. We improve the level of corporate governance by formulating and updating the relevant policies of the Board and improving the ESG management process. Through reliable measures for risk management and control, we improve the Company's risk resilience. At the same time, we communicate with stakeholders by various means and listen to their opinions, and engage the Board in the discussion and determination of material ESG issues, so as to achieve sustainable development and a multi-win outcome.



1.1 ESG Governance and Management

Corporate Governance

ENN Energy complies with the Companies Act of the Cayman Islands, Companies Ordinance (Cap. 622 of the Laws of Hong Kong), listing rules of the Hong Kong Stock Exchanges, Securities and Futures Ordinance, among other relevant rules and regulations to improve the corporate governance structure and ensure the Company's stable operation. **The Company** actively promotes and implements the

Policy on the Diversity of Board Members. In selecting and appointing a board director, the Nomination Committee considers the Company's business model, specific needs and various diversity factors, including but not limited to gender, cultural and educational background, professional experience, service tenure, knowledge of the Company as well as a wide range of personal characteristics, interests and values. As of December 31, 2020, the Board comprised a total of 10 directors including 4 executive directors, 2 non-executive directors and 4 independent non-executive directors. The Board believes that the current composition has achieved diversity on the Board and appropriate balance of experience and skills, and plans to increase the proportion of female directors in the future. In addition, the Nomination Committee assesses the independence of

independent non-executive directors and makes recommendations to the Board to increase the proportion of independent directors in line with the Company's needs, thereby introducing sufficient independent opinions to the Board. Currently, independent non-executive directors account for more than one-third of the board members. Four Board committees namely Audit Committee, Remuneration Committee, Nomination Committee and Risk Management Committee, and four responsibility committees namely ESG Committee, Management Committee, Share Award Committee and Independent Board Committee under delegated authority from the Board, operate effectively as per their terms of reference to protect the rights of shareholders and ensure a solid development of the Company.

In order to deepen ESG governance and ensure the achievement of ESGrelated performance, **the Company has linked management compensation to ESG indicators.**

Executive director and senior management's compensation linked with ESG performance and subjected to clawback mechanism



SUSTAINABLE DEVELOPMENT MANAGEMENT



Service Tenure





Less than 5 years 5-10 years More than 10 years

Key Capabilities	5		Wang Yusuo	Zheng Hongtao	Zhang Yuying	Wang Dongzhi	Wang Zizheng	Jin Yongsheng	Ma Zhixiang	Yuen Po Kwong	Law Yee Kwun,Quin	Yien Yu Yu Catherine
Strategy / Busines	s Focus		2	2	2		2		2	2	7	2
Energy trends/ Str	rategy/ Digitisation											
Operational Excel	lence / Process Optim	isation										
Energy Technolog	gy Development											
Regulators/ Other	Public Relations											
International Proje	International Project Experiences											
Specific Functions	and Profile Board Str	ucture										
Accounting/ Audit	t/ Risk Management											
Corporate Financi	ing											
Talents Managem	ent and Remuneration	n										
Corporate Governance and Sustainable Development												
Types of Director	Types of Director 💦 🚨 Executive Directors 🔔 Non-executive Directors				ndepe	ender	nt No	n-exe	cutiv	e Dir	ectors	\$
Experience	Experience Professional Managers As a Director											

In 2020, we improved the policy of ENN Energy Measures for Penalty of Employees' Violation of Regulations and Disciplines to define in detail the violations of all employees including executive directors and senior managers, and established a remuneration and bonus clawback mechanism to further improve the level of corporate governance.

ESG Management

In order to advance the implementation of ENN Energy's sustainable development strategy and strengthen the management of the Company's sustainable development, the Company has established an ESG Committee to support the Board in its work to develop the Company's ESG strategy and monitor the implementation of ESG initiatives. In addition, an ESG Working Group under the ESG Committee is responsible for ensuring ESG related-risks are properly managed and controlled to gradually optimise our ESG governance and management capability.

The Company has developed the ESG Committee's Terms of Reference which clarifies the responsibilities of the committee including developing and reviewing the Company's ESG policy,

reviewing and overseeing ESG training for senior management, formulating ESGrelated codes of conduct, and reviewing and monitoring the Company's compliance. At the same time, the ESG Committee is also required to meet at least once a year. Two meetings were held during the reporting period.

Authorised by the Board, the ESG Committee and the ESG Working Group consistently improve the ESG metrics management system and the ESG risk management process. Regular meetings were held to report on the progress of ESG work and exchange opinions on ESG matters to optimise our ESG governance and management capability during the reporting period. This report was discussed and approved by the Board prior to its release.



In 2020, ENN Energy incorporated indicators such as carbon emission reduction, biodiversity conservation, environmental management improvement, supply chain management, renewable energy application, health and safety, customer satisfaction, anticorruption, and compliance operations into the evaluation of the annual value creation plans of provincial and member companies. Provincial and member company performance against these indicators will be evaluated to create an incentive system linked to sustainable development performance and further integrate sustainable development into the daily operation of the Company.

For more information about ENN Energy's corporate governance and directors' industry experience, please refer to the Corporate Governance report of the Company's 2020 Annual Report.





1.2 Risk Control

Risk Management

The Board is responsible for ENN Energy's risk management and internal control systems, and formulates appropriate policies and strategies to review the effectiveness of these systems. The strategies and policies aim to assess and determine the nature and extent of risks in line with ENN Energy's strategic objectives and risk tolerance. The main purpose is to reasonably ensure that there will be no major misstatements or losses.

In 2020, we identified nine types of risks, including: policy and price risk, compliance risk, operational risk, media risk, legal risk, HSE (health, safety and environmental) risk, market risk, financial risk and climate change risk. At present, ENN Energy has set climate change risks as one of its risk categories that the Company needs to pay attention to. We conduct climate change risk assessments and formulate corresponding control measures according to different risk scenarios. The Company regularly identifies and evaluates climate change risks and takes into consideration potential problems arising from climate change throughout the value chain. In the future, we will further improve the sensitivity analysis and stress testing to fully identify and



A Digital risk display product evaluate the implications of climate change and prevent and control related risks.

Risk Culture

ENN Energy is committed to maintaining sound corporate governance, creating an effective internal monitoring and risk management system and continuously improving transparency. The Company has established the Policy on Whistleblowing and Whistleblower Protection, and announced the roll-out of a hotline and email address for reporting possible fraud, corruption, misconduct, or material risks. In addition, the Company regularly organises risk management and anticorruption training courses to improve employee's risk awareness and promote a compliance culture.

1

SUSTAINABLE DEVELOPMENT MANAGEMENT



1.3 Stakeholders Engagement

The Company highly values the opinions of stakeholders. The Company highly values the opinions of stakeholders. We established multiple channels to communicate with both internal and external stakeholders and, consider their requests and expectations. Stakeholders can also obtain information about our sustainability practices both online and offline. In 2020, we communicated with internal and external stakeholders, including, social media, corporate subscriptions, emails, and others.

Stakeholders	Expectations	Means of Communication	Responses
Shareholders	 Excellent business performance Sustainable and stable growth Clear strategy Efficient corporate governance Timely disclosure of information 	 Shareholders' meetings Daily communications (including emails, phone calls and one-on-one meetings) Announcements and circulars Interim and annual reports Company website Roadshows Social media 	 Regular disclosure of business information Maintenance of stable profitability Improvement in corporate governance
Government	 Safe operation Lawful operation Promotion of industrial and regional economic development Contributions to people's livelihood Contributions to air pollution control Efficient use of energy 	 Daily communication Information reporting Routine check Special reports Cooperation with government and enterprises Participation in policy- making process 	 Improvement in safety level Improvement in risk management Compliance with relevant laws and regulations Business operation in line with the needs of industrial and regional development Active promotion of clean, low-carbon, safe and efficient energy supply model Active promotion of "coal-to-gas" and "oil- to-gas"
Employees	 Equal employment opportunities Professional career development Safe and healthy working environment Education and training opportunities 	 Mobile application - iCome Labor unions Staff meeting The "Employee Home" Platform ENN University Various internal and external training Employee complaints and feedback 	 Diversified recruitment Team-building activities Care for employee health "Self-driven and Sharing" culture Online and offline training opportunities
Customers	 Safe and stable gas supply Effective and efficient service 	 National client service hotline: 95158 Service quality supervision hotline: 400-86-95158 Community service stations and business centre Online business centre Mobile access to customer service 	 Safety checks Timely and effective response to client demands Commitment to providing good customer service Customer satisfaction survey
Suppliers and Business Partners	 Transparent procurement Localised procurement 	 Suppliers' meetings Strategic cooperation Regular interviews Bidding 	 Public contract bidding Establishment of a supply chain management system Continuous improvement of policies Improvement in management efficiency

1 SUSTAINABLE DEVELOPMENT MANAGEMENT

Stakeholders	Expectations	Means of Communication	Responses
Environment	 Clean energy supply Reduction of greenhouse emissions Resource recycling Protection of natural resources and ecology 	 Participation in environmental initiatives and actions Environmental data disclosure Periodical release of ESG reports Cooperation with the government for air pollution control 	 Participation in international environmental protection initiatives Formulation of operation and environmental protection plans Enhancement of the management of energy conservation and emission reduction Increase of resource efficiency Promotion of green and clean energy Promotion of environmentally friendly solutions Continuous environmental monitoring Active participation in environmental protection
Community	 Safe operations Contributions to community development Charity activities 	 Popular science education Community publicity events Voluntary work Charitable activities 	 Carry out charitable donations Contributions to charity Contributions to construction of harmonious community Poverty alleviation and care for those in need Voluntary community services Care for the next generation
NEWS Media	 Transparent disclosure Easy access to management Maintenance of good relationships 	 Press conferences Media site visits Management interviews 	 Regular press conferences Press releases Business update on company website Response to media enquiry Communicate with media



1.4 Materiality Assessment

ENN Energy regularly assesses material ESG issues by conducting a materiality assessment. The identification of material issues is reviewed and confirmed by the Company's ESG Committee. In 2020, ENN Energy used the industry's leading benchmark research to identify two new highpriority issues, "Customer Health and Safety" and "Corporate Governance and Compliance", and included them as importance issues.

Materiality Assessment Process				
Developing Relevant Topics	 A list of topics is developed based on current and past stakeholder input as well as local and international reporting standards; The identified topics are divided into key categories consistent with the environmental, social and governance framework. We identified 24 relevant topics in our latest materiality assessment. 			
Seeking Feedback from Stakeholders	 Stakeholder questionnaires are issued regularly to conduct quantitative surveys; Interviews and focus group discussions are conducted regularly. 			
Developing a Materiality Matrix	 The importance of each issue as relevant to stakeholders and to ENN Energy's development is assessed; A materiality matrix is developed based on the results of the questionnaire survey. 			
Confirmation	• The ESG Committee reviews and confirms the materiality matrix.			

SUSTAINABLE DEVELOPMENT MANAGEMENT



No.	Material Issues
1	Community relations
2	Waste recycling
3	Protection of rights of indigenous peoples at places of operation
4	Earnings and performance
5	Anti-competitive practices
6	Emissions of pollutants
7	Anti-corruption
8	Biodiversity protection
9	Climate change
10	Preservation of resources and energy
11	Equal employment opportunities
12	Protection of employee rights



We use a matrix to rank the importance of the 24 topics. The most important topics are displayed at the top right-hand corner of the matrix, the less important topics are listed at the bottom left-hand corner, and the issues in the middle are of moderate importance.

The three most important ESG issues identified were consistent with last year: safe and stable gas supply, earnings and performance, and resource and energy conservation. These results communicate the Company's and external stakeholders continued focus on safety, performance, energy conservation, and consumption

reduction. During the year, the importance of several issues increased, including climate change, waste recycling, and community relations, reflecting the focus of stakeholders' concerns on these topics. ENN Energy increased its attention to the above issues and responded in a timely manner.

Social issues
 Environmental issues
 Economic issues
 Employee/ Customer related issues

Material Issues
Suppliers management
Avoidance of forced labour and child labour
Occupational health and safety
Customer services
Protection of customer data
Safe and stable gas supply
Training and development
Intellectual property protection
Charitable activities for communities
Product and technological innovation
Corporate governance and compliance
Customer health and safety



2.1 Response to Climate Change Risk and Transition

Under the guidance of the United Nations Framework Convention on Climate Change. the Chinese government promotes the implementation of the Paris Agreement in an all-round and effective manner to address climate change, striving to reach the peak of carbon dioxide emissions by 2030 and achieve carbon neutrality by 2060. ENN Energy actively responds to national policies and seizes potential market opportunities. In 2020, a systematic climate change risk management system was established to identify potential climate risks. We set carbon emission reduction targets and took corresponding actions to achieve our goals.

Climate Risk Governance and Management

ENN Energy prioritises climate risk management according to the United Nations Framework Convention on Climate Change Paris Agreement, China's 14th Five-Year Plan (2021-2025) for National Economic and Social Development, the Long-Range Objectives Through the Year 2035, and Measures for the Administration of National Carbon Emission Trading (Trial), among other policies and systems. In 2020, the Company analysed climate risks in the gas industry and relevant policies to identify climate risks and opportunities faced by ENN Energy. The Company identified material climate-related issues which present both current and future impacts to the Company. We further categorised risks by region analysing the climate risk levels of the regions where each member company operates.. ENN Energy formulated the ENN Energy's Climate Change Policy. The policy clarifies the company's climate change targets and risk response. ENN Energy will use it as the basis to respond to climate risks, take advantage of the opportunities arising from climate change, and contribute to the mitigation of global climate issues. ENN Energy formulated the ENN Energy's Climate Change Policy. The policy clarifies the Company's climate change targets and risk response. ENN Energy will use it as the basis to respond to climate risks, take advantage of the opportunities arising from climate change, and contribute to the mitigation of global climate issues.

The ESG Committee maintains oversight over climate change-related issues, regularly discusses these issues, and monitors climate risks through actions such as:

- Identifying risks and opportunities of climate change to the Company and assessing the relevance of risks, so as to set relevant goals;
- 2. Assessing the impact of potential extreme weather and natural disasters on gas transmission and distribution; and pipeline network storage, transportation, and safety; and formulating timely response strategies.

In order to ensure the effectiveness of climate risk management and governance, the Company incorporates performance relevant indicators of climate risk management into management's remuneration and ensures the effective implementation and supervision of related activities through the establishment of a management team dedicated to climate change response.



Climate Strategy

ENN Energy achieves business growth through a green and sustainable approach. Under the guidance of our climate change management framework, we develop business strategies that account for both potential climate risks and opportunities for low-carbon transformation to achieve win-win cooperation with stakeholders. ENN Energy actively cooperates with the government on "coal-to-gas" conversion; promotes the deployment and use of low-carbon and zero-carbon energy; develops photovoltaic, geothermal, and biomass energies; and explores green energy businesses, such as hydrogen energy. While saving energy and reducing emissions as a company, we provide sustainable solutions to help society and customers improve energy efficiency and reduce carbon emissions. ENN Energy will continue to drive a comprehensive response to climate change through the Company's overall development plan in the future.

Climate Risk Identification

The risks and opportunities brought about by climate change have led us to integrate climate change measures into our daily operations and long-term strategies. In order to mitigate such risks, ENN Energy identified and analysed physical and transition risks from climate change and formulated responses in 2020. At the same time, in alignment with the Task Force on Climate-related Financial Disclosures (TCFD) framework, the Company disclosed climate-related governance, risks, strategies and goals.

In 2020, we identified climate-related risks and opportunities, formed ENN Energy's climate risk list, ranked and quantified these risks and opportunities, and formulated corresponding measures and strategies.





ENN Energy has identified a series of risks and formulated relevant responses to address respective risks.

			nysiour histo Elst
Physical Risks		Impact	Response
	Open Typhoon	The operation pipeline network, equipment and facilities may be damaged, affecting the stability of gas supply, threatening the safety of employees and customers, and resulting in compensation and legal liabilities for breach of contract due to business interruptions and other issues.	 We formulated a typhoon emergency rescue plan; Used stronger facilities and pipes, and constructed a ring-shaped pipe network to effectively avoid one point destruction causing the overall destruction of the natural gas pipeline network; and Constructed facilities near to the end user, such as heightened flood defences to improve resistance against natural disasters.
Acute Risks	Extreme precipitation	The operation pipeline network, equipment and facilities may be damaged, affecting the stability of gas supply, threatening the safety of employees and customers. The risk of flooding of gas supply facilities in low-lying areas may increase.	 We formulated emergency rescue plans for flooding and lightning; Adopted more robust facilities and pipes; Increased interconnectedness the urban management information platform to realise the sharing of data and resources. This improves the timeliness of information acquisition, reduces the chance of pipeline damage, realises real time monitoring of third party operations along the pipeline network, provides safety risks alerts promptly, and thus enhances the pipeline network to effectively avoid the overall damage of the natural gas pipeline network caused by a point damage; Constructed a ring-shaped pipe network to effectively avoid one point destruction causing the overall destruction of the natural gas pipeline network; and Constructed facilities near the end user, heightened flood defenses to improve resistance against natural disasters.
	Extremely hot weather	The health and safety risks of employees, the operating costs of temperature control in the stations, and the maintenance costs of gas supply facilities may increase.	• We formulated an emergency rescue plan for heat stroke.
	Extremely cold weather	The health and safety risks of employees, the operating costs of temperature control in the stations, and the maintenance costs of gas supply facilities may increase.	 Implemented safety risk prevention and control measures for employees to protect their safety under extremely cold weather; and Established winter gas supply working groups in each member company to insure gas supply for customers. The working groups will carry out temperature forecasting, monitoring, analysing and reporting of changes in resource supply and demand, as well as reviewing and updating their responses so as to actively prepare gas sources in advance to ensure stable supply.
Chronic Dicks	Sea level rise	Existing operating pipeline network and equipment and facilities may be damaged, and existing market may be affected due to migration of cities from coastal regions to inland.	 We continuously monitor the trends of sea level rise; and Research relevant loss prevention and emergency plans.
Chronic Risks	Global warming	The risk of heat waves, droughts and fires may increase the maintenance costs of gas supply facilities. The energy consumption of gas supply facilities in the winter may decline.	• We formulated an emergency plan for extreme environments and an emergency rescue plan for heat stroke.

Climate Change-related Physical Risks List



Climate Change-related Transition Risks

	Impact	Countermeasures
Transition Risks	In the future, the national energy structure will shift to non-fossil fuel energy. We are responding to the national energy policy by vigorously developing our integrated energy business, adjusting the proportion of renewable energy in the current business to better respond to market demand, and providing downstream customers with more diversified green and low-carbon energy solutions.	To respond to the transition risks posed from climate change, ENN Energy actively promotes the utilisation and research and development of renewable energy such as solar, geothermal, and biomass energy. In 2020, ENN Energy further increased the proportion of photovoltaic energy used and explored new technologies for geothermal heat pump development, achieving significant environmental and economic benefits. In 2020, we provided customers with green solutions to create a low-carbon future, such as assisting customers in completing energy-saving modification projects and providing renewable energy technologies and solutions.

Climate Change-related Opportunities

Future Trend	Climate-related opportunities	The March
Low- and zero- carbon transition of	ENN Energy's rapid development of natural gas business continued in 2020 as, local governments continued to promote energy structure optimisation, multi-energy	ENN Energy's Solar Panel Layout
the whole society	complementation, "coal-to-gas" conversion, and domestic natural gas price reductions.	

Carbon Reduction Targets

In 2020, ENN Energy comprehensively reviewed the energy use status of its city gas business, analysed energy use structure and GHG emission data, and assessed its potential in carbon emission reduction. At the same time, the integrated energy business planned to further provide low- and zerocarbon energy solutions for downstream customers in the value chain. The Company set targets for carbon emissions generated during the operation of the city gas business, considering the future development of the integrated energy business. We also formulated mid- and long-term strategies for carbon emission reduction in the city gas business and integrated energy business:

	Mid- and long-term strategies for carbon emission reduction
City Gas Business	 We will improve the energy efficiency of the city gas business, striving to reach the international leading level within 5 years. Considering energy efficiency performance of leading companies internationally and in the context of our own historical data analysis, we will assign energy efficiency improvement targets to member companies and formulate a routine assessment plan. For projects with high energy consumption, we will carry out energy consumption inspections and diagnosis to find identify vulnerabilities, tap into energy-saving potential, and improve energy use efficiency. We will strengthen methane management through methane emission monitoring and treatment, improve boil-off gas (BOG) recovery and reinforce pipeline safety inspection and maintenance to reduce natural gas leakage. We will continue to optimise our own energy use structure, build a green energy use system, and increase the proportion of low- and zero-carbon renewable energy used in our production and operations. Moreover, we will research ways to offset carbon, such as afforestation, carbon capture, carbon offset, etc., to achieve carbon neutrality by 2050. We will also establish mid- and long-term GHG emission targets for the city gas business and aim to reduce GHG intensity 20% (Scope 1 and 2 carbon dioxide and natural gas) by 2030. We will seek to develop digitally intelligent products; improve capabilities in digital intelligence management; monitor and manage energy consumption, carbon emissions and pollutants; foster data intelligence; and enhance the ability to achieve emission reduction targets. By using advanced remote monitoring technologies such as video and infrared, the Company avoids leakage accidents such as natural gas pipeline ruptures resulting from third-party damage. We will promote the application of Internet of Things (IoT) technologies in the pipeline network, key equipment, and facilities in stations, including: cathodic pro
Integrated Energy Business	 We will promote integrated energy business and technology and increase the ratio of renewable energy utilisation (i.e., solar, geothermal, biomass, and hydrogen energy.) at all stages of project development, construction, and operation to improve energy efficiency and reduce energy consumption. We will assist the government in developing regional energy planning to achieve emission reduction targets through the following activities: integrating the demand of energy such as natural gas, electricity and heating and technology applications within the region; conducting overall planning and scientific layout, and improving the efficiency of energy use in the region. We will accelerate the development of integrated energy service to help customers improve energy utilisation efficiency and optimise energy structure. We will promote and apply digitally intelligent products across the business and enhance efficiency in energy use. We will continue to optimise and upgrade digitally intelligent products, aiming to obtain modular development and nesting capabilities by 2030. We hope to realise the full application of digitally intelligent products in the business and empower data intelligence capabilities. While increasing the proportion of renewable resource utilisation and enhancing technological capabilities, we will actively explore and research ways to offset carbon such as carbon trading and carbon sequestration.

2 CORE ISSUES

Based on our mid- and long-term sustainable development strategic plans, we have established GHG emission reduction and green targets based on the Company's business categories:

	Short-term goal by 2025	Mid-term goal by 2030	Long-term goal by 2050	
City gas business's emission reduction targets	By 2025, GHG emission intensity (Scope 1 and Scope 2 GHG emissions combined/natural gas sales) will be reduced by 10% (baseline 2019).	By 2030, GHG emission intensity (Scope 1 and Scope 2 GHG emissions combined/natural gas sales) will be reduced by 20% (baseline 2019).	Strive to achieve net zero	
Integrated energy business goal to provide zero-carbon energy to downstream value chain	By 2025, we will achieve newly installed photovoltaic capacity of 2.2 GW.	By 2030, we will achieve newly installed photovoltaic capacity of 4.7 GW.	2050.	

Efforts made to further reduce carbon emissions:

	By 2025	Ву 2030
Carbon capture	 We will research and track the latest developments in carbon capture technology. We will strive to complete the demonstrative application of 1-3 integrated energy projects. We will develop new carbon capture technologies and complete technological application plans with independent property rights. 	 We will advance research on carbon capture technology in alignment with the national Five-Year Plan. We will strive to complete demonstrative applications of more integrated energy projects. In alignment with the national Five-Year Plan, we will continue to develop new carbon capture technologies and complete more technological application plans with independent property rights.
Carbon offset	 Relying on new development projects, we will build 2-3 carbon neutral (zero carbon emission) integrated energy projects. We will extensively plant trees in the production, living and office areas of the projects. The Company has offset 5% of carbon emissions from existing integrated energy projects through projects such as the China Certified Emission Reductions (CCER) and the purchase of carbon credits. 	 Relying on new development projects, we will add 4-6 carbon neutral (zero carbon emission) integrated energy projects. The Company will gradually offset the carbon emissions brought by fossil fuels in newly-added integrated energy projects through the development of renewable energy utilisation projects based on photovoltaic and biomass to achieve the CCER, as well as carbon credit trading to help the integrated energy business achieve peak carbon emissions.

At the same time, ENN Energy is actively working to neutralise the carbon emissions generated by its operations through various methods. For example, we have planted 15,289 trees in the ENN Energy Science and Technology Park, which is equivalent to the neutralisation of approximately 352 tons of GHG emissions.

We are always focused on providing clean and low-carbon energy to our customers by investing in and utilising photovoltaic energy, industrial waste heat, biomass and other renewable energy in accordance



Integrated energy solutions helped customers to reduce **4,444,264** tons of carbon dioxide emissions

with local market demand. We provide customers with sustainable integrated energy solutions through multi-energy complementation and technological innovation to increase energy use efficiency and the proportion of clean and low-carbon energy, thereby fostering a clean and lowcarbon energy ecosystem. In 2020, our integrated energy solutions successfully reduced energy consumption by more than 1,476,085 tons of standard coal, which effectively promoted energy transformation and improved environmental benefits.

In 2020, ENN energy further increased the proportion of photovoltaic energy used in our Langfang headquarters office building. The total electricity consumption from new energy is approximately 14,775.2 kWh, accounts for roughly 5% of the total



ENN Science and Technology Park

electricity consumption. Ten geothermal heat pump units were used at the ENN Energy Langfang Science and Technology Park to provide all of the heating and cooling operations for the park, supplying heating of 6,657 kWh in the winter and cooling of 7,710 kWh in the summer, translating to significant energy savings.





2.2 GHG Emission Reduction

ENN Energy strictly controls GHG emissions by establishing internal systems such as the Sustainable Development Policy in accordance with the Energy Conservation Law of the People's Republic of China, the Cleaner Production Promotion Law of the People's Republic of China, the Circular Economy Promotion Law of the People's Republic of China, the Renewable Energy Law of the People's Republic of China and other laws and regulations. We also explore other possible ways to reduce carbon emission in our operations, and help corporate and residential customers achieve GHG emission reduction through the use of renewable energy, coal-to-gas projects, methane emission management, and new energy R&D cooperation.



Emitted **209,692** tons of GHG¹ in 2020, with a year-on-year decrease of **20.24%**⁴



- **2020** 2019 2018
- 1 GHG emission coefficients were calculated with reference to the Reporting Guide for Environmental Key Performance Indicators published by the Hong Kong Stock Exchange, the Average Carbon Dioxide Emission Factors of Chinese Regional Power Grids issued by the National Development and Reform Commission, and the default value table of fossil fuel characteristic parameters.
- 2 Direct GHG emissions (Scope 1) cover the direct emissions from energy (coal, diesel, gasoline, natural gas), which is consumed by natural gas retail business and gas wholesale business of ENN Energy Headquarters and subsidiaries companies during operation;
- 3 Indirect GHG emissions (Scope 2) cover the indirect emissions from electricity purchased, which is consumed by natural gas retail business and gas wholesale business of ENN Energy Headquarters and subsidiary companies during operation.
- 4 Affected by the epidemic in 2020, the outsourcing power of office and gas station decreased. As a result, the indirect emission density of GHG (taking volume of gas sold as the denominator) decreased significantly compared with the same period in 2019.



Methane Emission Management

ENN Energy closely monitors GHG emissions resulting from methane leakage and release. We implement technical upgrades to gas transmission, distribution, and storage processes by equipping gas filling stations, storage, and transportation facilities with recycling equipment to continuously implement BOG recycling.



Cooperation in New Energy R&D

ENN Energy highly values partnerships with organisations, such as industry associations/societies, universities, scientific research institutions, suppliers. and industry companies. Together we promote technological advancement in areas such as cutting-edge technology trends, advanced technologies, technical standards, technological innovation and product development. In 2020, we focused on special projects such as intelligent gas-operation and low-carbon, highefficiency energy technology. We also participated in major industry conferences and exhibitions to share resources and knowledge, held special technical seminars with local colleges and universities such as Harbin Institute of Technology, completed academic exchanges, and partnered with nearly 60 organisations in more than 15 technological fields.

Carbon Emission Verification and Carbon Footprint

As parts of the country have begun to implement pilot projects for carbon emissions trading, various opportunities and challenges related to ENN Energy's carbon emissions and verification process have arisen. ENN Energy seeks to further understand the overall impact of GHG emissions produced as a result of operations and possible responsibilities

Renewable Energy Use

ENN Energy actively promotes the use of alternative energy, including sourcing renewable energy such as solar, geothermal, and biomass energy to achieve energy conservation and emission reduction.

In addition, ENN Energy explores and develops new technologies in regions rich in geothermal resources. After several years of development, a variety of selfdeveloped geothermal energy utilisation solutions such as "rock-based heat pump" and "groundwater-based heat pump" were developed, using rocks and deep groundwater to store heat, thereby harvesting significant environmental and economic benefits. By the end of 2020, ENN Energy had 4 geothermal resource projects under operation. Focusing on areas with abundant biomass energy such as Shandong, Hainan, and Guangxi, ENN Energy adapts to local conditions in order to utilise the resources. ENN Energy's proprietary technology "rapid pyrolysis for thermal carrier biomass" regenerates a wide range of abundant local renewable sources such as plant straws and sawdust into biomass products, which produce extra heat that can be used locally. In 2020, a total of six biomassbased integrated energy projects were in operation or under construction.



Partners	Exchange and cooperation projects
Hebei University of Technology	Application of renewable energy in heating scenarios, phase change materials for cold storage, detection technology services, acoustic wave positioning in pipelines, new pipe technology, hydraulic balance in heating network, biomass-based hydrogen production, etc.
Harbin Institute of Technology	Mobile heating technology, energy storage materials and applications, low-nitrogen and high-efficiency combustion of gas, heat pumps, comprehensive utilisation of biomass, etc.
Beijing University of Science and Technology	Demonstrated cooperation in the low-carbonisation of iron- smelting or ironmaking processes, including fuel technology research on the replacement of part of coal by natural gas in blast furnace iron-making, sintering and pelletising processes

and risks associated with such emissions. Moreover, we hope to discover the most cost-effective, opportunities for emissionreduction through the estimation and measurement of GHG emissions. In 2020, ENN Energy started the ISO 14064 GHG emission verification process for 117 member companies. The process was completed in March 2021, and the 2020 GHG verification report was issued.



Started the **ISO 14064** GHG emission verification process



At the same time, ENN Energy conducted a carbon footprint analysis to further understand the environmental impacts of our company's operations and to explore the opportunities for future carbon emission reduction. In 2020, ENN Nanjing Intelligent Technology Co. completed a carbon footprint certification process⁵, which calculated the carbon emissions per unit of the JZT-M835G, a natural gas stove, and determined that each unit processed equated to 63 kg of carbon dioxide equivalent (CO₂e).



Nanjing Intelligent Technology Co.

Improving Energy Efficiency of Customers

ENN Energy provides tailored energysaving services based on customer's energy consumption characteristics by surveying customer's production processes and energy supply facilities in order to increase customer's energy efficiency while reducing emissions. In 2020, we engaged with customers in industries such as glass, automotive, furniture, heating, and pharmaceutical, and successfully built energy optimisation demonstration projects for these key industries. Through clean energy substitution, energy cascade utilisation, waste energy recycling, steam quality and efficiency improvement and other energy-saving technologies, we optimised customers' energy systems in a targeted and innovative manner, improved their equipment's energy efficiency, and reduced their energy costs. Upon the completion and verification of the demonstration projects, these innovative solutions will be replicated and expanded to more customers to promote energy saving and emission reduction.

Customers' processes	Demonstration projects of process energy optimisation and their effects
Evaporation and concentration process in pharmaceutical manufacturing	We helped a customer in the pharmaceutical industry to significantly recover the low-grade waste heat in the flue gas of boilers to produce high-temperature hot water and partially replace the steam required in the evaporation and concentration process. It is expected to help the customer save approximately 870,000 cubic meters of natural gas consumption each year, which is equivalent to increasing the boiler energy efficiency by 6.8%.
Low-temperature drying process for solid wood furniture	Using air-source heat pumps to produce hot water instead of the original biomass boilers, we provided a thermal source for the furniture drying process for a customer in furniture manufacturing industry. This energy- process optimisation can help customer to address the environmental problems of biomass-based direct-fired boilers and improve energy efficiency.
Low-Spray drying process for automobiles	The spray drying process for automobiles originally used indirect heat exchange for the flue gas of hot blast stoves. We helped the customer to switch to direct heat exchange for purified flue gas. This energy-using process optimisation can improve energy conversion efficiency and save 20% of natural gas consumption. The hot blast stove modification alone is expected to save the customer 50,000 cubic meters of natural gas consumption every year.
Using printing and dyeing steam differential pressure to generate electricity	Utilising the difference between the inlet steam pressure in the plant and the actual steam pressure in the process, the steam power generation equipment was installed to convert the pressure difference into electric energy, making effective use of pressure energy to provide 1.62 million kWh of electricity to the customer every year.
Glass furnace waste heat recovery	Based on the understanding of the energy-consuming usage of customers in the glass industry, we invested in and built waste heat boilers to recover the waste heat of high- temperature flue gas from glass furnaces. We transformed it into steam and hot water for other surrounding customers as source of heating for both production and daily life uses.

5 The product carbon footprint report in the certification was in compliance with ISO/TS 14067:2018 Greenhouse Gases – Carbon Footprint of Products – Requirements and guidelines for Quantification and PAS 2050:2011 Specification for the Assessment of the Life Cycle Greenhouse Gas Emissions of Goods and Services.

2 CORE ISSUES



Sino-German Integrated Energy Station uses heat exchange to eliminate white smoke and improve energy efficiency

ENN Energy's Qingdao Sino-German Integrated Energy Station has adopted the deep waste heat recovery from flue gas to carry out technical transformation of gas boilers to absorb the waste heat in the flue gas and reduce the flue gas temperature, thereby eliminating the white smoke (flue gas containing water mist) generated by gas boilers in winter and achieving the dual effects of white pollution control and waste heat recovery.

After the implementation of the project, the integrated energy station increased the energy efficiency and expanded the heating capacity. The solution has a wide range of applications and is highly replicable, not only creating economic benefits but also improving the environment.



White smoke elimination and waste heat utilisation at the Sino-German Integrated Energy Station



Before transformation (dense smoke tailing 35m) After white pollution control (thin smoke tailing 10m)

During re-heater operation (white smoke eliminated)



In addition, ENN Energy continues to develop the coal-to-gas market, helping companies and communities achieve cleaner and more efficient energy use. In 2020, the Company conducted "coal-to-gas" projects equivalent to a daily installed natural gas capacity of 4.78 million cubic meter per day, offsetting the consumption of more than **6,196** tons of standard coal per day.





ENN Hebei Branch and Beijing University of Science and Technology cooperate on coal-to-gas technology innovation in the iron and steel industry to reduce carbon emissions

ENN Hebei Branch cooperated with Beijing University of Science and Technology for the conversion of coal to natural gas in the iron and steel industry. By blending part of natural gas in the blast furnace, the amount of coal used is reduced, and the dual effects of cleaner production and carbon emission reduction are achieved. This school-enterprise cooperation demonstrates the potential for industry technology innovation, energy savings, and emission reduction, as well as improving economic and environmental benefits.



Providing Green Solutions

ENN Energy provides customised green energy solutions for customers in various industries. Relying on the detailed analysis of customers' industry and energy consumption usage patterns, in conjunction with years of project operation experience, we can provide a variety of new energy utilisation or transformation programs in fields such as solar and biomass energy to help customers save energy and reduce emissions.



ENN Energy assisted a building material company in Anhui to realise distributed photovoltaic power generation

The main product of a building material company in Anhui is known as the "green, new environment-friendly building material". It is a high-quality, prefabricated building component that is strongly promoted by the country and generally valued by the construction industry across the world. In 2020, we invested in and operated a 0.8 MW distributed photovoltaic power plant using the combination of "photovoltaic + electricity sales" to meet the company's demand for reducing electricity costs. We assisted the customer in installing energy efficiency monitoring terminals to monitor the corporate energy usage pattern and reserve space for photovoltaic capacity expansion. In 2020, the company's first phase of photovoltaic power plant sold 5 million kWh of electricity as an agent, demonstrating the utilisation of photovoltaic power generation.



800,000 kWh of electricity produced by photovoltaic in the first phase

2 CORE ISSUES



Clean energy utilisation in Yangpu Industrial Park, Danzhou, Hainan

Yangpu Industrial Park possessed a great amount of energy consumption. Existing large enterprises in the park had their own energy systems. The park had an underdeveloped energy infrastructure with a low utilisation of clean energy, causing heavy pollution. The low utilisation rate of facilities in the park and the lack of willingness of large enterprises to supply energy externally resulted in high gas heating costs, leading to a decline in enterprise investments opportunities. After assessment of the situation, ENN Energy acquired the thermal power-management right. Making full use of "solar energy + biomass + waste heat and waste energy + existing facilities", we met the various needs of the enterprises in the market for electricity, heating, and cooling. We also optimised the energy structure, reduced energy cost, and enhanced the image of the park.



Renewable energy and clean energy accounts for over **80%** and **100%** respectively

Designed thermal

effciency of Longzan

biomass project reached **78%**





Guangxi Longzan Biomass Project

The Longzan project is the first biomass-based integrated energy project of Chongzuo ENN Energy in the Guangxi province. The first phase included building a $1\times20t/h$ biomass fuel boiler with supporting facilities, a 3,000-meter heating pipe network, and a condensate recovery system. It was officially launched in March 2018 and put into trial production on October 7, 2019. Currently, the project uses biomass as fuel, achieving the both energy conservation and water conservation.

At the same time, relying on our own experience in multi-type and multi-scenario development, design, construction, and operation of integrated energy business, we assist local governments in executing special energy plans for natural gas, electricity, and heating in the region. To improve energy efficiency and reduce emissions within the region, we assist the government in integrating various regional energy needs and technology applications, coordinating energy demand and energy supply; providing recommendations for regional energy planning, energy infrastructure construction, and energy operation management's decision-making process. The process provides a path forward for the regional carbon neutrality strategy.





2.3 Biodiversity and Land Use

ENN Energy has established internal policies such as the Biodiversity Protection Policy in strict accordance with the Environmental Impact Assessment Law of the People's Republic of China, the Land Management Law of the People's Republic of China, the Soil and Water Conservation Law of the People's Republic of China, the Regulations on the **Environmental Protection Management** of Construction Projects, the Regulations on Environmental Impact Assessment of Planning, among other laws and regulations. We strictly supervise the entire cycle of the project to prevent possible ecological damage. Taking into full consideration the potential damage to the surrounding ecological environment and biological habitats caused by project operations, we take the initiative to reclaim disturbed land and habitats. At the same time, we fully respect the indigenous people and reduce the impact on the community. In 2020, ENN Energy had no major incidents that resulted in lawsuits or corresponding penalties due to environmental violations.

Biodiversity Conservation

ENN Energy actively participates in public environmental programs related to biodiversity conservation and takes diversified approaches to advocate for environmental protection during annual events such as "World Environment Day". We actively organise employees of departments and subsidiaries to participate in philanthropic environmental protection activities and lead by example through contributions to environmental protection. In 2020, ENN Energy supported various undertakings of environmental protection, biodiversity conservation, and ecological restoration to support the construction of a "Beautiful Homeland".



hours participating in public-668 people and RMB**1.1** million invested

Liaoning







ENN Energy donated funds to support Noah's Ark for building the Naban River Nature Education Base and improving the environmental protection practitioners' capacity

In order to jointly promote ecological protection and sustainable development, ENN Charity Foundation donated RMB100,000 to the Society of Enterprise & Ecology (SEE) Foundation to support the Noah's Ark Project for the repair of the field workstation of the Naban River Nature Conservation Education Foundation and other tasks.



After installation and commissioning, the field workstation has been used for conferences and training to promote the practice of biodiversity conservation and ecosystem protection in the mountainous regions of Southwest China and facilitate the implementation of nature conservation education, training and experimental activities in an efficient manner. It has become a venue for international and domestic environmental protection organisations at all levels to provide education and training sessions on nature conservation and is a relatively independent and convenient workplace for field work. Donated funds to support bodiversity protection project







ENN Chuzhou actively participates in wildlife conservation public events

In order to further enhance the public's awareness of wildlife conservation and protect the wildlife in Langya Mountain, ENN Chuzhou engaged various neighborhoods and communities in discussion on wildlife conservation activities. ENN volunteers shared their knowledge of laws and regulations on wildlife conservation by hanging banners, posting slogans, and distributing wildlife conservation leaflets to promote discussion around protecting wildlife. We also promote an healthy mindset to advocate the public to not kill, confine, harm or trade wildlife.



Wildlife conservation public event





Slope rehabilitation and biodiversity protection at Longyan ENN Gaobei Station

As the upstream pipeline did not yet extend to the operating area, Longyan ENN needed to build a LNG storage and distribution station at the Gaobei station which is located at the foot of the mountain. Construction was completed to fix the steep slope where the station was going to be built. After the slope was fixed, the Company immediately replanted the vegetation. After one year, the replanted vegetation restored the original ecological environment, protecting the living environment of local wildlife.





Jaopo Station's revegetation achievements



ENN Yueyang participates in the protection of swan habitat in Donggu Lake Wetland

In 2020, thousands of swans migrated to Donggu Lake Wetland in Quyuan Management District of Yueyang City in the winter. ENN Yueyang Gas Co. actively responded to a call from the Natural Resources Bureau of Quyuan Management District and organised its employees to help protect the swans. Volunteers at the site persuaded bird watchers not to harass swans at close range, shared knowledge about laws and regulations for protecting migratory birds in winter, and helped the public consciously protect migratory birds and the wetlands.



Migratory birds pass the winter in the swan habitat

2 CORE ISSUES



Revegetation of LNG storage and distribution station on Zhanjiang Donghai Island

In response to the call of "playing your part in greening the homeland", Donghai ENN Gas Co. (a wholly-owned subsidiary of Zhanjiang ENN Gas Co.), located in the Zhanjiang Economic and Technological Development Zone, actively planned the site revegetation and completed construction of the LNG storage and distribution station in Donghai Island in October 2020. The total investment of the project is RMB 250,000. The construction of this project contributed to the beautification of the urban environment and helped to improve air quality and create a collaborative atmosphere to restore the ecological environment.



Revegetation area of **4,501** m², with total vegetation rate of 22.5%



Revegetation of LNG storage and distribution station on Zhanjiang East Island

Green Construction

In order to mitigate the environmental damage that may occur during construction, we stipulate the principles to be strictly followed during the design and construction of large scale projects. Before construction, an environmental assessment, safety assessment, and occupational health assessment should be carefully completed. Stricter evaluation standards are set for water sources, animal habitats, and other areas of ecological protection. Construction is strictly prohibited in nature reserves, ecological function areas, forest parks, and dense forest areas. During the construction, low-noise equipment shall be selected to reduce the sound source level. We do our



Length of trenchless pipeline construction was **2,495** kilometres, accounting for **35%** of the total pipeline length



best to reduce the disturbance of trees, vegetation or animal nests, and properly dispose of various wastes in accordance with laws and regulations to prevent environmental hazards . After the project is completed, we will restore the original site to its original state over time and prevent additional damage to the environment as a result of delayed restoration. In 2020, ENN Energy built a new buried pipeline network with a length of 6,966 kilometers.





Huaihua City's sub-high pressure pipeline construction prioritises to water and soil conservation

The pipeline network construction in Huaihua City, Hunan Province, needed to pass through Hecheng District, a national key soil erosion control area in the middle reaches of the Xiangjiang River. In order to reduce the impact on the local environment during and after the construction, we developed the "Report on the Soil and Water Conservation Plan". Following the Plan, we implemented water and soil conservation measures, actively controlling the water and soil loss in strict accordance with the management system. We increased efforts in sharing our water and soil conservation efforts with the public. In addition, we conducted water and soil conservation monitoring and actively cooperated with the water administration department during conservation inspections. The project was successfully completed and will serve as the benchmark for future ENN projects in soil and water conservation.



Soil and water control rate reached **98.6%**



Forest and grass vegetation restoration rate reached **98.5%**



Green construction measures at Suchu Industrial Park

In 2020, a pipeline network construction project was completed at one section of the Suchu Industrial Park. In order to reduce the impact during the construction process, the contractor created protective measures to ensure green construction in strict accordance with the regulations of the environmental protection bureau:

- 1 Enclosed construction fences and dust-proof nets were set up during construction;
- 2 For damage to vegetation caused by the construction, site reclamation and revegetation efforts were taken to restore the land surface and ecological environment over time;
- 3 The contractor strengthened solid waste management practices and adopted separate collection during construction to prevent secondary pollution;
- 4 The garbage generated by the engineering personnel during construction was collected at designated locations by the sanitation department for removal and disposal;
- 5 Noise pollution, prevention, and control measures adopted, such as utilising lownoise equipment;
- 6 Atmospheric protection measures were implemented to ensure that exhaust gas met the secondary standard in the Comprehensive Emission Standards for Air Pollutants;
- 7 After the completion of construction, sprinklers were used to clean the road surface and reduce dust pollution.

The above measures effectively controlled the adverse impact of construction on the surrounding environment.



 Ecological environment & land was restored;

• Solid waste management was strengthened;

 Noise pollution was controlled and prevented;

 Atmospheric protection measures & dust control were implemented







2.4 Equal Employment and Health & Safety

ENN adheres to the concept of "employees are the most precious wealth of the Company". We value the health and safety of employees and respect their human rights. Through comprehensive systems, specifications and meticulous supervision and inspection, we fully protect the legitimate rights and interests of employees and provide them with a healthy and safe platform for career development.

2.4.1 Equal Employment

ENN Energy adheres to a diverse, transparent and equal approach to employment and protects the rights and interests of every employee. We strictly abide by the Labor Law of the People's Republic of China, the Labor Contract Law of the People's Republic of China, the Social Insurance Law of the People's Republic of China, the Employment Promotion Law of the People's Republic of China, and the Decision of the State Council on Amendments to the Regulations of the State Council on Working Hours of Employees, among other national laws and regulations. We have formulated and promulgated internal policies such as the Regulations for Recruitment Management, the Rules for Employee Appointment, and the Talent Development and Employment Policy to strictly eliminate all forms of discrimination based on gender, ethnicity, belief, age, nationality, region, etc. and illegal hiring practices such as employment of child labor and forced labor. Once a violation is discovered, we will terminate the labor relationship as soon as possible, notify the relevant government agency, and address it in accordance with applicable laws and regulations.

In 2020, ENN Energy received 34 laborrelated complaints. Once a complaint is received, the Company initiates the investigation process, investigating the incident, collecting evidence, and maintaining two-way communication with employees. All labor-related complaints in 2020 were properly handled under the Company's active coordination and resolution process. In addition, the Company values employees' feedback and appeals and seeks to promptly review and address complaints in order to improve employees' office environment, benefits and communication channels. Through this process, we continuously strive to effectively solve labor problems for employees and improve their satisfaction.

Indicator	Unit	2020	2019
Number of Employees	Persons	35,780	35,735
Male	Persons	26,923	26,464
Female	Persons	8,857	9,271
Fulltime	Persons	35,653	35,604
Halftime	Persons	127	131





ENN Energy seeks to build a diverse employee base and workforce. We actively fulfill our social responsibilities by proactively providing jobs for the disabled or other disadvantaged groups. In 2020, ENN Energy had 35,780 employees, all of whom had signed labor contracts with us in accordance with applicable laws and regulations. In addition, we signed labor contracts with 80 disabled employees and recruited 1,190 minority employees to achieve diversity in recruitment and fulfill our corporate social responsibility goals. During the reporting year, 3,385 employees departed from the Company.









ENN Energy seeks to promote democratic exchanges. The Company has grassroots democratic organisations such as labor unions and "Employee Home" for employees to associate freely and express democratic opinions. In addition, the Company carries out activities such as "Employee Reception Day" and Workers' Congress to regularly collect feedback from various departments and respond with solutions in a timely manner.



Collective bargaining agreement covered **100%** of employees



Shijiazhuang ENN Gas launches "Employee Reception Day" activities

In 2020, Shijiazhuang ENN Gas supported "Employee Reception Day" activities. The Company's head, party secretary, and labor union chairman took turns to host employees on the 15th of each month. Through face-to-face communication between employees and management, we obtained feedback on areas such as corporate management, corporate development, personal career development, and response to employees' interests. The company hopes that the in-person conversations increase the efficiency in addressing actual issues raised by employees, which supports grassroots democratic exchanges. Total of 12 sessions,

hosting 22 groups of employees and responding to **37** questions and suggestions



Kaifeng ENN Gas held a workers' congress to actively discusse the company's business development, internal management coordination, employee development, and welfare benefits on December 17, 2020.



Kaifeng ENN Gas's 3rd Workers' Congress

2.4.2 Health and Safety

2020 was ENN Energy's "Safety Compliance Year". The Company established the concepts of "Knowing the Key Points, Discovering the Weak Links, Designating Responsible Personnel" and "Safety Must Become ENN's Brand". We strictly abide by the laws and regulations including the Work Safety Law of the People's Republic of China, the Occupational Disease Prevention and Control Law, the Regulations on Occupational Health Supervision and Management in Industrial Sites, and the Selection Standards for Personal Protective Equipment. In order to identify and mitigate occupational health and safety hazards to employees, we also adhere to the Supplier HSE Policy, ENN Energy Regulations for Safety Management, Management Regulations for Work Safety, Management Regulations for the Red and Yellow Safety Lines, and Management Measures for Emergency Response to Production Accidents, among other corporate management systems. We protect the health and safety of our employees through investment in advanced HSE management systems and promotion of a corporate culture that prioritises health and safety.



17 member companies obtained OHSAS18001 or IS045001 certification



By the end of 2020





ENN Energy's Safety Indicators in 2020

Indicator	Unit	2020	2019
Number of fatalities due to production incidents	Person	1	1
Total Recordable Incidents	Incidents	91	74
Total Recordable Incident Rate (excluding fatalities)	%	0.25	0.25
Total Recordable Incident Rate (per thousand employees) ⁶	Rate	2.54	2.07
Lost Time ⁷	Hours	29,233	53,659
Lost Time Incident Rate (LTIR) ⁸	Rate	1.27	1.04

Safety management

ENN Energy is constantly improving its safety organisation and management systems under the oversight of the Safety Production Committee (Safety Committee) as the highest safety management agency. We take Quality, Health, Safety and Environment (QHSE) as the highest executive department. Additionally, provincial companies and member companies have also established safety committees to manage local safety management. Top managers at the provincial level are responsible for effectively implementing health and safety management. In addition, the Company conducts operational inspections and energy safety assessments for all subsidiaries.



Through the implementation of this digital system, our safety management was more efficient and effective.



ENN Energy equips employees with smart helmets

In order to effectively guarantee the safety of high-risk positions, such as workers at city-gate an gas stations, and person in charge of on-site project safety and supervision, ENN Energy equipped these workers with "smart helmets". The smart helmet allows workers to digitally record and upload location and positioning details to facilitate communication between on-duty staff and improve response in emergency situations.



- 6. The Total Recordable Incident Rate (per thousand employees) is calculated as 1,000 multiplied by the number of work-related incidents dived by the total number of employees.
- 7. The Lost Time indicator reports the number of hours worked lost as a result of either on-site or off-site work-related incidents.
- 8. The Lost Time Incident Rate (LTIR) is calculated as the number of LTIs divided by hours worked, multiplied by 1,000,000.



Safety culture development

ENN Energy is continuously improving its employees' awareness of early warning measures and safety protection through safety-focused events such as Safety Production Month, 100 Days without Accidents, and Ankang Cup. In order to prevent the spread of COVID-19, occupational health and safety training for 2020 was conducted online instead of face to face. In addition, we encourage employees to proactively identify safety hazards and reporting hazards in real time through the online APP.



"Safety Photo Shooting" program

In order to enhance safety awareness and identify and prevent safety hazards to all employees, ENN Energy launched a "Safety Photo Shooting" program. Employees take photos of safety hazards via their mobile phones and upload photos to the iCome platform. The photos are then directed to dispatchers at the appropriate member companies who are responsible for resolving the safety hazard. After the rectification is completed, the uploading and rectification personnel will get corresponding points, which can be exchanged for in-kind incentives.





"Safety Map" program

In order to "Know the key points and discover the weakness" in safety management, the Company developed the "Safety Map" program. Each member company enters important safety risk considerations such as hidden hazards, equipment and facility conditions, contractor conditions, and dangerous operation conditions into the system which then automatically evaluates the safety risk level, displays and supervises the key points for daily safety management, and guides managers at all levels to improve the safety management.



In 2020, more than 34.000 safety maps were generated





2020 2019



Occupational health protection

In alignment with the "Three-Level Occupational Health and Safety (OHS) Organisation System", ENN Energy implemented various health and safety measures to provide employees with the safety work environment, including: avoiding occupational hazards and regularly screening employees' health and providing special protection. In 2020, all employees were provided with regular bodycheck and no work-related illnesses were identified.



Regular employee bodycheck coverage in 2020 maintained **100%**

	Company headquarters	Headquarters safety production committee QHSE department department of member companies	
The Three Level OHS Organisation System	Provincial (directly affiliated) companies	General Manager of provincial companySafety director of provincial (directly affiliated) companiesMember companies (each company equipped with a full-time safety officer)	
	Member companies	Member Enterprise Functional departments Production Safety Committee of member companies teams	
	Regular detection for occupational hazards	 Identification of hazards in new projects, adoption of control measures and continually updating the list of hazards. Regular monitoring and assessment of occupational hazards. 	
	 Monitoring employee health New employees are provided with pre-screening bodycheck which include routine examinations and targeted examinations for hypertension, heart disease, and hearing. Employees with high blood pressure, heart disease or hearing impairment are not assigned to jobs with occupational health hazards at gas stations or inspection stations. For positions with occupational health hazards, at least one physical examination is required to be conducted every year. Records are kept of occupational health examinations. If employees are found to be suffering from work-related illness after resignation, the records are used to determine whether work-related factors contributed to the the illness. If so, employees may apply for retroactive compensation up to ten years after resignation. 		
 Providing position-specific protection Providing construction Providing position-specific protection		 Employees who work in a noisy environment for a long period of time are required to wear protective equipment, such as earplugs, and are required to take breaks. Positions exposed to high temperatures are arranged in varying shifts to avoid 	



Contractor safety management

ENN Energy integrates OHS awareness into the supply chain. In order to better manage OHS issues of suppliers, we have created the Supplier HSE Policy and Supplier Corporate Social Responsibility Code of Conduct, which incorporate assessment of health and safety into the initial supplier evaluation process.

We take the following measures to monitor supplier safety:

- 1 Relevant certification are required for key positions;
- 2 Contractors are required to complete initial and refresher safety production training and pass the assessment before the start of construction;

- 3 Contractors are required to use their own Personal Protective Equipment (PPE) that meet job requirements, and to prepare and register the PPE regularly;
- 4 Suppliers are encouraged to identify and mitigate various hazards and risks in the production process by installing cameras and conducting in-depth, on-site management and inspection for high-risk operations;
- 5 The accountability system is automated, so that in the event of violations, such violations will be traced back to the relevant personnel and linked to their performance;
- 6 We set safety accident control targets for contractors and require suppliers to report safety incidents to the headquarters in a timely manner and to handle them properly.

Through the above measures, we ensure that contractors provide qualified, safe products and services which minimises occupational hazards in the production process. We conduct OHS assessments for all permitted suppliers before acceptance.

2.5 Business Codes of Conduct and Supply Chain Management

ENN Energy adheres to the principles of "upholding conscience, advocating selfdriven development, deriving success from data, and being willing to share", and is committed to maintaining the highest standards of business ethics and building a transparent, open, honest and fair corporate culture. We abide by our code of conduct and maintain a zero-tolerance policy for behaviors which violate our code. Furthermore, we actively practice responsible procurement to build a sustainable supply chain, maintain longterm cooperative relationships with suppliers based on mutual trust, and support each other for common growth.

2.5.1 Business Codes of Conduct

ENN Energy strictly abides by laws and regulations including the Supervision Law of the People's Republic of China, the Company Law of the People's Republic of China, the Anti-Monopoly Law of the People's Republic of China, the Anti-Unfair Competition Law of the People's Republic of China, the Interim Provisions of the State Administration for Industry and Commerce for the Prohibition of Commercial Bribery and other applicable laws and regulations related to anti-corruption and business ethics. We have issued the ENN Energy Guidelines for Anti-Corruption and Anti-Commercial Bribery, ENN Energy Antifraud, Corruption and Bribery Policy, ENN Energy Measures for the Penalty of Employees' Violation of Rules and Discipline, and the Employee Code of Conduct, among other policy documents. These policies require employees to be honest and selfdisciplined and to improve their business ethics. In addition, the policies clarify provisions related to whistleblower protection.

ENN Energy operates in strict compliance with laws and regulations and resolutely opposes any form of fraud, corruption, and other unethical behaviors. We have established a system of fraud prevention and punishment and continue to improve inspection and supervision mechanisms for prevention and control. We conduct anti-corruption and internal audits every year. In 2020, ENN Energy conducted audits for outgoing personnel, economic responsibility audits, internal control risk audits, and special audits of procurement and engineering. We also held 21 training sessions on ethics and integrity in which over 1,700 employees participated. We require all employees to sign the ENN Energy Integrity and Compliance Commitment and include it in the employee's personal conscience tag. All employees signed the ENN Energy Integrity and Compliance Commitment in 2020.

In order to enhance employees' awareness of anti-corruption, ENN Energy actively conducts various activities to foster an ethical corporate culture and strengthen our commitment to ethical behavior. ENN Energy conducts risk reporting, fraud training, and educational activities involving all employees on topics such as anti-corruption, covering more than 90 companies. Additionally, we also link violations and frauds with the performance and salary of executives. ENN Energy prohibits employees from accepting any commissions, donations and sponsorships related to the Company's business activities and prohibits any employee from accepting payment to expedite or ensure routine government practices. ENN Energy prohibits political donations or sponsorships to organisations that support illegal activities, violate international conventions, support terrorist activities, or discriminate based on religion or gender. To promote reporting of violations, there is a telephone number and an email address available on ENN Energy's official website and a complaint function on the iCome platform. We encourage employees to report violations once discovered, perform strict investigation procedures, and address violations seriously, while protecting the confidentiality of whistleblowers.


We require all employees to sign the ENN Energy Commitment to Integrity and Compliance Commitment, which is included in the employee's personal conscience tag. In order to enhance employees' awareness of anti-corruption, ENN Energy conducts various activities to foster an ethical corporate culture and strengthen our commitment to ethical behavior. ENN Energy conducts risk reporting, fraud training, and educational activities involving all employees on topics such as anti-corruption.



Popularise anti-corruption knowledge



All employees signed ENN Energy Integrity and Compliance Commitment



Carried out **21** training sessions on ethics and integrity with participants of **1.766**

• ENN Energy's 2020 annual meeting on compliance offered eight compliance training sessions for the senior management of all member companies with a participation rate of 100%. • Practical training on compliance skills specific to the gas industry was offered for key positions such as top management of provincial companies, member companies, financial directors, product Coverage rate of **Compliance training** managers, etc. 100% with for key positions • Business compliance training, in combination with employee more than 500 development plans, was conducted with more than 500 participants. participants • An online compliance case training program was implemented which involved the completion of six case training sessions with accompanying assessments. • Large-scale anti-corruption training was organised for all employees, external professors, and in-house counsel. • Special training on risk detection and fraud was offered for directors, management team of provincial and member companies, and key positions in engineering, procurement, products, Special training on and finance. anti-corruption



ENN Energy organised training on anti-corruption and environmental compliance for directors, heads of subsidiaries and business partners in 2020



Group discussion





no anti-corruption lawsuits in 2020

Indicators	Unit	2020	2019
Number of Significant Complaints Investigated	Case	0	0
Number of Concluded Legal Cases Regarding Corruption Practices	Case	0	0
Number of Senior Management Receiving Anti-Corruption Training	Persons	843	670
Number of Employees in Key Positions Receiving Anti-Corruption Training	Persons	623	590
Total Number of Employees Receiving Anti-Corruption Training	Persons	1,766	1,680

2.5.2 Supply Chain Management

ENN Energy fully complies with the Tendering and Bidding Law of the People's Republic of China and other relevant laws and regulations. We have adopted a series of supply chain management policies, including the Measures for Supplier Access and Management, the Measures for Supplier Performance Evaluation, the Notice on Regulating the Bidding Practice of Gas Project Construction Units, the Implementation Measures for the Access, Evaluation and Exit of Partners in the Integrated Energy Ecology (Product and Service Suppliers), to improve our supply chain management. In 2020, ENN Energy established the Material Management System to standardise material procurement, reduce procurement risks and operating costs, and create a transparent, high-quality, and competitive procurement environment.

In 2020, ENN Energy optimised the bidding procedures for projects and materials, and all employees included in the bid evaluation panels signed a letter of integrity commitment to ensure the fairness of the bidding process. In addition, at the beginning of the bidding, we publicised the dedicated complaint channels to enable all parties to supervise the bidding throughout the process.

Supplier Selection

In order to streamline the supplier admission, management, assessment and exit process, ENN Energy uses the material procurement platform to record supplier information and conduct performance appraisals of suppliers. We ensure that a supplier's processes meet our expectations, through review of the supplier's ESG performance and qualifications against standards, such as ISO14001, ISO45001, ISO9001 and other certifications. We require suppliers to prioritise environmental protection in the manufacturing process, adhere to the relevant laws and regulations of the country, and use responsibly sourced raw materials in order to reduce environmental pollution. Additionally, suppliers are required to protect the rights, interests, and social welfare of employees and create a cooperative relationship within the enterprise.

Monitoring and evaluation

During the supplier selection process, ENN Energy organises a review or onsite inspection of all suppliers within a three-year cycle in accordance with the Material Purchasing Platform's Rules for "Factory Inspection via Video" During these inspections, we send samples of the supplier's products for testing and conduct unannounced inspections. We rank the suppliers based on the evaluation results, and promptly eliminate suppliers that fail the evaluation from the selection process in order to ensure product quality and safety.

In addition, we highly value the ethical behavior of suppliers and require all suppliers to abide by the ENN Energy Supplier Corporate Social Responsibility Code of Conduct and sign the Supplier Commitment to Integrity and Self-Discipline to "jointly maintain a fair, just, transparent, honest, clean and open business environment". We maintain a "supplier blacklist" which tracks suppliers suspected of falsification and malicious operations discovered during the process of certification and inspection.

As of December 31, 2020, we had a total of 641 suppliers, of which five were from overseas, Hong Kong, Macao and Taiwan, and the top 5 key suppliers accounted for 21.7% of the total purchases.



Suppliers passed the on-site inspections and be engaged with us in 2020 (Number/ Percentage of Procurement)

> 362 83%









2.6 Customer Privacy and Information Security

While promoting digitalisation, ENN Energy values customer privacy and security of information and regards it as one of the key points of digitalisation. By continuously optimising our information management systems, we standardise the scope and authority of the use of relevant information, enhance the awareness of information security and confidentiality of employees, and ensure that customers' privacy and information security are effectively protected.

We strictly follow the Consumer Rights Protection Law, the E-Commerce Law, the Cybersecurity Law, as well as the Guidance on Internet Personal Information Security Protection, among other laws and regulations of the country and government at all levels. We have established content management requirements, such as the ENN Energy Information Security Management Regulations, ENN Energy Information Security Risk Management Measures, and ENN Energy Customer Privacy Policy to regulate the use of information by employees. In 2020, ENN Energy issued the Operational Regulations on the Preparation, Issuance, Use and Custody of ENN Energy's Documents to further promote the standardised preparation, issuance, use and custody of corporate documents, requiring relevant personnel to follow specific rules on the use of documents and confidentiality of information.

ENN Energy has optimised the structure of information security management and established the Digital Intelligence Transformation Committee. This Committee oversees information security, such as planning ENN Energy's information security strategy, supervising and managing security technology institutions, conducting security audits, and maintaining system accounts. We will continuously optimise information security strategies and related system documents and organise information security assessments, security audits, and education and trainings to enhance employees' security awareness and skills.





ENN Energy regulates employees' data operations and monitors and protects confidential corporate information through security protection software. For sensitive data involving information security, we have established a strict entry and exit approval system to archive the entry and exit information of all operators. We have established an information security management process and improved the protection mechanism for customer privacy and information security through measures such as system authority classification, system authority setting, and key information encryption. In addition, we require all employees to sign confidentiality agreements to regulate their information usage.



100% of customer service personnel signed special privacy protection agreements itoring Group

ENN Energy has incorporated information security risks into the Company's risk identification and risk management processes. We regularly supervise and inspect the management of information security; conduct daily monitoring of major information security risks; perform security vulnerability scans, offensive and defensive drills; and hold disaster preparedness drills in core business systems. In order to prevent information security incidents and avoid financial and reputational losses, we formulated emergency response plans for such incidents. The Board will be responsible for handling major security incidents. We did not receive any complaints related to personal data breaches or violations of customer privacy in 2020.





3.1 Intelligent Operations

As a clean energy provider operating under the vision of "being a promoter of the modern energy system and a globally respected clean energy company", ENN Energy is committed to providing safe and renewable energy to the region to optimise the local energy structure. ENN Energy has advocated for responsible operations, strictly controlled service quality, vigorously developed technological innovation and digital operation, and promoted the development and progress of the industry. We continue to strengthen safety and supply management, striving to improve quality of customer service and ensure the energy supply for end customers.

3.1.1 Integrated Energy Management with Digitalisation

* . . .

As a pioneer of smart energy, guided by the ENN Energy Sustainability Development Policy, ENN Energy vigorously promotes integrated energy business by taking advantage of opportunities of energy conservation, emission reduction, energy structure reform in industrial parks and incremental electricity distribution reform, to assist customers in achieving energy efficiency, as well as to develop the integrated energy ecosystem. Leveraging on independent innovation upon integrated energy technology, we deeply understand the energy usage conditions, load characteristics and process characteristics of our customers, provide customers with natural gas, biomass, industrial waste heat, and photovoltaic and geothermal energy according to the local resource endowments. We compare and select the best integrated energy solutions for customers. Meanwhile, we built integrated energy platform with digital technology for key industrial customers and help them to achieve smart energy management.

14.,



ENN Energy's Smart Energy Management System Serlink 1.0 was successfully launched

On December 30, 2020, the event of Smart Energy Management System Serlink 1.0 launching with the theme "Today, Let's Make Energy Use Easier" was held at the Smart Enterprise Operation Center of ENN Energy's headquarter.

At the conference, the main functions of Serlink eco-terminal were introduced such as identifing customer needs; empowering customers to monitor the energy usage conditions of equipment in real time; so as to realise the economical, efficient and convenient energy use for customers through digital and intelligent means, as well as improving the safety of equipment, operational environment and personal to ensure the safe energy usaged of customers.

The Serlink are the core components of ENN Energy's digital product system. Going forward, we will continue to optimise the quality of product through the accumulation of end users' data so as to increase customer experience.





Hainan Yangpu Economic Development Zone's integrated energy micro-grid project forms an integrated development model

The integrated energy-micro-grid project in Hainan Yangpu Economic Development Zone is a representative project of biomass-based integrated energy. Yangpu Economic Development Zone is a national-level development zone approved by the State Council in 1992 to enjoy the bonded zone policy. It is positioned as "one port and three bases" to face Southeast Asia - a shipping hub, petrochemical base, pulp and paper integration base, and oil and gas reserve base. Its energy consumption is dominated by electricity and steam.



with the total energy use of **500** million kWh per year

The project makes full use of biomass resources such as slabs and sawdust produced by local rubber and sawn timber processing plants, adopting circulating fluidised-bed boilers and boasting a competitive biomass steam price. The project actively uses the concept of the integrated energy network to activate and match the stock heat source facilities in the park, reduce the investment in energy facilities at the energy station, and integrate the distribution and sales of electricity and photovoltaic energy in the park. The implementation of the integrated development model of heat, electricity and gas creates both economic and social benefits, such as promoting recycling of resources and driving energy conservation and emission reduction. ENN Energy is dedicated to digital transformation and building a smart enterprise committed to becoming a corporate benchmark for digital production capacity in the energy industry. As a result of the COVID-19 pandemic in 2020, we have conducted the remote energy management of gas services, stations, pipeline network operation, and the integrated energy services. The intelligent operation platform drives digital management of the pipeline network, covering the operation and maintenance of pipe networks, stations, gas stations, and heating stations.

We use tools to create digital products, such as integrated energy simulation, power bill optimisation, and thermal facility optimisation, to connect customers, solutions and resources, and accurately predict customers' individual energy needs. Based on different business formats, we actively create industry benchmark projects. So far, we have provided green and smart energy solutions for key industries such as pharmaceuticals, chemical fiber, printing and dyeing, and glass, forming an integrated energy business network with distinctive characteristics and abundant competencies.

3.1.2 Leading the Development of the Industry with Innovative Technology

Technology is the core competency of an enterprise, and innovation is the driver of sustainable development. In 2020, we improved our technological innovation by encouraging all of our employees to participate in innovation, by ways of creative incubation, promotion and replication of technological innovation to achieve value creation and improve the service for customers.

In 2020, we held competitions such as "I Innovator" and "I Craftsman" in which more than 800 employees participated, inspiring the enthusiasm of grassroots employees for innovation in their daily work.



The hall of ENN Energy Smart Enterprise Operation Center

Member companies implemented technological innovation across the business in areas such as safety, operations, engineering and customer service. They launched 236 innovation projects in 2020, covering a wide range of aspects such as intelligent monitoring, predictive maintenance of equipment, cathodic protection of sites and pipe network, non-stop transmission of pipeline, real-time online monitoring, anti-intrusion system on the construction site, and gas metering, as well as process optimisation and energy efficiency improvement of integrated energy stations. By integrating industrial technology and digital intelligence technology, we formed an atmosphere and culture of technological innovation.



Completed **80** technological innovation projects, adding a value of more than RMB**11.75** million



3

Dynamic simulation technology is used to make full use of pipe capacity and methane leakage monitoring

ENN Energy utilises the applied technology of natural gas pipeline network simulation to simplify the operation and management of complex pipeline networks. We obtain data from the SCADA system through OPC, then calculate and monitor the pressure and flow in the natural gas pipeline network. This technology can determine the utilisation rate of the pipeline network under different supply conditions, as well as to calculate the amount of methane gas that may leak, so as to help operators constantly optimise the pipeline network operation.



We value the protection of scientific and technological innovation achievements by providing intellectual property protection services for technology research and development(R&D) and developing response plans for patent infringement. The Company's experts also provide guidance during the R&D process to drive greater innovation.



ENN Energy participates in technical exchanges with peers and various industry associations and organisations to help advance overall development of the new energy industry. We conduct research in cooperation with universities and research institutes to understand and learn about the latest technologies, innovations, and trends in the industry. We also extensively participate in scientific research and academic conferences.

 In cooperation with peer gas companies and other partners, we conduct technical exchanges in areas such as technology development planning, new technology introduction and integration, technical standard formulation, engineering technology t and product development, and technological innovation;

- In cooperation with the Price and Cost Investigation Center of the National Development and Reform Commission, we conducted the "Urban Gas 2020 Gas Distribution Cost Survey and Research", which analysed the factors and related parameters that affect the cost of gas. The results of this research provided decision-making input to government departments and business jointly responsible for gas distribution supervision, audit costs, and gas distribution prices;
- In cooperation with the China Gas Association, we undertook the project "Research on the Development of Private Enterprises in Chinese Energy Sector" commissioned by the National Energy Administration, which studied the problems encountered in the development of private enterprises in the energy sector and corresponding solutions, and proposed suggestions for policy making.



ENN Energy hosted the 6th China Smart Gas Development Forum

On September 17, 2020, the Sixth China Smart Gas Development Forum was held in Langfang, attracting more than 500 experts from gas companies, equipment suppliers, universities, and research institutions. The theme of the forum was "Opportunities and Changes Facing the Gas Industry in the New Era." The forum focused on the two dimensions of "new operations and new technologies under the new infrastructure" and "new business and new retail under the new economy". Discussion topics focused on how the gas industry uses safe and reliable digital technology to upgrade the energy level of the industry guided by the government's smart city strategy and how to promote the integrated development of both upstream and downstream industries.This forum promoted ENN Energy's material procurement platform and ENN Energy's clean energy eco-concept and contributed to the overall development of the city gas industry.



Attracting more than **500** experts from gas companies, equipment suppliers, universities, research institutions, etc



3.1.3 Sate and Stable Gas Supply

ENN Energy is committed to providing clean energy for the region and regards safety as fundamental to success in production and operations. In alignment with national energy system reform, we ensure the stable and safe production and distribution of natural gas via both internal and external preventive controls, while guaranteeing the livelihoods of people in the communities we serve. These efforts further demonstrate our commitment to operate as a socially responsible company. We ensure prevention and control internally and supply externally, taking combined approaches to guaranteeing people's livelihood with safe and stable supply, while actively fulfilling our social responsibilities.

ENN Energy continues to strengthen our safety management, controls, and quality management systems. All member companies have established a quality management system in accordance with ISO9001 standards, establishing a solid foundation for quality management.



A total of **10** member companies had obtained the **IS09001** quality management system certification

3



Winter is the peak period of natural gas demand, and gas source protection is crucial to winter operations. Before winter, ENN Energy established working group to analyse winter supply and demand based on the forecast of the needs of each member companies and the availability of resources. In order to better plan resources and ensure stable supply, we conduct monthly demand forecasts and iteratively update our expectations. In the actual implementation process, we conduct real-time monitoring of weather changes, operating gas volume, and liquified natural gas (LNG) inventory levels in various cities in order to predict supply.

Over the years, ENN Energy has optimised the city-gas pipeline network and storage infrastructure and improved the supply capacity of pipeline facilities to ensure the safe and stable use of gas by end users. In terms of resource mobilisation, we sign the annual resource contract and winter peak supplementary agreement before winter to lock in supply resources in advance. Additionally, we establish the peak shaving resources through bidding at trading centers, CNOOC "south-north gas transmission", natural gas exchange centers and LNG supplement. During winter, the working group actively plans peak shaving and supply resources in accordance with the actual needs of the Company. With the advantage of import oversea LNG and our transportation capacity, the Company realising crossregional supply. Moreover, the gas source management platform helps guarantee winter supply through various methods such as supplier management, contract management, monitoring and analysis of storage inventory and gas consumption volume to realise the IoT access of the pipeline network, energy supply equipment and meters. Using big data, we have established model algorithms to predict demand and price, thereby realising the optimal combination of natural gas resources. In response to emergencies such as extreme weather and safety accidents, ENN Energy created emergency plans to ensure gas supply in case of emergencies. We also carry out emergency drills to continue to improve employees' awareness and response capability on emergency event.



ENN Lu'an Gas successfully secured natural gas supply

On July 17, 2020, the rainfall in Lu'an City, Anhui Province resulted in serious flooding in many low-lying areas which challenged the safe and stable operation of the city's gas pipeline network. ENN Lu'an organised swift actions to strengthen the inspections of key gas facilities, low-lying stations prone to flooding, and construction sites. The Company also dispatched emergency supplies and organised emergency rescue personnel and equipment to address the flooding and restore the safe supply of gas.

As of July 20th, the gas pipeline network, gas storage stations, and other key gas facilities of ENN Lu'an were operating smoothly with normal gas supply and there were no reported outages due to rainfall or stagnant water.



Guaranteed stable gas supply to **400,000** users in Lu'an City and the safe operation of **1,100** kilometers of pipeline network



Addressing flooding in a residential area



Maintaining pressure-regulating equipment



ENN Zhejiang fighting typhoon "Hagupit"

In August 2020, Typhoon Hagupit landed in Zhejiang Province. In the face of heavy storms, the member companies of the Zhejiang provincial company initiated emergency responses to ensure safe gas use. ENN Wenzhou immediately initiated emergency responses to address flooding caused by the typhoon, held special emergency rescue drills, deployed personnel, reinforced station equipment and facilities, and implemented emergency tool inspections and supply preparations. At the same time, the Company organised personnel to conduct safety self-inspections of their respective areas to identify hazards. After the typhoon landed, 90% of industrial users were forced to suspend production. ENN Wenzhou immediately organised an emergency team to complete emergency repairs, and adjusted the upstream gas source.



Wenzhou ENN Gas making emergency preparations for flood control



ENN Taizhou employees repairing damaged equipment

ENN Taizhou also completed emergency typhoon activities in advance. The Company inspected circuits and network conditions and prepared rescue vehicles, materials and personnel. After suffering typhoon damage, line patrol staff braved the storm to inspect damage to meter boxes, surge tanks and other facilities in stagnant areas.

ENN Yongkang developed meticulous measures for flood protection and emergency prevention. The Company conducted safety inspections on the pipeline network and auxiliary equipment and implemented various protective measures. In the face of severe flooding, ENN Yongkang formed an emergency linkage group to report on the operation of the station every two hours and inspected bridge pipes and other facilities to ensure that the gas was shut off.



Yongkang ENN employees inspecting bridge pipe facilities

During the typhoon, ENN Zhejiang Branch's member companies inspected facilities and strengthened the monitoring of the city's gas consumption to ensure the safe use of gas by residents.



ENN Changsha spares no effort to guarantee supply of gas in the winter

Since the beginning of winter in 2020, ENN Changsha saw the demand for heat grow at a higher rate than the same period last year, placing a strain on the Company's ability to meet demand. In order to meet the heating demand of residents, ENN Changsha established a special team to increase supply from multiple dimensions. In terms of liquid resources, the Company increased LNG and transportation resources to ensure stable supply and coordinated the use of surrounding LNG storage stations. Diversified resources were introduced with the help of Pipe China's natural gas long-distance pipeline to enhance the supply of gas resources. With a solid emergency response plan, steady and orderly on-site operations, ENN Changsha took multiple measures to ensure gas supply.

In order to ensure the safe operation of the gas pipeline network, ENN Energy established a digital system for pipeline network construction and operation. With the help of digital engineering and IoT technology, key processes are visualised, controllable and traceable. Managers can check the construction dynamics and site conditions at any time, effectively eliminating quality issues and fundamentally improving the construction quality. During the operation period, we focused on the implementation of the operation business, record standards and operation cycle within the system. This improved the quality of pipeline network inspections, construction supervision, and equipment maintenance. We also introduced smart equipment, using high-tech drones and smart patrol vehicles to replace the traditional manual patrol methods, upgrading from "human-wave tactics" to "digital intelligence tactics", thereby ensuring the safe, stable and reliable operation of the gas pipeline network.



ENN Energy develops smart patrol vehicles to continuously improve the operation of smart pipe networks

ENN Energy is committed to creating a safe, smart, and efficient pipeline network, and continuously improving its smart pipeline network operation through digital technology. The smart patrol vehicle developed by ENN Energy Material Supply Center is an excellent product to help achieve this goal.

10 times more efficient than manual inspection

The smart patrol vehicle can scan distances up to 100 meters and boasts an inspection efficiency of more than ten times that of manual inspection. In addition, the smart patrol vehicle can identify leakages, produce inspection reports, and automatically record and upload inspection data to the Company's operation management platform in real time. The smart patrol vehicle not only improves the efficiency of inspection work but also accumulates a large amount of data for the digital pipeline network.



Smart patrol vehicle

In order to ensure the safe use of gas for customers and improve service quality, ENN Energy promotes the application of IoT meters. We use the IoT application to understand the gas consumption of users throughout the city in real time, analyse the current operating status of meters and identify large and small flow leak. As data is analysed, we can directly issue valve shut-off instructions to meters through the system to reduce the probability of gas accidents and to ensure a more efficient, comprehensive and safe gas supply. IoT applications also allow users to inquire about gas usage and use other function, such as alarms, bill payment, and realtime monitoring,. In 2020, ENN Energy's IoT meter usage rate for commercial and industrial users was 42%.

IoT meter penetration rate for C/I users in 2020 was

42%





In order to ensure the safety of gas use for residential users, ENN Energy conducts door-to-door safety inspections for users once a year and "rural gas users" twice a year, which exceeds the biennial safety inspection standard for urban residents as stipulated by the country. In 2020, ENN Energy formulated and released the standard "Guidelines for Classification and Grading of Hidden Hasards of Pipeline Gas Facilities for Urban Gas Residential Users". In 2020, there was a 69% drop in the doorto-door inspection rate from last year due to social distancing measures put in place as a result of COVID-19. The Company actively promoted the "Smart Safety Inspection System V2.0" and provided users with online safety self-inspection and self-test programs to guide users to report the status of indoor gas in accordance with the safety inspection procedures. The Company's customer service staff followed up on the self-inspection results uploaded by users and contacted users to address safety issues as needed.

4	— ———————————————————————————————————
-	
:	-
	-425

Door-to-door safety inspections for ordinary users once a year and "rural gas users" twice a year



ENN Energy implements the "three pillars" of safety inspections to continuously improve the operational capabilities of smart safety inspections

ENN Energy is committed to indoor gas safety through digital safety management. In 2020, we promoted the implementation of the "three pillars" of safety inspection (i.e. standards for the identification and mitigation



"Three pillars" for indoor safety inspection

of safety hazards, a unified employee operating system, and a standard tool form. We implemented the "Guidelines for Classification and Grading of Hidden Hazards of Pipeline Gas Facilities for Urban Gas Residential Users", developed an intelligent safety inspection system V2.0, issued the "Hidden Hazard Analysis for Indoor Safety Inspection" guidelines, and clarified the baseline for the safety inspection assessment.

3.1.4 Establishing Diversified Channels for Service and Communications

Providing high-quality and efficient services is an important foundation for ENN Energy's sustainable development. We attach great importance to service quality. Through a series of measures such as improving system construction, strengthening communication and carrying out public events, we continuously improve service quality and strive to achieve customer satisfaction. To standardise the handling of related complaints s, ENN Energy created the ENN Energy Service System Manual and the ENN Energy Management Measures for Client Complaints. In 2020, we utilised client feedback to optimise the current standards and issued the "Notice on Regulating Customer Complaint Handling and Feedback" to address complaints, while actively improving the quality supervision system.

Complaints and feedback

We monitor and respond to both customer and service performance surveys and feedback through established channels. Moreover, we have clarified our processes for complaint acceptance and complaint investigation, and we conducted quality inspections to ensure our processes were properly implemented and data was validated.

ENN Energy established a customer service hotline (phone and online) and various other customer feedback channels via public platforms, including the national service quality supervision hotline (400-86-95158), 7*24 service hotline (95158), and a mailbox for complaints and suggestions. In 2020, we upgraded the complaint handling process through implementation of real-time information synchronisation and reminders through the iCome platform. As a result, both the timeliness and the satisfaction of customer complaint handling have increased. During the reporting period, we received a total of 161 complaints, all of which were resolved.



19600 7712-02 *** 8028 TARD Million A 和服人 12.912 12/5/4/2 27.0 11.01 1 **投送单调查处理12个小的后并影响** 12 100 1 TEXT.do 正文 0.000 the 7 s. mater \$ s. seatter \$ s 前年:新来知道客户投诉的 **BINE** Report WEIPS. 10 NIGHE 名户教师月期分析 株法发生7一起投诉 (発展)次公式/開発) ATMANSAPERCE, ILANIAPOTE A. RUMA, KIAR, KANADAR 12-12-02 13:05:30 2000年12月台管成上進後回開 内化行電機。2021年1月1日間 相違2027、10日間8十月、10日 後心時時後自動和主用用引機系 12月日号: 1206(220 14.86.25 640720 2020 T 12 H 22 H 49 S SCHARMEN and a straight of the 548.8×8 O 1516/00 M 全务负责人的联 株式友生了一起投诉 8925-12-02 15:10:14 2029年12月七元成百克, 2021年1月1日 Come platform processing page



Customer Service Staff Training

In order to enhance the customer service skills of employees, ENN Energy provides training designed to improve service quality. These trainings help service personnel strengthen their professional skills and deliver higher-quality services to customers.

- Offline training: A series of training sessions such as "Service Language Training and Communication Skills", "Call Center Scheduling Management", "Professional Qualification Improvement ", "Basics of Service Operation Performance Management for Team Leaders", were conducted to improve employees' customer service skills.
- Online training: We have discussed and developed customer service online training courses;



- Customer service training site
- Employee feedback: We collect employee feedback regarding challenges with customer service and regularly summarise these points for employees.
- Benchmarking learning sessions: We carry out benchmarking learning sessions and strengthen communication in the industry, covering topics including business processes, service standard systems, extended value-added services, etc.

Service measures for the convenience of customers

Operating with a customer-centric mindset, we utilise technology to upgrade our platforms and processes to provide customers with more convenient, cordial and efficient services.

- Increasing promotion efforts: In order to solve the problem of IC card meter customers' difficulty in purchasing gas, we installed and updated 5 million IoT smart meters this year.
- Launching the smart card: We provide NFC smart card and payment platform for IC card meter users so that users can complete gas payments without leaving home.
- Optimising functional modules: We added the NFC card payment function to the original gas payment function, leading to 97% of payments being made online.
- Improving customer experience: Based on user experience, we optimised the payment interface and query functions to include presentation of gas consumption records and enhance the user selfservice experience.



NFC smart card helps users complete gas payment without leaving home

During the pandemic, ENN Langfang Intelligent Technology Co. provided IC card meter users with NFC smart cards and a payment platform to allow users to make gas payments without leaving home. With near-field recognition, transmission is accomplished through the NFC smart card without pairing. Without the need to modify the card meter, the card is compatible with mainstream card meter types on the market. It is low-cost, easy to learn, and convenient to operate, which greatly improves the convenience of gas users.



In 2020, ENN Energy commissioned a third-party consulting company to conduct a customer satisfaction survey of all customers and operations. The results showed that ENN Energy's customer satisfaction in 2020 was 94.1%, an increase of 1.1% from 2019. Through the survey, we collected customer service expectations and suggestions for improvement, which we will use to help improve our services and products in the future.



Customer satisfaction increaseed to **94.1%**



3.2 Environmental Protection

ENN Energy adheres to the concept of sustainable development and upholds a high sense of social and environmental responsibility. Beginning with waste and energy resource management, we control the discharge of various pollutants, improve the efficiency of energy and resource utilisation, and further reduce the negative impact of our production and operation processes. We are committed to building an eco-friendly enterprise and protecting the environment.

3.2.1 Waste Reduction Management

ENN Energy strictly complies with the Environmental Protection Law of the People's Republic of China, the Air Pollution Prevention and Control Law of the People's Republic of China, the Water Pollution Prevention and Control Law of the People's Republic of China, the Solid Waste Pollution Prevention and Control Law of the People's Republic of China, and the Environmental Noise Pollution Prevention and Control Law of the People's Republic of China, among other laws and regulations. We have formulated and promoted the Civilised Construction Management Measures internally to strictly regulate the generation and disposal of wastes in the daily construction and operation processes. We have actively introduced the environmental management system ISO14001 in our operations and encourage member companies to establish environmental management systems in accordance with this standard to effectively improve environmental management, energy resource utilisation, and achieve continuous environmental performance



improvement . As of the end of 2020, 17 member companies have obtained the ISO14001 environmental management system certification. During the reporting period, ENN Energy had no reportable environmental pollution incidents.



9 Hazardous waste includes waste oil from machinery, odorant waste barrels, waste chemical packaging, scrapped circuit boards produced during the manufacture and maintenance of gas meter and other hazardous waste generated by ENN Energy Headquarters and subsidiaries companies during gas distribution business operation in 2020.

10 Non-hazardous waste includes household garbage and other non-hazardous waste produced during the manufacture and maintenance of gas meter generated by ENN Energy Headquarters and subsidiaries companies during gas distribution business operation in 2020.

We are committed to achieving the reduction of various wastes and pollutants through technology. In operations, we insist on the centralised disposal of office waste, scrapped waste pipelines, and other parts generated during the manufacturing and maintenance of gas meters. We seek to reduce the creation of circuit board scrap through transitioning the wire welding process to a plug-in process. Furthermore, we have further enhanced the anti-corrosion technology of products, increased the repairable ratio, and reduced the scrap rate and generation of hazardous wastes. The hazardous wastes generated are transferred to the hazardous waste warehouse and then transferred for disposal or recycling in strict accordance with national disposal compliance requirements. In 2020, we issued a policy that requires member companies to preferentially select odorant suppliers with the capacity to recycle waste bins in order to reduce the number of odorant waste bins sent to landfill.



Design optimisation of Daqing Ubiquitous Energy Station to reduce fly ash pollution

In order to improve the quality of the local ecological environment, we removed the originally planned ash plant and built a large steel-paneled ash silo, which addressed the problem of fly ash discharge and dust pollution, and also met the needs of ash storage due to accidents. During the production process of the ubiquitous energy station, the fly ash collected by the bag filter of the boiler system is pneumatically transported by compressed air to the steel-paneled ash silo for storage. During the ash transportation process, the bag filter installed on the top of the silo is equipped with a pressure regulating valve to adjust the pressure balance, so that the silo maintains a slight negative pressure which ensures that the fly ash concentration is lower than the local environmental control requirements. A radar level gauge is installed on the top of the warehouse to monitor and control the material level in real time. Roots blowers are used in unloading, homogenising and discharging processes. The discharge is conveyed to the bucket elevator through the launching device, and transported by the elevator to the transfer warehouse, thereby effectively controlling fly ash pollution.



In the project construction process, ENN Energy implements the Civilised Construction Management Measures through the identification of pollution sources and the construction of environmental protection facilities, technology upgrades, project management, and other means. We control important environmental factors in compliance with the principles of emissions reduction, resource utilisation, and pollution control. We effectively manage the generation and discharge of wastewater, waste gas, solid waste, and noise in the process of construction and operation to reduce environmental impact. In addition, we continue to optimise the digital system for engineering and improve the construction process to realise the "visible, controllable and traceable" operations. We also define the personnel responsible for preventing pollution and ensuring the Company's operations are compliant with internal policies and regulations.



On the basis of strengthening project management and technological innovation, we actively maintain the Company's internal environmental education and awareness materials. We also reinforce employees' knowledge of environmental protection by posting slogans, concepts, and sponsoring environmental protection-themed activities.



3.2.2 Energy saving

ENN Energy strictly complies with the Energy Conservation Law of the People's Republic of China and other laws and regulations. We have created the ENN Energy Manual for Reception Resources, ENN Energy Management Rules for Administrative and Office Assets and ENN Energy Rules for Vehicle Management and other policies within the Company to integrate the concept of energy conservation and emission reduction into every aspect of the Company's daily operation.

We insist on optimal performance in the technical transformation of equipment and systems and adopt advanced technologies, processes, equipment, and materials to improve existing facilities and production processes. Through these efforts, we have reduced the consumption of fossil fuels, improved energy efficiency and economic feasibility of projects , and reduced waste.

ENN Energy values water resource management and efficient use. We reduce water consumption by adopting measures such as using reclaimed water and rainwater instead of fresh water, recycling production water, using watersaving appliances, and inspecting and maintaining the water supply system to avoid water leakage.



In 2020, we launched an initiative to reduce costs and increase efficiency via the ENN iCome platform. We cooperated with provincial companies and subordinate member companies to create a strong atmosphere of cost reduction and efficiency enhancement through communication and setting up columns. We strengthened guidance for the ubiquitous energy business and actively encouraged provincial companies to create plans, implement measures, and share advice for cost reduction and efficiency enhancement. We encouraged the provincial companies to focus on technological innovation and resource allocation to increase efficiency, reduce cost, and promote the implementation of value-added, innovative projects.



Huai'an ENN technology innovation project "Energy Exchange and Utilisation at the Station" achieved cost reduction and efficiency enhancement results

In 2020, Huai'an ENN innovatively applied the heat energy from the compressed natural gas (CNG) tank truck refueling process to the auxiliary heater for forced gasification of the LNG emergency storage station to ensure the natural gas output temperature. Concurrently, the cold energy was brought back to the CNG refueling link to cool the gas and equipment. This innovation saved the energy used in LNG gasification and CNG equipment cooling, effectively reducing the operating cost and the failure rate of the equipment which prolonged the service life of the equipment.

"Energy exchange and utilisation" project saved the operational cost of

RMB**567,200** for Huai'an ENN in 2020



We actively promote the concept of sustainable development among employees in order to adhere to our principles of energy conservation and consumption reduction and contribute to energy conservation and emissions reduction. In 2020, we advoca

conservation and consumption reduction and contribute to energy conservation and emissions reduction. In 2020, we advocated for remote communication and online meetings and ensured that lights and water were turned off as employees left the office to reduce resource consumption.



Yancheng ENN actively promotes green office initiatives

As a member of the clean energy industry, Yancheng ENN has helped ensure people's livelihood, energy conservation, environmental protection, and other social and environmental undertakings. The concept of energy conservation and emissions reduction is incorporated in the work and life of every employee. The employees have developed good habits, such as turning off and unplugging electronics at the end of the work day, saving water, and double-sided printing as concrete actions to promote sustainable development and "usher in a better tomorrow with all that I can do".

3.2.3 Green Finance

On September 10, 2020, the Company successfully issued its first green bond of \$750 million with a coupon rate of 2.625% due in 2030, which obtained the Green Finance Certificate from France Vigeo Eiris and the Hong Kong Quality Assurance Agency. This green bond was well received by investors and was added to the Hong Kong Sustainable and Green Exchange (STAGE). According to ENN Energy's green finance framework, the proceeds from financing will be used for investment in and/or refinancing for green projects including renewable energy, energy efficiency improvement, and pollution prevention which will steer ENN Energy's business portfolio in a lower-carbon direction.. The green bond also won the "Best Green Bond" award in the renewable energy/transition energy sector in The Asset magazine's 2020 AAA Sustainable Capital Markets Regional Awards.



Proportions of fund allocation

1. Renewable energy utilisation

	Green project name	Green project category	Allocated amount*	Allocation method
Fund allocation	Guangzhou Baiyun International Airport Terminal T2 Photovoltaic Project Inner Mongolia Chifeng Deyu Biomass Project Mudanjiang Biomass Project in Heilongjiang Province Hainan Yangpu Development Zone Biomass Project Guangxi Shanwei Biomass Project Yizhou Economic Development Zone Biomass Project Zhongtai Longzan Biomass Project	Renewable energy	RMB526.48 million (equivalent to USD81.17 million)	Refinancing

* PBOC, March 18, 2021, USD/CNY: 6.4859.

	Green project name	Installed capacity	Energy produced in 2020	GHG emission reduction in 2020
	Guangzhou Baiyun International Airport Terminal T2 Photovoltaic Project Inner Mongolia Chifeng Deyu Biomass Project Mudanjiang Biomass Project in Heilongjiang Province	421,290 KW	44,161,464 kWh	23,974 tons of carbon dioxide
Environmental impact	Hainan Yangpu Development Zone Biomass Project Guangxi Shanwei Biomass Project Yizhou Economic Development Zone Biomass Project Zhongtai Longzan Biomass Project			

2. Pollution control and energy efficiency enhancement

2.1 Waste heat utilisation and integrated energy projects

<u>\$</u>	Green project name	Green project category	Allocated amount*	Allocation method
Fund allocation	14 waste heat utilisation projects 22 integrated energy projects	Pollution prevention and control Energy efficiency	RMB1,127.95 million (equivalent to USD173.91 million)	Refinancing for 33 projects Financing for 3 projects

* PBOC, March 18, 2021, USD/CNY: 6.4859.

	Green project name	Energy savings in 2020	GHG emissions reduction in 2020
Environmental impact	14 waste heat utilisation projects 22 integrated energy projects	173,985 tons of standard coal	661,134 tons of carbon dioxide

2.2 Customised integrated energy solutions

	Green project name	Green project category	Allocated amount*	Allocation method
Fund allocation	Customised integrated energy solutions by ENN Ubiquitous Energy Network Technology Co., Ltd.	Pollution prevention and control Energy efficiency	RMB2,600 million (equivalent to USD400.87 million)	Refinancing

* PBOC, March 18, 2021, USD/CNY: 6.4859.



In August 2018, ENN Energy acquired Ubiquitous Energy Network Technology Co., Ltd. for RMB 2.6 billion. Through this acquisition, the Company obtained the core technologies and management capabilities of the integrated energy business across the life cycle of a project from business opportunity identification to construction, delivery, operation and maintenance, which enhances the Company's core capability in its integrated energy business. After the acquisition, the personnel, technologies and intellectual property rights of Ubiquitous Energy Network Technology Co., Ltd. were fully integrated into the management and operation of the Company's integrated energy business.

The personnel, technologies and intellectual property rights obtained from the acquisition of Ubiquitous Energy Network Technology Co., Ltd. have enabled the delivery of technical services for 141 of the Company's integrated energy projects either in operation or under construction. In 2020, the Company's integrated energy business provided customers with integrated energy including electricity, steam, cooling and heating totaled 12,042 million kWh. These integrated energy services help customers reduce energy consumption by 1,476,085 tons of standard coal and reduce carbon dioxide emissions by 4,444,264 tons.



2.3 Methane management

E R	Green project name	Green project category	Allocated amount*	Allocation method
Fund allocation	Natural gas pipeline inspection and mainte- nance	Pollution prevention and control Energy efficiency	RMB610 million (equivalent to USD94.05 million)	Refinancing

* PBOC, March 18, 2021, USD/CNY: 6.4859.

	Ensuring the safe operation of the gas pipeline network is the top priority of the Company's daily operational safety management process. The Company closely controls methane leakage and emissions in all aspects of project planning, construction and operation. In the project design, member companies are encouraged to use advanced materials and technologies, residual gas recovery, methane leakage monitoring, gas quality monitoring and other technologies and equipment. All of our member companies establish operation centers, equipped with a station monitoring system, integrated dispatch monitoring system, and smart operation platform to monitor the operation status of the natural gas pipeline network in the region in real time. Additionally, line inspections are completed by safety inspection and maintenance personnel, and the status conditions related to natural gas supply and usage are closely monitored. The main monitoring technologies we utilise are:
	• Station monitoring system: This system uses a remote laser methane telemetry system to monitor the gas concentration in the station in real time, scan the entire monitored area, and quickly respond to gas leaks.
	• Integrated dispatch monitoring system: This system makes comprehensive use of GIS, video monitoring, SCADA, remote flow transmission and other technologies to manage pipeline network resources, conduct real-time monitoring of the pipeline network operation status, and dispatch emergency services to repair the transmission and distribution system. This provides users with high-quality gas supply services, reduces losses in the transmission and distribution process, extends the service life of the pipeline network, and ensures the stable operation of the transmission and distribution system.
Social	 Smart operation platform: This system monitors the gas pipeline network, equipment and facilities, operators, third-party construction, etc.
impact	In addition to the above leak detection systems, the natural gas leak detection equipment and instruments we use also include (but are not limited to):
	Pipeline anti-corrosion coating detector
	Handheld combustible gas detector
	Laser methane telemeter
	Combustible gas probe and alarm
	Ethane gas analyser
	Remote valve well monitoring terminal
	Pipeline locatorIntelligent inspection vehicle for pipe network, etc.
	In 2020, we spent 610 million yuan in pipeline network inspection and testing, equipment maintenance and other
	safety measures.



3.3 Talents Cultivation

Adhering to our principle of supporting our employees, ENN Energy invests in employees' career development by offering opportunities for growth and broadening career paths. Development and training of our employees is central to our corporate culture. By establishing a support system for employees experiencing difficulties and creating a caring and equitable work environment, the Company supports all employees in their career journeys

3.3.1 Employee Development

ENN Energy has always considered employees to be the cornerstone of the Company's development and future. The Company seeks to promote employee development through fair, merit-based promotions for managers and professionals. We also defined the procedures used to measure performance for advancement. The Company further invests in employees through multi-level training platforms, and skill competitions designed to help employees, and the Company, realise their potential.

The Company maintains a clear order to delegating roles and responsibilities in operations, construction, and project delivery in order to further optimise label

mapping. The Company conducted professional skills training for 1,107 employees, which incorporated 26 scenarios in 12 areas. Additionally, the Company facilitated the completion of certain skill level trainings for 10.745 employees and helped 7,513 people obtain certifications. ENN Energy shapes the underlying logic of independent growth and the growth rules of costing scenarios. The Company has helped a total of 170 people achieve professional growth and development. Through independent growth, the personnel structure is gradually transitioning from the typical pyramid to olive shape.

In order to facilitate the development of technical skills, the Company actively supports team building and development of key technical personnel, including the design of two major focus areas: "technical talent pool development" and "technical culture development."

 Technical talent pool development: The company conducted a thorough talent review of 110 chief engineers/ key technical personnel, drafted FEE training plan and courses in various forms, built a platform for the exchange and inheritance of knowledge and experience, and clarified the path for career advancement for technical personnel.

(2) Technical culture development: The Company completed a series of cultural discussions to gain an understanding of multiple perspectives, including the perspective of executives of holding, provincial and member companies and chief engineers, in order to create a culture of technical excellence and enhance the sense of pride in our technical personnel.

In 2020, the Company took an inventory of 113 member companies and 269 people to help identify future leaders. The Company compared these employees with the competency profile of current company leaders and formed the ENN Energy"1+3" leader map which outlines the future organisational structure. The Company then designed personalised improvement programs for the ENN Energy current and future leaders and implemented the first phase of training, which focused on strengthening practical experience in key areas such as safety, engineering, finance and transportation.



In 2020, ENN Energy and member companies conducted 62,607 training sessions, with a total of 519,240.19 hours of training.

Training programs	in ENN	branch	companies	in 2020
-------------------	--------	--------	-----------	---------

Name of branch	Training program	Training contents
Member Compnies in Hunan Guangdong and Fujian	"Show Me Your Glory" training program	Combining lecture with practice and focusing on the effective realisation of "logical presentation and expression", the training helps all participants to quickly improve their communication and expression skills.
Zhejiang and Shanghai Provincial Company	"Star of Hope" special talent training camp	Centering on customer cognition, company operation, team management and business ability; the training camp helps trainees internalise and share their knowledge, which facilitates the success of the training outcomes.
Anhui Provincial Company	"Sail the Ocean"core talent training	The module training includes "Business Wisdom: Thinking Like an Entrepreneur", "Four Steps in Customer Cognition", "Financial Management for Non-Financial Staff" and "Project Management", aiming at breaking silo mentality and improving the participants' ability of global thinking.
ENN Xuancheng	"Undaunted Sword" talent training program	Explaining frequently asked questions in peer collaboration, teaching communication strategies that involve stakeholders and disputes, and elaborating communication steps based on cooperation, the training program advocates collaborative thinking and win-win teamwork, from which participants can benefit in practice.
Henan Provincial Company	"Setting out Plan" capability enhancement program	Elaborating on the most important capability traits of a leader, decisiveness, organisational skills, mentoring skills, charisma and pragmatism; explaining the process and tools to precisely define complex problems and find solutions, the training provides comprehensive guidance on establishing a communication and feedback mechanism.
Member Companies in Haining and Xiaoshan	Module 2 of "Tide-riders Training Plan"	By applying methodologies and tools, the training plan aims to improve participants' ability of analysing and solving problems as well as the ability of expressing themselves in speeches. At the same time, the training focuses on typical work scenarios, combines practical cases, conducts drills to evaluate learning outcomes, all of which are designed for the purpose of practical use.





Hebei Provincial Company held a training program titled "Origin from Taihang"

In order to meet the challenges brought by the reform of the natural gas industry, ENN Energy Hebei Provincial Company planned ahead for the allocation of resources based on its existing talent pool. On November 20-22, 2020, Hebei Provincial Company held a three-day training session, "Origin from Taihang" program, for resource planning and staffing improvements

The training invited lecturers from diverse fields to speak to participants on policy analysis, strategic planning and industry insight, and the lecturers conducted extensive and in-depth exchanges with the participants. All participants listened carefully, spoke enthusiastically during the training, and were willing to question, discuss and interact with one another on different ideas. Following the training, participants noted an overall better understanding of the direction and future development of the domestic gas industry. They also felt more determined to strive for future objectives.





ENN Energy's Annual Skills Competitions

The annual "Skills Competition" held by ENN Energy member companies have become a long-standing tradition. An important approach to skill improvement and employee training, skill competitions have been organised by member companies since 2007. Spanning a wide range of competitions across all types of positions, the participation rate of front-line staff has reached more than 70%. These competitions help ensure the development of our people, the safe operation of the Company and strengthen ENN's brand.



The participation rate of front-line staff reached more than **70%**





Mr. Liu Zhanjun, an employee of ENN Langfang, was honored as a "National Model Worker"

On November 24, 2020, the National Model Worker and Advanced Worker Commendation Conference was held in the Great Hall of the People in Beijing. Liu Zhanjun, an employee of ENN Langfang Gas, was honored as a "National Model Worker", the highest honor for a worker. During the past 22 years, Liu Zhanjun developed excellent operational skills and won the first place in the Company's innovative skills competition and the National Fuel Association Cup Pressure Regulation Skills Competition. He was awarded the honorable titles of "Advanced Individual in Safety Production", "Innovative Person of the Year" and "Special Model Worker of Hebei Province". Liu Zhanjun is creating a better life and career.



Association, laying a solid foundation for developing stronger operational capabilities in the future.

3.3.2 Employee Well-Being

Adhering to our "people-oriented" management philosophy, ENN Energy values employees' physical and mental health, listens to employees' concerns, and actively cares for and assists employees in difficult situations. The Company holds "after-work" activities to promote ethical values, provides



ENN Energy Guangzhou Panyu Skills Training Center was awarded "Guangdong Gas Association Training and Assessment Base" by Guangdong Gas Association



Liu Zhanjun, National Model Worker, Langfang ENN Gas Grid Maintainer

comprehensive and substantial protection for employees, and enhances employees' sense of belonging.

Employee Health

2020 was the "Year of Health" for ENN Energy. In order to create a healthy office environment and atmosphere, the Company designated an area in the office for relaxation and exercise.

The Company also established a "partner health sports center". The center invites part-time coaches to offer group exercise classes, provides on-site guidance in the aerobic exercise area, and regularly carries out health-themed activities, all of which aim to encourage employees to exercise during work breaks or after lunch, record health data, and develop healthy exercise habits.

Based on employees' occupational health and safety needs, ENN Energy developed customised health products such as "health boxes" and "health kits" which contain dosens of conventional medicines and health supplies for common disease prevention and treatment, sudden trauma, emergency treatment, and other frequentlyencountered situations. In 2020, the work union delivered more than 500 health boxes and 2,880 health kits to front-line production teams and

employees through the "Employee Care Initiative", guarding the health and safety of employees.

Some member companies also established "corporate health stations". Health stations are equipped with hardware and software, including conventional health equipment and a digitally connected system. By training part-time health workers, the stations help these member companies gradually establish their own health care system.

Widely recognised and praised by employees, products of the "Year of Health" as shown in the image below, display the Company's commitment to its employees' health.



Health stations in ENN Energy office



"Employee Care Initiative" sent Over **500** health boxes and **2,880** health kits to front-line production teams and employees

Women's wellness

The Company also emphasises the physical and mental health of female employees and provides customised medical check-ups, provides time off from work for Women's Day, and sets up safe and convenient nursing rooms for breastfeeding employees. In compliance with national regulations, the Company also provides paid maternity and breastfeeding leave.

Family Support

In order to establish a long-term support mechanism for employees suffering from serious illnesses, ENN Energy offers financial support to employees suffering from serious illnesses by providing medical assistance and reimbursing medical expenses that exceed the medical insurance coverage by 50%. Since 2015, a total of 125 employees suffering from serious illnesses received more than RMB1.6 million in assistance. After careful consideration in 2020, the ENN Energy collected **17,320** opinions, suggestions in 33 categories and 120 hotspots from employees

Company decided to expand the scope of the assistance program to include the relatives of employees.

Employee Communication

The Company seeks to foster communication and interaction with its employees. In order further develop communication channels, the Company established a dedicated hotline to the general secretary and a complaint channel on the iCome platform. Employees may send complaints and feedback at any time. ENN Energy also communicates regularly with representatives from labor unions at all levels to further learn about the needs of employees. The labor union researches, surveys, and elevates the issues raised by employees, and provides feedback to labor unions at member companies. In 2020, ENN Energy conducted in-depth investigations and analysed personnel problems, aiming to empower employees' voices.



Psychological care during the pandemic

To help alleviate stress and related challenges (e.g., sleeping problems) during the pandemic, the Company provided psychological care for employees. For example, employees were invited to participate in a classroom discussion with the theme "fight against the pandemic together, care about one another.",. Through these activities, the Company delivered humanistic care and strengthened employees' confidence and determination to defeat the pandemic.



Psychological care activity during the pandemic





Caring for single employees who stay put for the Spring Festival due to pandemic control

During the Spring Festival from February 11 to 17, 2021 and responding to the public message "staying put for Spring Festival", the Company carefully planned and launched a series of activities themed "celebrate the new year in different locations while our hearts are connected." The Company created a "home" atmosphere with a series of warm and thoughtful activities, including: making dumplings, New Year Eve's dinner, games, karaoke, sports and gift bags. These efforts were meant to encourage the celebration of a healthy and safe new year for employees who stayed in Langfang for the Spring Festival.

The Company also develops activities to promote the development of a positive culture. On Chinese New Year's Eve, general managers of all Langfang units spent New Year's Eve together with employees who remained in the city for the Spring Festival. Additionally, the labor union organised diverse activities on the third day of the Lunar New Year, and employees participated in fun games, singing activities, parties, pot throwing, and table tennis.



Mr. Wang Yusuo, Chairman of the board of directors of ENN Energy, visiting ENN employees who stayed put for the Spring Festival



Diverse new year activities for employees for the Spring Festival





ENN Energy provides free health consultation for employees

On November 24, 2020, ENN Langfang, officially opened its pilot "Health Station" to all employees. A health manager of Laikang Life Company, conducted on-site training for nearly 20 staff representatives and demonstrated the operation of all inspection equipment.

After the training, Mr. Ding Yu, an expert on TCM external therapy from Laikang Life Three-Treatment Health Center, along with Dr. Li Mengsi, a health manager in acupuncture rehabilitation, provided free health consultation on "pain in the neck, shoulders, waist and legs". Through symptom-based treatment, the experts provided personalised treatment to 12 employees, relieved pressure for eight employees, and interpreted medical reports for four employees.



Free health consultation for employees



ENN Energy's online campaign: "Celebrating Youth Day, Keeping Fit Together"

To help strengthen employees' physical fitness during the pandemic, ENN Energy launched the "Celebrating Youth Day, Keeping Fit Together" online campaign in the WeChat Moments on May 1, 2020. The campaign aimed to motivate and lead all employees to stay active through activities such as running, push-ups, barbell lifting, and rope skipping.





development of society. During the

reporting period, ENN Energy and its

283,580 hours in public services, and

mobilised 8,176 persons to volunteer.

subsidiaries donated RMB52.85 million,

3.4 Corporate Citizenship

Sticking to our philosophy of "always being grateful, return to the community", ENN Energy is actively involved in charitable activities. The Company conducts various activities including "gas safety public lectures", "donations for medical staff and community" who fight against the pandemic, "lights out for earth hour" which aims to protect the environment, "save food, start from me" and "waste sorting". The Company creates good community relations and actively demonstrates responsibility through corporate citizenship.

3.4.1 Contributions to the Community

0.1

Culture

projects

1.10

CASE

ENN Energy adheres to the Management Policy on Charity Activities of ENN Energy and invests in the community. The





Company organises volunteers and labor

union members to reach communities

campaigns. Serving the public, the

and conducts environmental protection

Company contributes to the cooperative

"Save Food, Start with Me" campaign to help poverty alleviation

ENN Charity Foundation makes continuous efforts to innovate ways to promote poverty alleviation. From September 26 to 30, the Company initiated the online campaign"Save Food, Start with Me" and donated 10 times the amount of food than the number of participants in the project of "helping farmers" launched in the village of Changzhuang, Shunping. The campaign advocated for society to take action by making donations. At the end of the campaign, a total of 30,146 people participated online,



which translated to total donations of RMB301,460. The donation amount was increased to RMB500,000 after negotiation, and the donation agreement was officially signed and implemented on October 15.



"Having the Earth Hour Together" program, ENN Energy actively responds to the Earth Hour event

For many years, ENN Energy has been committed to clean energy and is an advocate and practitioner of energy conservation and emissions reduction, contributing to the protection of the Earth. During the Earth Hour event, more than 30,000 ENN employees invited 20.92 million residential customers and 149,000 commercial and industrial customers to participate in the event by turning off their lights for one hour and donating RMB1 to environmental protection.





20.92 million residential customers participated in the program



149,000 commercial and industrial customers participated in the program



ET LUI CASE

ENN Shangqiu holds "walking for charity" activities

On April 17, the general manager of ENN Shangqiu held the "walk for charity" event in Riyuehu Park. The activity theme was "corporate with the sanitation workers, create a better environment". All participants downloaded the step-counting app and ENN Shangqiu converted each step to 1 cent, donating 200 packs of drinking water to the sanitation workers.



Donated **200** packs of drinking water



"Walking for charity" activities



3.4.2 Common Battle Against COVID-19

Since the outbreak of COVID-19, all member companies have actively responded and cooperated with society to "fight the pandemic" and assume the civic responsibilities of listed companies. ENN Energy issued internal documents such as the "Requirements on the Prevention and Control of COVID-19", "Important Notice on Returning to Work after the Spring Festival Holiday", and "Notice on Doing a Good Job in Daily Office Work During the Anti-pandemic Period" to strengthen all business partners' awareness of the pandemic in a timely manner, clarify and unify action instructions, and ensure adequate supply of pandemic prevention materials. During the pandemic, we resumed work to support people's livelihoods and continue to supply gas to customers. In response to national policies, we reduced gas prices to stimulate the economic recovery, fulfilling our responsibility as corporate citizens.

For industrial customers, we further reduced gas prices, assisted industrial customers in resuming work and stabilising production, and aided the local economic recovery.



ENN Fujian Branch spares no effort to ensure gas supply to businesses and assists in pandemic prevention

Since the outbreak of the pandemic, ENN Fujian Branch provided high-quality services to residents, hospitals and other users. As businesses in various parts of Fujian Province resumed work and production, the Company introduced countermeasures quickly to coordinate several member companies to strengthen the safety protection of stations, pipelines, gas facilities, and equipment. Taking into account customer needs and concerns, we provided targeted and safe, energy supply solutions for businesses to resume production in time, contributing to the fight against the pandemic.

As the only disinfectant manufacturer in Quanzhou City, Pacific Pharmaceuticals had an urgent task of resuming work. ENN Quanzhou quickly responded to its needs by dispatching dedicated personnel to conduct comprehensive safety checks and implement meticulous safety measures while arranging dedicated personnel to support daily patrol inspections. With a daily gas consumption of 1,000 cubic meters, the disinfectant products produced were successively delivered to the frontlines of pandemic prevention across the country.



Staff completing safety checks



For public utility customers, the company adheres to the concept of "the pandemic is the order and the supply is our responsibility", and we adopted the initiative of "giving priority in gas supply, accepting payment after supply" to ensure safe and uninterrupted gas supply, even if customers were unable to pay. For hospital customers, we completed project construction and guaranteed supply during the peak period of the pandemic regardless of financial risks.



ENN Changsha undertakes the laying of pipeline network to help the hospital respond to the pandemic

On January 27, the business department of ENN Changsha received an emergency order to lay a natural gas pipeline for the North Campus of Changsha First Hospital. The hospital was the centralised admission and treatment center for the confirmed cases of COVID-19 in Hunan Province and was constructed 17 years ago during the SARS period. The overall facilities of the hospital had aged, and in order to deal with the pandemic, the hospital needed to be expanded.

Despite the tight schedule, the business department of ENN Changsha deployed resources quickly. After the energy supply plan was determined, construction was started immediately. After 72 hours, the natural gas pipeline was successfully connected. ENN Changsha successfully completed the task, addressing the urgent needs of the hospital.



ENN Changsha laying a pipeline for the hospital





4 SOCIAL RECOGNITION



S&P Global Platts 2020 Global Energy Awards, Award of Excellence: Downstream

Forbes Global 2020 2000 World's Largest Public Companies (Ranked 996)

> Institutional Investor 2020 All Asia Executive Team: Honored Companies Best IR Program (Sell-Side:Power Sector)

Fortune Magazine 2020 2020 Fortune China Top 500 (Ranked 148)

> IR Magazine 2020 Greater China Awards: Best Investor Event

Brand Finance 2020 World's 50 Most Valuable Public Utilities (Ranked 24)

The Asset 2020 Triple A Sustainable Capital Markets Regional Awards Best Green Bond (Renewable Energy/Transition Energy)



The ecological environment is critical to human survival and sustainable development. Every small change in the energy field may have a profound impact on social and economic development. Today, energy transition has become imperative for the world's energy development. The international energy market has reached a consensus on the low-carbon transition. In view of the current energy environment, the outlook of energy transition seems increasingly clear.

Looking forward to the future, ENN Energy will spare no effort in opening a new chapter in sustainable transformation, implementing a new strategy for clean energy, and actively contributing to the construction of a clean, low-carbon, safe and efficient modern energy system. We will devote ourselves in renewing innovation-driven development, accelerating technological innovation, providing customers with more diversified green solutions, elevating the industrial chain to the higher end of the value chain, and relying on innovation to achieve high-quality development. We will make every effort to advance cooperative development by protecting the rights and interests of employees, emphasising talent training and maintaining community relations, while actively participating in charitable undertakings to give back to the society.

In 2021, ENN Energy will continue to innovate, abide by its mission, and consider environmental impacts in making corporate development decisions . We will focus on energy conservation and emissions reduction, advocate for low carbon solutions and take practical actions to fulfill our environmental and social responsibilities, thereby contributing to the sustainable development of the economy, society and environment.

Environmental Category					
Indicator	Unit	2020	2019		
Waste Water	Tons	1,439,710.72	2,065,491.55		
Sulphur Dioxide Emissions	Tons	34.10	35.26		
Nitrogen Oxide Emissions	Tons	67.20	76.46		
Soot Emissions	Tons	2.30	10.92		
Hazardous Waste ¹	Tons	41.21	42.77		
Density of Hazardous Waste	Tons/ billion yuan of revenue	0.58	0.60		
Non-hazardous Waste ²	Tons	2,602.97	2,537.01		
Density of Non-hazardous Waste	Tons/ billion yuan of revenue	36.35	36.00		
Coal Consumption	Tons	43,631.11	39,529.32		
Diesel Consumption	Litres	1,132,927.92	1,082,878.79		
Gasoline Consumption)	Litres	4,022,073.92	4,440,582.26		
Natural Gas Consumption	Thousand normal cubic meters	12,006.42	9,529.16		
Electricity Purchased	MWh	128,244.82	209,747.78		
Comprehensive Energy Consumption	Tons of standard coal	75,494.33	79,061.24		
Density of Comprehensive Energy Consumption	Tons of standard coal/ billion yuan of revenue	1054.14	1,127.00		
Water Consumption	Tons	1,693,777.31	2,429,990.06		
Density of Water Consumption	Tons/ billion yuan of revenue	23650.49	34,625.00		
Scope I ³ Direct GHG Emissions	Tons of CO ₂ e	123,351.16	123,538.97		
Density of Direct GHG Emissions	Tons of CO ₂ e/ billion yuan of revenue	1,722.37	1,760.00		
Density of Direct GHG Emissions	Tons of CO ₂ e/ billion cubic meters of natural gas sales	4,171.70	4,581.80		
Scope II ⁴ Indirect GHG Emissions	Tons of CO_2 e	86,340.85	139,380.10		
Density of Indirect GHG Emissions	Tons of CO ₂ e/ billion yuan of revenue	1,205.59	1,986.00		
Density of Indirect GHG Emissions	Tons of CO ₂ e/ billion cubic meters of natural gas sales	2,920.02	5,169.31		
Total GHG Emissions	Tons of CO_2 e	123,351.16	262,919.07		
Density of Total GHG Emissions	Tons of CO ₂ e/ billion yuan of revenue	2,927.96	3,746.00		
Density of Total GHG Emissions	Tons of CO ₂ e/ billion cubic meters of natural gas sales	7,091.72	9,751.11		

Hazardous waste includes waste machinery oil, odorant waste barrels, waste chemical packaging, scrapped circuit boards produced during the manufacture and maintenance of gas meter and other hazardous waste generated by ENN Energy Headquarters and subsidiaries companies during gas distribution business operation in 2020.
 Non-hazardous waste includes household garbage and other non-hazardous waste produced during the manufacture and maintenance of gas meter generated by ENN

Energy Headquarters and subsidiaries companies during gas distribution business operation in 2020.

3 Direct GHG emissions (scope I) cover the direct emissions from energy (coal, diesel, gasoline, natural gas), which is consumed by natural gas retail business and gas wholesale business of ENN Energy Headquarters and subsidiaries companies during operation;

4 Indirect GHG emissions (scope II) cover the indirect emissions from electricity purchased, which is consumed by natural gas retail business and gas wholesale business of ENN Energy Headquarters and subsidiaries companies during operation.

Social Category			
Indicator	Unit	2020	2019
Number of employees	Persons	35,780	35,735
Male	Persons	26,923	26,464
Female	Persons	8,857	9,271
Fulltime	Persons	35,653	35,604
Halftime	Persons	127	131
< 30 years	Persons	10,931	11,675
30-50 years	Persons	22,014	21,487
> 50 years	Persons	2,835	2,573
Senior management	Persons	1,152	1,138
General employees	Persons	31,359	31,350
Middle management	Persons	3,269	3,247
Overseas	Persons	5	7
Hong Kong	Persons	12	14
Mainland China	Persons	35,763	35,714
Undergraduate degree	Persons	10,029	10,042
Junior college degree	Persons	12,476	11,651
High school and lower	Persons	12,488	13,159
Master's degree and above	Persons	787	883
Percentage of male in senior management	%	82.55	83.22
Number of males in senior management	Persons	951	947
Percentage of female in senior management	%	17.45	16.78
Number of females in senior management	Persons	201	191
Percentage of male in middle management	%	76.32	76.75
Number of males in middle management	Persons	2,495	2,492
Percentage of female in middle management	%	23.68	23.25
Number of females in middle management	Persons	774	755
Disabled employees	Persons	80	44
Minority employees	Persons	1,190	1,033
Newcomers	Persons	4,159	4,927
Newcomers from experienced hire	Persons	3,864	4,384
Newcomers from school	Persons	295	543
Overseas newcomers	Persons	0	0

Social Category			
Indicator	Unit	2020	2019
Turnover rate	%	9.46	9.80
Number of departed employees	Persons	3,385	3,499
Male turnover rate	%	9.60	9.70
Male departed employees	Persons	2,489	2,565
Female turnover rate	%	9.06	10.10
Female departed employees	Persons	896	934
Turnover rate of employees under 30 years	%	12.00	15.40
Departed employees under age 30 years	Persons	1,312	1,795
Turnover rate of employees age 30-50 years	%	8.34	6.70
Departed employees age 30-50 years	Persons	1,837	1,434
Turnover rate of employees over 50 years of age	%	8.32	10.50
Departed employees over 50 years of age	Persons	236	270
Total number of training sessions	Sessions	62,607	126
Number of total employees trained	Persons	35,780	13,790
Number of male employees trained	Persons	25,923	9,653
Number of female employees trained	Persons	9,857	4,137
Number of senior management employees trained	Persons	1,152	789
Number of middle management employees trained	Persons	3,269	1,716
Number of general staff trained	Persons	31,359	11,285
Percentage of certified personnel by specialty	%	3.09	2.75
Number of persons certified by profession	Persons	1,107	982
Total training time	Hours	519,240.19	638,109
Average training hours of male employees	Hours/Person	15.26	17.26
Average training hours of female employees	Hours/Person	12.56	19.57
Average training hours of senior management employees	Hours/Person	24.86	32.27
Average training hours of middle management employees	Hours/Person	17.69	24.76
Average training hours of general staff	Hours/Person	13.80	16.62
Number of fatalities due to production incidents	Persons	1	1
Total recordable incidents	Incident(s)	91	74
Total recordable incident rate (excluding fatalities)	%	0.25	0.25

Social Category			
Indicator	Unit	2020	2019
Lost time ⁵	Hours	29,233	53,659
Lost time incident rate (LTIR) 6	/	1.27	1.04
Total recordable incident rate (per thousand employees) ⁷	/	2.54	2.07
Total safety training	Person-times	412,183	200,132
Safety training for general manager level	Person-times	120	/
Safety training for safety management personnel	Person-times	3,200	3,400
Safety training for employees	Person-times	408,863	196,732
Number of full-time security management staff	Persons	669	643
Number of safety emergency drills	Times	11,002	2,627
Patents under application	Pieces	186	144
Effective patents	Pieces	848	665
Effective copyrights	Pieces	284	267
Effective trademarks	Pieces	8	8
R&D investment	Million yuan	468.67	334.11
Number of effective and significant complaints investigated	Cases	0	0
Number of concluded legal cases regarding corruption practices	Cases	0	0
Number of senior management received anti-corruption training	Persons	843	670
Number of employees in key positions received anti-corruption training	Persons	623	590
Total number of employees receiving anti-corruption training	Persons	1,766	1,680

5 The Lost Time indicator reports the number of hours worked lost as a result of either on-site or off-site work-related incidents.

6 The Lost Time Incident Rate (LTIR) is calculated as the number of LTIs divided by hours worked, multiplied by 1,000,000.

7 The Total Recordable Incident Rate (per thousand employees) is calculated as 1,000 multiplied by the number of work-related incidents dived by the total number of employees.



Subject Area	Indicators	Location in the Report or Explanation
A1 Emissions	 General Disclosure Information on: the following in relation to exhaust gas and greenhouse gas emission, discharge of sewage into water and land, and generation of harmful and harmless wastes: (a) the policies; and (b) compliance with relevant laws and regulations that have a significant impact on the issuer 	P17, P50
	A1.1 The types of emissions and respective emissions data.	P50-52
	A1.2 Greenhouse gas emissions in total (in tonnes) and, where appropriate, intensity (e.g. per unit of production volume, per facility).	P17
	A1.3 Total hazardous waste produced (in tonnes) and, where appropriate, intensity (e.g. per unit of production volume, per facility).	P50
	A1.4 Total non-hazardous waste produced (in tonnes) and, where appropriate, intensity (e.g. per unit of production volume, per facility).	P50
	A1.5 Description of measures to mitigate emissions and results achieved.	P12-22, P26-27, P50-52
	A1.6 Description of how hazardous and non-hazardous wastes are handled, reduction initiatives and results achieved.	P51-52
A2 Use of Resource	General Disclosure Policies on the efficient use of resources, including energy, water and other raw materials.	P17, P53
	A2.1 Direct and/or indirect energy consumption by type (e.g. electricity, gas or oil) in total (kWh in '000s) and intensity (e.g. per unit of production volume, per facility).	P53
	A2.2 Water consumption in total and intensity (e.g. per unit of production volume, per facility).	P53
	A2.3 Description of energy use efficiency initiatives and results achieved.	P16-22, P53-54
	A2.4 A2.4 Description of whether there is any issue in sourcing water that is fit for purpose, water efficiency initiatives and results achieved.	P53-54
	A2.5 Total packaging material used for finished products (in tonnes) and, if applicable, with reference to per unit produced.	The Group's business rarely involves recall of the products, therefore is not a material issue to the Group
A3 The Environment and Natural Resources	General Disclosure	P23
	Policies on minimising the significant impact on the environment and natural resources.	
	A3.1 Description of the significant impacts of activities on the environment and natural resources and the actions taken to manage them.	P23-27

7 LIST OF HKEX'S ESG INDICATORS

Subject Area	Indicators	Location in the Report or Explanation
B1 Employment	General Disclosure Information on:	P28
	the following in relation to salary and dismissal, recruitment and promotion, working hours, vacations, equal opportunities, diversity, anti- discrimination and other remuneration and benefits:	
	(a) the policies; and	
	 (b) compliance with relevant laws and regulations that have a significant impact on the issuer 	
	B1.1 Total workforce by gender, employment type, age group and geographical region.	P28-29
	B1.2 Employee turnover rate by gender, age group and geographical region.	P29
B2	General Disclosure Information on:	P30
Health and Safety	the following in relation to provision of safe working environment and prevention of employees from occupational hazards:	
	(a) the policies; and	
	 (b) compliance with relevant laws and regulations that have a significant impact on the issuer 	
	B2.1 Number and rate of work-related fatalities.	P31
	B2.2 Lost days due to work injury.	P31
	B2.3 Description of occupational health and safety measures adopted, how they are implemented and monitored.	P30-33
B3 Development and Training	General Disclosure	P58-61
	Policies on improving employees' knowledge and skills for discharging duties at work. Description of training activities.	
	Note: the training here means vocational training, including in-house and external courses to be paid by the employer.	
	B3.1 The percentage of employees trained by gender and employee category (e.g. senior management, middle management)	P58
	B3.2 The average training hours completed per employee by gender and employee category.	P58
B 4	General Disclosure Information on:	P28
Labor Standards	the following in relation to prevention of child labor or forced labor:	
	(a) the policies; and	
	(b) compliance with relevant laws and regulations that have a significant impact on the issuer	
	B4.1 Description of measures to review employment practices to avoid child and forced labor.	P28
	B4.2 Description of steps taken to eliminate such practices when discovered.	P28

7 LIST OF HKEX'S ESG INDICATORS

Subject Area	Indicators	Location in the Report or Explanation
B5	General Disclosure	P36
Supply Chain Management	Policies on managing environmental and social risks of the supply chain.	
	B5.1 Number of suppliers according to geographical region.	P36
	B5.2 Description of practices relating to engaging suppliers, number of suppliers where the practices are being implemented, how they are implemented and monitored.	P38
B6	General Disclosure Information on:	P37, P42
Product Responsibility	the following in relation to health, safety, advertisement, labelling and privacy matters of products and services provided, as well as remedies:	
	(a) the policies; and	
	(b) compliance with relevant laws and regulations that have a significant impact on the issuer	
	B6.1 Percentage of total products sold or shipped subject to recalls for safety and health reasons.	The Group's business rarely involves recall of the products, therefore is not a material issue to the Group
	B6.2 Number of products and service related complaints received and how they are dealt with.	P47-49
	B6.3 Description of practices relating to observing and protecting intellectual property rights.	P40-42
	B6.4 Description of quality assurance process and recall procedures.	P42-47
	B6.5 Description of consumer data protection and privacy policies, how they are implemented and monitored.	P37
B7 Anti-corruption	General Disclosure Information on:	P34-35
	the following in relation to prevention of bribery, extortion, fraud and money laundering:	
	(a) the policies; and	
	(b) compliance with relevant laws and regulations that have a significant impact on the issuer	
	B7.1 Numbers and results of adjudicated corruption lawsuit against issuers or their employees during the reporting period	P36
	B7.2 Description of preventive measures and whistle-blowing procedures, how they are implemented and monitored	P34
B8	General Disclosure	P65
Community Investment	Policies on community engagement to understand the needs of the communities where the issuer operates and to ensure its activities take into consideration the communities' interests.	
	B8.1 Focus areas of contribution (e.g. education, environmental concerns, labor needs, health, culture, sport).	P65-68
	B8.2 Resources contributed (e.g. money or time) to the focus area.	P65

8 READER'S FEEDBACK FORM

Dear readers:

Thank you for reading our 2020 Environmental, Social and Governance Report. In order to enhance communication with you and other stakeholders and to continuously improve the environment, social and governance performance of our company and the preparation of future reports, we sincerely hope to listen to your valuable comments and suggestions, and we sincerely look forward to your feedback in the following ways:

Please provide us with specific feedback:

1. What is you	ir overall comment on	this report?	
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
2. What do yo	u think about the clari	ty, accuracy and	d completeness of the information disclosed in this report?
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
3. What do yo report?	ou think of the compre	ehensiveness of	the economic responsibilities undertook by the Group that were reflected in this
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
4. What do you report?	u think of the compreh	nensiveness of th	he environmental responsibilities undertook by the Group that were reflected in this
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
5. What do yo	u think of the compret	nensiveness of th	he social responsibilities undertook by the Group that were reflected in this report?
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
6. What do yo	u think of the design a	nd layout of this	s report?
\bigcirc Good	\bigcirc Relatively good	\bigcirc Average	○ Below average
7. Which part	of this report do you th	nink need impro	ovement?
⊖ Governa		⊖ Services	○ Supply chain ○ Employees ○ Environment ○ Society
8 Content tha	at you wish to know abo	out but is not die	sclosed in this report-
o. oontont the			
9. Your opinio	ns and suggestions in	respect of our e	nvironmental, social and governance performance and reporting:



 Rooms 3101-04, 31/F., Tower 1, Lippo Centre,

 No.89 Queensway, Hong Kong

 Tel
 • (852) 2528 5666

 Fax
 • (852) 2865 7204

 Website
 • www.ennenergy.com

E-mail - enn@enn.cn