



2024

Environmental, Social and Governance Report

Shenzhen Expressway Corporation Limited

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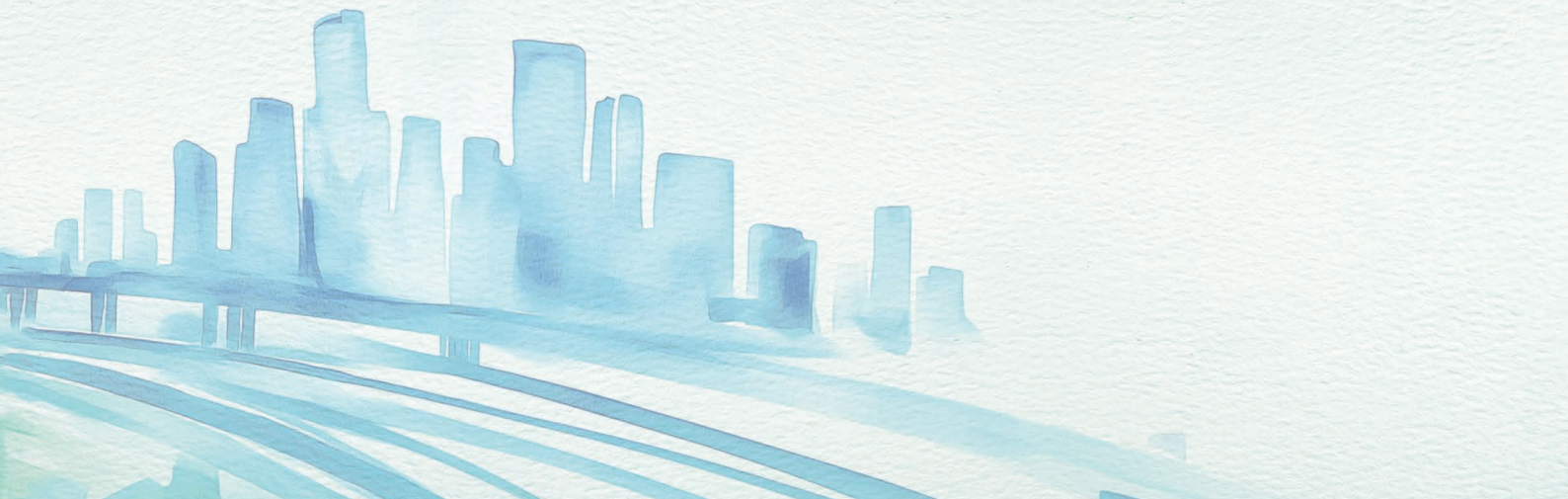
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About the Report



Report Introduction

This report is the fifth Environmental, Social and Governance (ESG) report, alias the sixteenth Social Responsibility report issued by Shenzhen Expressway Corporation Limited (hereinafter referred to as "Shenzhen Expressway," "the Company," or "we"). The purpose of this report is to present Shenzhen Expressway's practices and achievements objectively and transparently in the social responsibility and sustainable development aspects to stakeholders such as shareholders, employees, government, customers, partners and the public.

Scope of the Report

This report is an annual report covering the period from 1 January 2024, to 31 December 2024, some of the information may be traceable beyond the reporting period. The organisational scope of this report includes Shenzhen Expressway Corporation Limited and its subsidiaries.

Basis of Preparation

This report is prepared in accordance with the *Shanghai Stock Exchange on the Application of Self-Regulation Rules for Listed Companies No. 1 – Standardised Operation* and *Shanghai Stock Exchange on the Application of Self-Regulation Rules for Listed Companies No. 14 – Sustainable Development Report (Trial)*, as well as the *Code on Environmental, Social and Governance Reporting of the Stock Exchange of Hong Kong Limited*. It also references the *International Financial Reporting Standards Foundation's International Financial Reporting Sustainability Standards 1 (IFRS S1) – General Requirements for Sustainability-Related Financial Information Disclosure* and *International Financial Reporting Sustainability Standards 2 (IFRS S2) – Climate-Related Disclosures*.



Data Sources

Information in this report is derived from the Company's financial reports and from the Company's statistical, aggregated and reviewed environmental, social and governance information. Unless otherwise specified, all monetary amounts are denominated in RMB. During the reporting period, due to adjustments in statistical methods for certain data, some information has been restated. In cases where there is inconsistency with data from previous annual reports, the information in this report shall prevail.

Publication Channels

You can access and view this report on the website of Shanghai Stock Exchange (www.sse.com.cn) and the website of the Stock Exchange of Hong Kong Limited. (www.hkexnews.hk). This report is published in both Chinese and English. In the case of any discrepancies in the interpretation of the two versions, the Chinese version shall prevail.

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Message from the Chairman

In 2024, Shenzhen Expressway remains steadfast in the mission of “Building high-quality infrastructure, Serving a better life in the city,” advancing resolutely toward goals. Aligning with corporate high-quality development trends, we proactively optimise management and drive sustainable initiatives to deeper implementation with focused commitment.

Building a compliant enterprise is our priority

We continue to strengthen the Board’s strategic leadership, optimise decision-making processes for greater efficiency, and enhance information disclosure quality to uphold market credibility. By integrating compliance management into business operations through smart solutions, we dynamically monitor key compliance areas and key points, enabling timely risk alerts and mitigation. Actively promoting a culture of “Integrity. Discipline. Duty.”, we have built a company-wide compliance framework embedded with core values. Through 71 integrity training sessions, 133 educational film screenings, and 25 anti-corruption posters, we persistently amplify the reach and impact of ethical practices, fostering a clean and transparent environment for sustainable growth.

Excellent quality leads to perfection, and dedicated service brings warmth

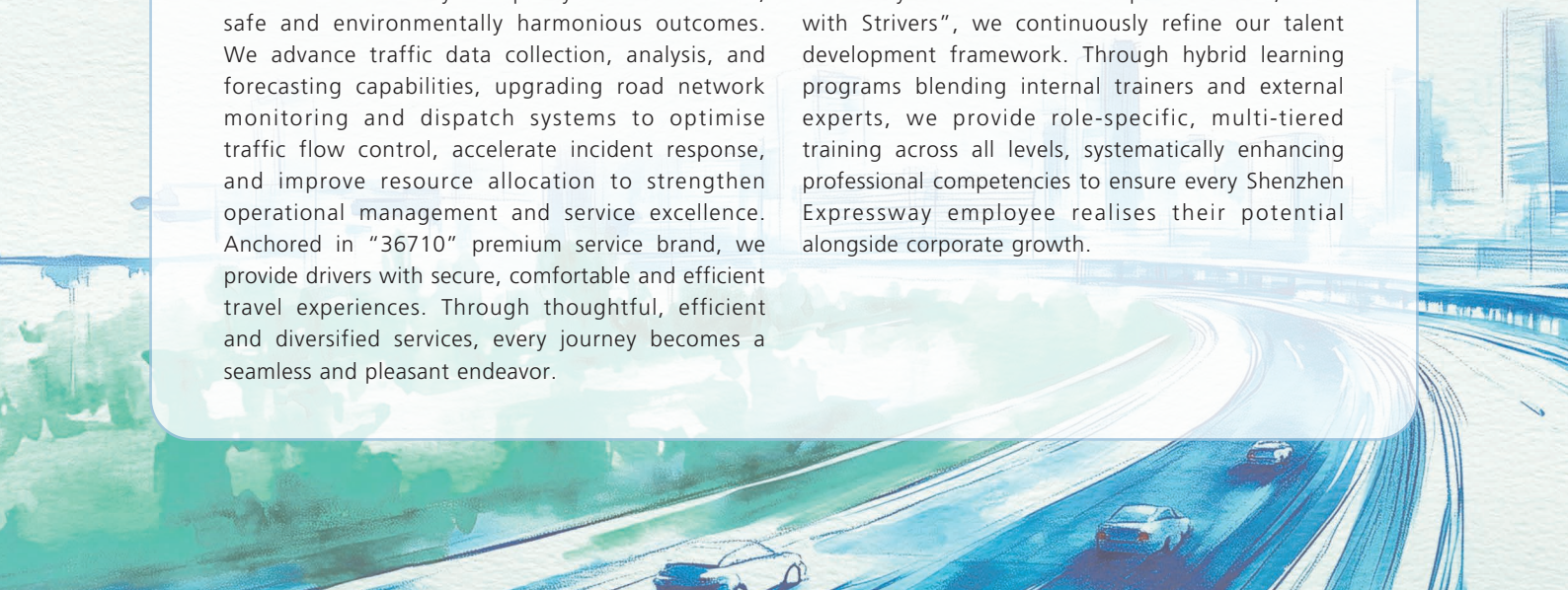
Guided by our commitment to building safe and high-quality infrastructure, we continuously refine a full-process quality control system covering project planning, design, bidding, material supervision, construction and maintenance. By leveraging technological innovation and smart engineering technologies in major projects, we enhance construction efficiency and quality to deliver durable, safe and environmentally harmonious outcomes. We advance traffic data collection, analysis, and forecasting capabilities, upgrading road network monitoring and dispatch systems to optimise traffic flow control, accelerate incident response, and improve resource allocation to strengthen operational management and service excellence. Anchored in “36710” premium service brand, we provide drivers with secure, comfortable and efficient travel experiences. Through thoughtful, efficient and diversified services, every journey becomes a seamless and pleasant endeavor.

Pursuing green development for a low-carbon future

Aligning with China’s “dual-carbon” strategy, we drive green development through solid waste recycling and clean energy generation. In 2024, we processed 1,400,958 tons of organic waste and generated 38,579 MWh of grid-connected biogas power, equivalent to reducing CO₂ emissions by 22,149 tons and saving 3,360 tons of standard coal. Wind power projects contributed 1,468,817 MWh of grid-connected electricity, cutting CO₂ by 1,201,492 tons and standard coal usage by 180,517 tons. We institutionalised ecological stewardship by implementing the Ecological and Environmental Protection Management Regulations. This cross-functional environmental management system spans project development, road operations, and eco-industrial operations, embedding supervision mechanisms to monitor environmental impacts across planning, design, construction, and operational phases, systematically advancing ecological sustainability.

Human-oriented approach, elite aggregation

Upholding a people-first philosophy, we strictly comply with labor regulations to safeguard employee rights and foster an equitable, inclusive workplace. Guided by our talent vision “Empower Strivers, Grow with Strivers”, we continuously refine our talent development framework. Through hybrid learning programs blending internal trainers and external experts, we provide role-specific, multi-tiered training across all levels, systematically enhancing professional competencies to ensure every Shenzhen Expressway employee realises their potential alongside corporate growth.



Taking responsibility and giving back to society

We actively advance regional transportation development by delivering high-quality infrastructure projects such as the Longli River Bridge in Guizhou Province, Tonggang Avenue in Shenzhen-Shanwei Cooperation Zone and Coastal Phase II, while accelerating new construction and upgrades of key routes including Outer Ring Phase III, Jihe Expressway, and the guangzhou-shenzhen section of G4 to strengthen regional connectivity and drive economic growth. Concurrently, we sustain multi-year rural empowerment programs in underdeveloped areas to consolidate poverty alleviation achievements and support rural revitalisation. Further, we pioneer an integrated “Home-Community-Institution” senior care ecosystem, offering aging-friendly home renovations, community dining, sports rehabilitation and childcare services, complemented by smart eldercare solutions to advance societal goals of quality senior care and youth development. Our commitment extends to strict compliance with labor regulations, equitable workplace practices, and a talent development framework combining internal and external expertise to empower employees’ professional growth in alignment with corporate objectives.

Future outlook

Shenzhen Expressway will balance economic and social value creation, driving innovation and green transition to empower regional prosperity while delivering safer, more efficient, and sustainable mobility solutions. Simultaneously, anchored in our eco-industrial expertise, we will advance circular resource models and clean energy initiatives to accelerate China’s low-carbon future. Committed to being a trusted partner for all stakeholders, we pledge actionable, purpose-driven strategies to advance shared prosperity and the sustainable development goals.

Xu En Li

Chairman

Shenzhen, the PRC, 21 March 2025

Statement by the Board of Director

The Company’s Board of Directors attaches great importance to the sustainable development management. The Company has established an effective ESG management mechanism and has formed an ESG governance structure featuring clear hierarchy and labor division.

As the highest governance body, the Board of Directors is the highest responsible organisation for ESG matters of the Group, responsible for considering and approving the ESG strategy, vision and objectives, and reviewing and evaluating the risks and significance related to ESG matters. The Board of Directors hears and reviews the Company’s Environmental, Social and Governance Report annually, and supervises the implementation progress against the related ESG targets.

During the reporting year, the Company has completed the review and assessment of ESG issues and set ESG environmental targets. The Board of Directors reviewed, discussed and confirmed the ESG work results of this year. This report was approved by the Board of Directors on 21 March 2025.

About Us

Company Profile

Shenzhen Expressway (stock code: 600548.SH/00548.HK), founded in 1996, specialises in investment, construction and operation management of toll expressway and general environmental protection. At present, the general environmental protection business mainly includes solid waste resources treatment and clean energy generation. Besides, we are also a service provider of high-quality construction management and expressway operation management for the government and other enterprises. Supported by our relevant management experience and resources, we also carry out project development and management, operation and maintenance, engineering management and industrial finance and other services based on our main business.

As of the date of this report, The Group has operated and invested in a total of 16 expressway projects, and the mileage of high-grade expressways invested or operated is approximately 613 kilometers converted based on the proportion of controlling interests. The Company actively participated in many regional urban infrastructure development projects and invested in 21 environmental protection, clean energy and financial projects. We also operate many platform companies of investment, construction, operation, environment, urban infrastructure and new energy.



Our history
29 years



Total assets
67.8 billion



Total workforce
7,254

Business Segments

Toll expressway

The Group, as an important service provider for the construction and operation of transportation infrastructure in the Guangdong-Hong Kong-Macao Greater Bay Area, is undertaking key projects of the Greater Bay Area (GBA). The operated and invested toll expressway projects are mainly located in the Pearl River Delta and economically developed areas in the central and eastern regions, interconnecting important industrial, commercial areas, airports, ports and other infrastructures like arteries, which plays an important role in facilitating the regional economic development.

General environmental protection

General environmental protection: The Group has run large-scale clean energy generation and recovery and solid waste treatment with quick business growth and fostering capacity. Meanwhile, the Group runs business in the dismantling and laddering utilisation of retired automobiles and new energy batteries, taking practical actions for the realisation of the lucid waters and lush mountains.

New businesses

The Group also launches the new urban construction business and the industrial-financial integration business and has participated in the construction of several large-scale municipal projects with its excellent construction management capacity. The combination of industry and finance has become a new driver for the sustainable development of its dual core businesses and the Group has formed a business landscape of "participating in one and controlling two"¹.

¹ Shenzhen Expressway has invested in Bank of Guizhou by equity participation, whilst having controlling shares in Shenzhen Expressway Private Equity Industrial Investment Fund Management Company Limited and Shenzhen Expressway Financial Leasing Company Limited.

Corporate Culture

Building high-quality infrastructure

Shenzhen Expressway has specialised in the infrastructure field for years, especially in traffic and urban infrastructure and general environmental protection, to create the core competitive edge of "dual core businesses". We also explore and foster new businesses such as urban comprehensive services, integration of industry and finance, and leverage our construction and operation management capacity in transportation infrastructure, municipal engineering, urban comprehensive development and other aspects to deliver top-notch products and services for the government and the society.

Serving a better life in the city

As a key enterprise of transportation infrastructure in Shenzhen, Shenzhen Expressway plays a protective role in urban infrastructure construction and urban operation with the backing of talents, funds and technological advantages. In this way, we provide residents there with safer and more convenient travel conditions and a cleaner and more beautiful living environment, allowing coexistence and win-win results between ourselves and the city.



Mission



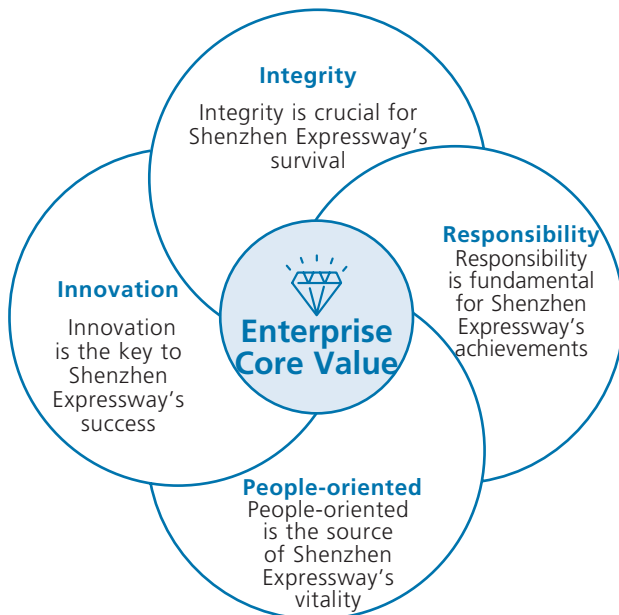
Vision

To become a leading provider of road transport and urban infrastructure

At the historical juncture of building the Greater Bay Area and building Shenzhen into a demonstration area of socialism with Chinese characteristics, apply the development and innovative strategy of improving asset scale, investment return, engineering construction and operational management capacities by adjustment, consolidation and optimisation, capacity expansion and quality improvement, cost reduction and efficiency increase, holding a leading position in the toll expressway industry.

To become a segment leader of general environmental protection

We have actively expanded featured environmental protection and integrated clean energy, on the agenda of focusing on expansion, keeping exploring, fostering capability and building a team strategy. We have forged competitive strengths in niche-general environmental protection and built a leading brand in this regard with distinctive characteristics and advantages.



Corporate Spirit

Delve to the deep

Specialise in our core businesses by dedication, being pragmatic, learning and improving our expertise.

Strive for the top

Never slack off in good times and never give up in bad times, pursue development actively and seek breakthroughs and improvements.

Fight for the speed

Always strive to make progress with persistent efforts and passion and always pursue excellence to be a pioneering leader.

Event of the Year

January

In January, was listed on the ESG Pioneer 100 index of state-owned enterprises (2023).

February

In February, was awarded the title of "Top 100 Shenzhen Brands".

We stuck to the front line and made every effort to ensure the smooth operation of the city. During the spring festival, there were 1.702 million passengers and 7.982 million free vehicles in the service areas (parking areas) of the sections under their jurisdiction. The wind farms under management generated a total of 38.85 million kWh of electricity, meeting the electricity needs of 558,000 households, processed a total of 20,000 tons of kitchen and food waste, converting it into 577,000 kWh of electricity.

August

In August, was selected for the "Greater Bay Area State-owned Enterprises ESG Development Index" and the "China ESG Listed Companies Greater Bay Area Pioneer 50 (2024)", ranking 16th and 35th respectively.

Shenshan Qiantai was recognised as a Shenzhen Green Factory, continuously making efforts in environmental protection, energy conservation and technological innovation, further promoting green transformation.

July

In July, the "Integrated Photovoltaic Storage and Charging" project in the Shenshan Qiantai Industrial Park was connected to the grid for power generation, realising the development of the "Zero-carbon industrial park" in Shenshan Qiantai Industrial Park, help the Shenshan Special Cooperation Zone to lay a solid foundation for the coordinated development of industries.

Jihe Expressway R&E Project has officially commenced, which holds significant strategic importance for promoting Shenzhen's "East Expansion and West Connection" development and serving the construction of the world-class city cluster in the Greater Bay Area.

September

In September, won three awards in the speech contest of the 4th Shenzhen Workers' cultural festival.

October

In October, won the tender for the major and medium-sized road maintenance and 2024 works in Shenshan Special Cooperation Zone (package C), laying a solid foundation for the continuous development of the shenzhen-shanwei maintenance market.

March

In March, E Fund SZ Expressway REIT was successfully listed on the Shanghai Stock Exchange. As the first expressway-REIT product to be listed in Hunan province, it will be of great significance to support the construction of urban agglomerations in Hunan province and promote the high-quality development of the Yangtze River Economic Belt. The Shaoyang City kitchen waste treatment project put into operation, marking a new developmental stage in the harmless and resourceful treatment and utilisation of kitchen waste collection and disposal in Shaoyang.

April

In April, the Longli River Bridge in Longli County, Guizhou Province built by Investment Company was officially opened to traffic, pushing the local economic and social development to a new level. The Longli River Bridge was awarded the "Guizhou Province 2024 Quality Engineering Award" at the beginning of 2025.

June

In June, was awarded the "Outstanding Contribution Enterprise in Shenzhen Waste-Free City Construction" by the Shenzhen Municipal Ecological Environment Bureau.

The Shenshan Special Cooperation Zone Tonggang Avenue, constructed by the Company on behalf of the government, has been officially opened to traffic, further improving the internal transportation network and providing solid transportation support for industrial production, distribution and maritime access.

The Shenzhen-side connection project of the Shenzhen-Zhongshan Link (Coastal Phase II), the Company constructed by the Company, has been officially opened to traffic, significantly reducing the travel time between the two sides of the Pearl River. This milestone holds significant importance for advancing the integrated development of the Pearl River Delta city cluster and promoting socio-economic progress in the Guangdong-Hong Kong-Macao Greater Bay Area.

May

In May, the Guangming Environmental Park in Shenzhen, built by Guangming Environment, officially entered the trial operation stage. As a major municipal livelihood project in Shenzhen, the Guangming Environment Park also represents the city's largest single food waste treatment facility in terms of processing capacity.

November

In November, the elderly-care services provided by Shenzhen Expressway Joyful Wellness Health Services (Shenzhen) Co., Ltd. met the five-star standard and obtained a three-star rating for the integration of medical and elderly services, indicating that the institution has reached a new height in the deep integration of medical and pension services.

December

In December, the break-in of Tiantoushan Tunnel of the right main line of the Outer Ring Phase III (Kengzi-dapeng section) initiates China's largest expressway cross-section tunnel construction.

Core Highlights in ESG

Highlights in performance

Environmental



Awarded the “Outstanding Contribution Enterprise in Shenzhen Waste-Free City Construction”

Implemented the “three centralisations” management principle and ensured the “seven 100%” and “eight musts” dust control and noise reduction measures, ranked **5th** in the ecological civilisation construction assessment in Shenzhen

In 2024, the amount of wind power generated **1,468,817** MWh and connected to the grid is equivalent to reducing carbon dioxide emissions by **1,201,492** tons and saving **180,517** tons of standard coal

In 2024, collected and processed **1,400,958** tons of organic waste, processed **366** MWh of end-of-life power batteries

In 2024, the amount of electricity generated from biogas power generation connected to the grid is **38,579** MWh, which is equivalent to reducing carbon dioxide emissions by **22,149** tons and reducing the use of standard coal by **3,360** tons

Social



Adopted a digital management model for the entire lifecycle of infrastructure, utilised a road network monitoring and command dispatch platform, and deployed a road inspection application system based on drones

In 2024, a total of **1,700** person-times of employees participated in voluntary services, provided a cumulative total of **3,811** hours of voluntary service

In 2024, the research and development investment amounted to RMB**3,293** million, with **18** new patents obtained, and the proportion of management and technical personnel reached **26.67%**

In 2024, the Community Comprehensive Service Centre has received a total of **29,682** visitors

Governance



Implemented the “Five Highs and Five Speeds Joint Actions” to promote the integration and mutual promotion of party building and business

Established a comprehensive compliance, risk control, and supervision collaborative closed-loop management system, and set up a full-chain risk prevention and control system along with corresponding operational mechanisms

The typical case of “Party Building Leading and Cultural Empowerment 456 Project” was selected for inclusion in the compilation of “Excellent Achievements in Party Building and Corporate Culture Innovation in the New Era” Selected as the “Best Practice Case in Corporate Culture Building for Listed Companies” by the China Association for Public Companies in July 2024

Selected as the “Best Practice Case of the Board of Directors of Listed Companies in 2024” by China Association for Public Companies

Awarded the “Top 20 Board of Directors Governance in Listed Companies in the Greater Bay Area 2024” by Shenzhen Corporate Governance Research Association

ESG Honors

Awards and Honors of the Group



Was listed on "the ESG Pioneer 100 index of state-owned enterprises (2023)", ranking 26th

In January 2024



Was selected for the "Greater Bay Area State-owned Enterprises ESG Development Index" and the "China ESG Listed Companies Greater Bay Area Pioneer 50 (2024)", ranking 16th and 35th respectively

In August 2024



Was awarded the "Outstanding Contribution Enterprise in Shenzhen Waste-Free City Construction" by the Shenzhen Municipal Ecological Environment Bureau

In June 2024



Was awarded the "ESG Commendation Certification" by the Sing Tao News Corporation

In November 2024



Was selected as the "Best Practice Case of Sustainable Development for Listed Companies in 2024" by the China Listed Companies Association for the second consecutive year

In November 2024



Was awarded the "KPMG ESG Top 50 Awards — Green Low-Carbon Pioneers"

In December 2024



Was selected for the "11th Hong Kong Stock Top 100" rankings by the HK Top 100 Research Center, securing 44th place in the "Medium-sized Enterprises 50 (Comprehensive Strength)" category

In November 2024



Was awarded the "2024 China Listed Company Yinghua Hong Kong Stock Investment and Financing Innovation Award" by China Fund News

In August 2024



Was selected as the
"Best Practice Case of the
Board of Directors of Listed
Companies in 2024"
by the China Association of
Listed Companies for the
second consecutive year

In November 2024



Was awarded the
"Top 20 Board of Directors
Governance in Listed Companies
in the Greater Bay Area 2024"
by Shenzhen Corporate
Governance Research Association

In November 2024



Was awarded the
"2024 Contribution Award"
by Shenzhen Corporate
Governance Research Association

In November 2024



Was awarded the
"15th China Listed Company Investor
Relations Management Pegasus Award"
by Securities Times

In July 2024



Was awarded the
"2024 China Listed Company
Yinghua A-share Value Award"
by China Fund News

In August 2024



Was awarded the
"2024 China Listed Company Yinghua
Hong Kong Stock Investment and
Financing Innovation Award"
by China Fund News

In August 2024



Was honored with the
"Best Information Disclosure Award"
by the RoadshowChina

In January 2025



Was honored with the
"Best Investor Relations Program"
by the RoadshowChina

In January 2025



Was honored with the
"Best Capital Market
Communication Award"
by the RoadshowChina

In January 2025



Was awarded the title of
"Top 100 Shenzhen Brands"
by the Shenzhen Quality Strong
City Promotion Association

In February 2024

Subsidiary Companies Awards

Construction Company

- Construction Company's "BIM Forward Design and Digital Delivery Integrated Application in Construction Drawing Design Phase for Shenzhen Jihe Expressway Three-dimensional Composite Reconstruction & Expansion Project" won the Second Prize in the 2023 "Transportation BIM Engineering Innovation Award" by China Highway and Transportation Society and the Excellence Award in the 2023 12th "Longtu Cup" National BIM Competition by China Graphics Society.
- Construction Company's "Research and Application of Key BIM-based Technologies in Design Phase for Jihe Three-dimensional Composite Expressway" received the Gold Award in the 2023 "Tiangong Cup" by China Highway and Transportation Society and the Silver Award in the 4th "Smart Construction Cup" by Macao Digital Building Association.
- Construction Company's "Collaborative Design and Management Application of the World's First 18m Super-large Diameter Stacked Shield Tunnel with BIM Digitalization" was awarded the Bronze Award in the 4th "Smart Construction Cup" by Macao Digital Building Association.
- Construction Company's "Key Technical Indicators Research on Three-dimensional Composite Expressways" and "Multi-channel Tidal Lane Control System for Expressway Toll Stations" secured the First Prize and Second Prize, respectively, in the 2nd "Shenzhen Transportation Engineering Technology Innovation Awards" by Shenzhen Urban Transportation Association.

Qinglian Expressway

- Qinglian Expressway Customer Service Team was granted the Most Beautiful "China Highway Sisters Team" Title.

Operation Development Company

- Operation Development Company's "Employee Psychological Wellness Station Project" was awarded the Third Prize in the "2023 Provincial Outstanding Psychological Service Demonstration Project for Employees" by the Provincial Trade Union Council.
- Operation Development Company received the Advanced Unit in Expressway Traffic Accident Prevention for 2023 from the Shenzhen Municipal Public Security Bureau Traffic Police Department.
- Operation Development Company's Guanlan Toll Station Inspection and Control Team was honored with the 2023 China Highway Sisters Team Finalist Award.

Financial Leasing Company

- Financial Leasing Company won the 2023 Outstanding Rising Star Award in the Financial Leasing Industry.

Infrastructure and Environmental Protection Company

- Infrastructure and Environmental Protection Company was honored with the 2023 Special Contribution Award by the Shenzhen-Shanwei Special Cooperation Zone.

Investment Company

- Investment Company's health and wellness project staff won the Second Prize in the Shenzhen Elderly Care Worker Vocational Skills Competition.

Shenshan Qiantai

- Shenshan Qiantai was recognised as a Shenzhen Green Factory.

Bioland

- Bioland received the Third Prize in the Guangxi Science and Technology Awards.

Lisai Environmental

- Lisai Environmental was honored with the 2023 Advanced Practical Technology Award for Ecological Environmental Protection by National Sub-provincial Cities.
- Lisai Environmental was awarded the title of Shenzhen Specialised, Sophisticated, Distinctive and Innovative SME.
- Lisai Environmental won the Second Prize in the Science and Technology Awards by the China Environmental Protection Federation.

Guangming Environmental Park Project

- Guangming Environmental Park Project secured the Second Prize in the National BIM Competition.

Bay Area Development

- Bay Area Development was consecutively awarded the "15+ Years Caring Company Award" by the Hong Kong Council of Social Service in 2023 and 2024.

Guishen Company

- Guishen Company's Longli Jichang to Duohua Road Project was honored as the "Guizhou Provincial 2023 Green Construction Demonstration Project for Construction Engineering".
- The Longli River Bridge was awarded the "Guizhou Province 2024 Quality Engineering Award".

Property Company

- Property Management Company Guizhou Longli Branch received the 2023 "Five-Star Property Service Community" Award.

Special Topic

Mountains and Rivers Bear Witness,

Roads Span the Horizons

“

Shenzhen Expressway is accelerating the advancement of transportation infrastructure construction by continuously improving the layout of road networks, expanding and upgrading main congested sections, promoting higher-quality regional transportation connectivity, and helping to build a more convenient, efficient, and environmentally friendly modern transportation system.

”

Completed Project



Coastal Phase ii (Shenzhen side connection of the Shenzhen-Zhongshan link) was opened to traffic

On 30 June 2024 Coastal Phase II (Shenzhen Side Connection of the Shenzhen-Zhongshan Link) along with the Shenzhen-Zhongshan Link, which is the core transportation hub project of the Guangdong-Hong Kong-Macao Greater Bay Area, opened simultaneously.



Schematic Diagram of Road Network of Coastal Phase II

Coastal Phase II (Shenzhen-side connection of the Shenzhen-Zhongshan Link) is located in Bao'an District, Shenzhen City. It serves as an important connection between the Coastal Expressway, the Shenzhen-Zhongshan Link, the Jihe Expressway, the Guangzhou-Shenzhen Expressway, and the Bao'an International Airport. Upon completion, it will further strengthen the interconnection of the main east-west arterial roads in Shenzhen, extend the transportation capacity to the west bank of the Pearl River, and contribute to the high-quality development of the Guangdong-Hong Kong-Macao Greater Bay Area.



Coastal Phase II

The Tonggang Avenue, constructed by Shenzhen Expressway, is now officially open to traffic along its entire length

On 1 June 2024, the Tonggang Avenue, constructed by Shenzhen Expressway, officially opened the entire line of the Tonggang Avenue in the Shenshan Special Cooperation Zone. The opening of Tonggang Avenue will further improve the transportation network within the Shenshan Special Cooperation Zone, helping to accelerate the integrated development of the "Port-Industry-City" in Shenzhen and Shanwei, and promote high-quality economic development in the region.



Shenshan Special Cooperation Zone
"Five Horizontal and Six Vertical" Road Network Map



Tonggang Avenue

As one of the vertical arteries in the internal skeleton road network of the Shenzhen-Shanwei Cooperation Zone's "Five Horizontal and Six Vertical" layout, the completion and opening of Tonggang Avenue seamlessly connects Xiaomo International Logistics Port, Shenzhen Expressway BYD Automobile Industrial Park, Shenshan Ecological Environment Industrial Park, and passenger transportation hubs along the route. This provides solid transportation support for industrial production, distribution, overseas exports, and the early operation of smart and environmentally friendly industrial parks, promoting the comprehensive acceleration of the integrated development of the Shenzhen-Shanwei "Port-Industry-City" initiative.

The Longli River Bridge in Longli county, Guizhou province, Constructed by Shenzhen Expressway, has been officially opened to traffic.

On 27 April 2024, the Longli River Bridge in Longli County, Guizhou Province, constructed by the Shenzhen Expressway, was officially opened to traffic. The Longli River Bridge is a crucial transportation project that connects the inland open economic development zone of Longxi in central Guizhou with the grassland area. It significantly reduces the spatial and temporal distance for the grassland area to communicate externally, effectively promoting economic exchanges between Longli County and Guiyang City, attracting more investments, and supporting industrial upgrading. Simultaneously, its completion will drive the vibrant development of the surrounding tourism and related industries, injecting new vitality into urban economic growth.



Projects under Construction



Jihe Expressway R&E project has officially commenced

As a vital east-west corridor in Shenzhen's expressway network and a "transportation artery" linking the Greater Bay Area and the Pearl River Delta core region, the Jihe Expressway faces urgent expansion needs due to rapidly growing traffic demands driven by Shenzhen's economic development.

This year, Jihe Expressway R&E Project, a major initiative of Guangdong Province and Shenzhen City, was officially launched. The project adopts a three-dimensional composite corridor model, constructing both a ground-level and an elevated layer, each designed as a dual eight-lane expressway with a total length of 41.4 kilometers and a speed limit of 100 km/h. Upon completion, the expressway will be upgraded from the current dual six-lane configuration to a dual-tiered "8+8" lane system, making it China's first three-dimensional composite expressway R&E project. The elevated layer will prioritise medium- to long-distance traffic, while the ground layer will serve short- to medium-distance traffic, significantly improving traffic organisation and capacity to meet the demands of the Greater Bay Area and Pearl River Delta integration.



Rendering demonstration of Jihe Expressway R&E Project



Steadily advancing the Outer Ring Phase III construction

The construction of the Outer Ring Phase III project is being steadily advanced. As a key expressway construction project in Guangdong Province, the Shenzhen Outer Ring Expressway serves as an arterial reinforcement line for Guangdong's "Twelve Vertical, Eight Horizontal, Two Ring" expressway backbone network and a critical component of Shenzhen's "Eight Horizontal, Thirteen Vertical" trunk road network. Upon full completion, it will interconnect with 10 expressways and 8 Class I highways in the Shenzhen area, significantly enhancing the overall layout of Guangdong's expressway network, optimising road system efficiency, accelerating the development of Shenzhen's "Dual Zone" (Greater Bay Area and Pilot Demonstration Zone), and alleviating east-west traffic pressure in the city.



Shenzhen Outer Ring Project

The Phase I and Phase II sections of the Shenzhen Outer Ring Expressway were completed and opened to traffic in December 2020 and January 2022 respectively. The Company is currently progressing orderly with the construction of Phase III. Within this year, multiple contract sections of the project have commenced full-scale construction, with critical projects such as the Tiantoushan Tunnel – the largest cross-section tunnel in China's expressway system – progressing systematically. The launch of this tunnel marks the project's entry into a pivotal stage.



Steadily advancing the Guangzhou-Shenzhen section of G4 R&E project

The Guangzhou-Shenzhen Section of G4 (Guangzhou-Shenzhen Expressway) is a critical artery connecting three major Chinese cities: Guangzhou, Dongguan and Shenzhen. It forms an essential part of both Beijing-Hong Kong-Macao Expressway and Shenyang-Haikou Expressway within China's national expressway network. Currently operating at near-saturation levels, expansion and upgrading of this section is urgently needed.



Guangzhou-Shenzhen Expressway

Listed as a priority project under China's 14th Five-Year Plan to accelerate the development of a transportation powerhouse, the project will significantly optimise traffic management frameworks, enhance traffic capacity, and provide robust infrastructure support for the Greater Bay Area and Pearl River Delta integration. During the reporting period, Shenzhen Expressway's subsidiary, Bay Area Development, continued to advance the project as planned.

01

Governance: Foundation for Stability, Governance Renewed

Excellent governance mechanisms are the key to ensuring the continued prosperity and healthy development of enterprises. Shenzhen Expressway practices excellent governance concepts and methods, injecting more sustainable vitality through optimizing governance structures and enhancing internal management efficiency.

Risk Analysis and Response

As a listed Company in both Shanghai Stock Exchange and the Hong Kong Stock Exchange Limited, Shenzhen Expressway faces higher regulatory requirements in corporate governance, operational management and ESG governance. Therefore, we continuously optimise corporate governance policies, strengthen compliance management system construction, deepen ESG accountability practices, effectively prevent potential risks from internal and external sources.

Aligning with the United Nations Sustainable Development Goals (SDGs)



Key Issues

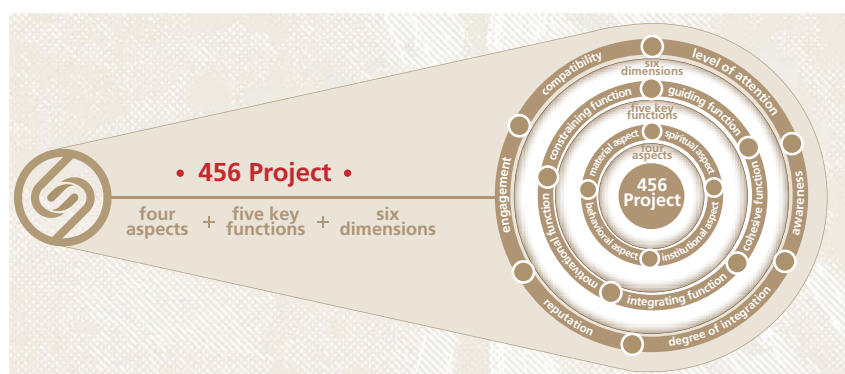
- Compliance
- ESG Governance
- Stakeholder Communication
- Integrity Discipline
- Risk Management
- Fair Competition
- Information Disclosure
- Return on Investment

Party Building Leads to New Practices

Shenzhen Expressway closely revolves around the enterprise center's work, comprehensively strengthening the Party's construction. The Company takes the "Five Highs and Five Speeds" characteristic party building as the focal point, providing classified guidance to various grassroots party organisations to promote the integration and mutual promotion of party building and business. Thereby leading the high-quality development of the dual core businesses of "toll expressway and general environmental protection".



The Company leads the construction of corporate culture with party building, implementing the "Party Building Leading and Culture Empowering 456 Project" to establish a corporate culture system that is in line with the strategic positioning of the Shenzhen Expressway. Within the framework of the "Party Building Leading and Culture Empowering 456 Project", we have created the short video brand "Extraordinary in the Ordinary", with typical cases selected for inclusion in the *Compilation of Excellent Achievements in Party Building in the New Era and Innovation in Corporate Culture* by the China Cultural Management Association.



Party Building Leading and Culture Empowering 456 Project



"Extraordinary Ordinary" Cultural Brand

The Company has implemented the leadership of the Party to every corner at the grassroots level. We prioritise "ensuring people's livelihoods and serving society" as the focus of grassroots party organisation work. We adhere to the principle of "where major livelihood projects are promoted, party organisations are established there", establishing grassroots party branches on the frontlines of major engineering and livelihood projects. We carry out a series of works such as "party building + safety", "party building + service", "party building + smooth traffic", "party building + integrity", promoting the integration and mutual promotion of party building and business, resonating on the same frequency.



Awarded as "Advanced Grassroots Party Organisation in Shenzhen City"

New Dimensions of Integrity and Ethical Governance

Shenzhen Expressway advocates the concept of “integrity, upright and honest, adhering to the bottom line, and taking responsibility,” to establish an integrity and compliance system covering the entire company. The Company clearly defines various codes of conduct and operational standards, nurtures and promotes a culture of integrity and compliance, shapes a common value pursuit of integrity and honesty.

Optimising Corporate Governance

The Company has established a comprehensive risk prevention and control system and working mechanism, constructing a closed-loop management system that coordinates compliance, risk control and supervision, enhancing ability to operate in accordance with the law and its level of compliance management, effectively preventing various risks.

Compliance Operation

The Company has formulated the *Three-Year Action Plan for Promoting Compliance Management with High Quality (2023-2025)*, clearly designating 2024 as the “Year of Deepening and Expanding Compliance Management”. This aims to further improve the compliance management system, with the *Code of Conduct* as the overarching guideline, compliance management measures as the basic system, compliance management special systems as the focal point, and compliance management key areas as the crucial focus, effectively preventing compliance risks.



Shenzhen Expressway conducts training on the Interpretation of the Company Law of The People's Republic of China

In order to strengthen the construction of the rule of law and enhance the ability to govern enterprises in accordance with the law, Shenzhen Expressway conducted a special training session on the newly revised the *Company Law of the People's Republic of China* on 22 May. The training focused on interpreting the new key points of the Company Law, helping employees in relevant positions of the Company to grasp the new trends in corporate management in a timely and accurate manner, and promoting the Company's sustainable and compliant operation.

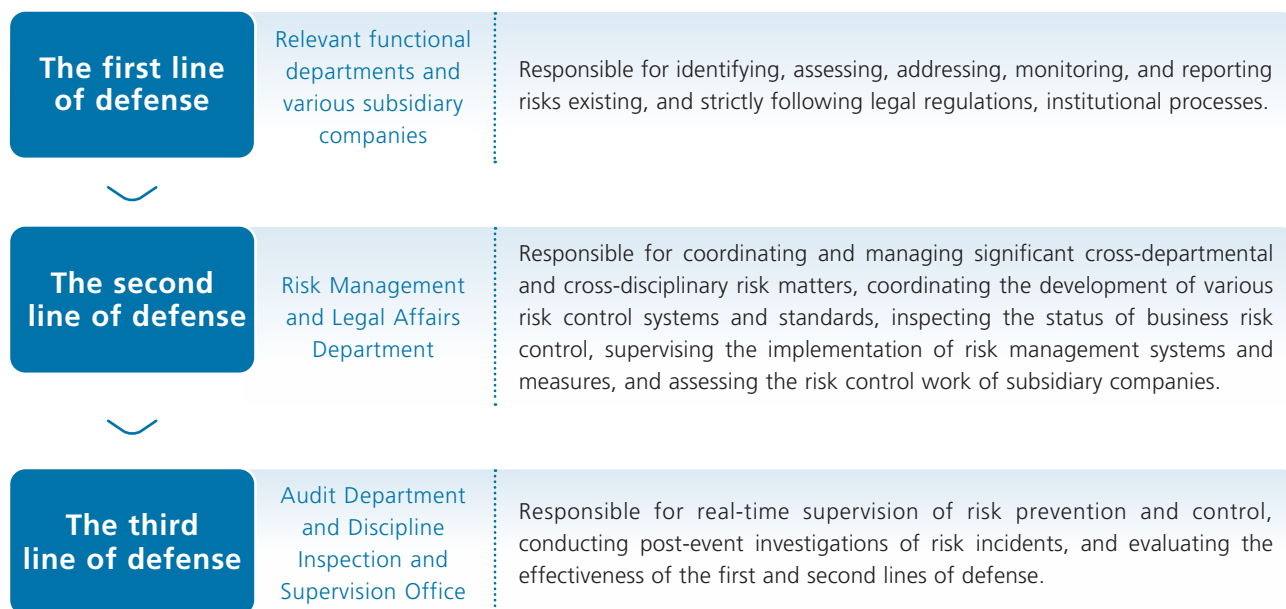


The Company is actively promoting the informatisation construction of compliance management, exploring the integration of compliance requirements into business processes and key phases using technologies such as big data and artificial intelligence, dynamically monitoring key compliance areas and key phases, issuing timely warnings, and quickly resolving potential risks.

Risk Management

The Company has established a comprehensive risk prevention and control system and working mechanism, formulated the “Risk Management Control Procedures,” and set up the *Three Lines of Defense for Risk Management*. By clarifying responsibilities, promoting cooperation, and building a multi-level and all-round risk prevention and control system, the Company identifies, analyses and evaluates risk issues in operational management.

Three Lines of Defense in Risk Management



Internal Control

The Company attaches great importance to the standardisation of internal management and has formulated an internal control manual in accordance with the requirements of the *Basic Norms for Enterprise Internal Control*. In the implementation process, we fully consider the five basic elements of internal control environment, risk assessment, control activities, information and communication, and supervision to achieve internal control objectives and enhance the effectiveness of the internal control system.

Building a Integrity Culture

The Company regards the construction of a integrity culture as a fundamental project, continuously enhancing the dissemination, influence, and penetration of integrity culture. We have set up an "Integrity Column" in the office system, regularly pushing out special columns such as "Legal Provisions," "Disciplinary News," "Warning Cases," and "Shenzhen Expressway Disciplinary Style" to effectively strengthen the awareness of integrity in employees. During the reporting period, we conducted 71 warning education activities, organised 133 screenings of warning educational videos, and printed and posted 25 integrity posters. The Company did not receive any reports of employee corruption litigation cases.

During the reporting period

conducted **71**
warning education
activities

organised **133**
screenings of warning
educational videos

printed and posted **25**
integrity posters



Shenzhen Expressway launches the “integrity power in Shenzhen” micro-film solicitation activity

In order to fully leverage the guiding role of an integrity culture and promote new achievements in its construction, Shenzhen Expressway organised the “Integrity Shenzhen Energy” micro-film and micro-video collection activity, creating and promoting a number of outstanding works on integrity culture, continuously fostering a good atmosphere of respecting integrity and promoting entrepreneurship.



The Company standardises the acceptance and handling process of issues and clues, rigorously investigates and expedites various types of issues and clues, deepens accountability and issue supervision, and continuously improves the level of standardisation, legalisation, and regularisation. We adhere to the *Management Measures for Disciplinary Inspection, Petition, and Reporting Work* to clarify the work process of report acceptance, ensuring that petitions, complaints and reported cases are accurately, promptly and fairly handled.



Disciplinary Inspection, Petition, and Reporting Work Processing Procedure

The Company strictly complies with relevant laws and regulations on protecting the information of whistleblowers, and has established clauses in the *Management Measures for Disciplinary Inspection, Petition, and Reporting Work* to protect the rights of whistleblowers. We keep the identity of whistleblowers, the content of their reports, and the subsequent investigation confidential. No organisation or individual is allowed to prevent or suppress whistleblowers from reporting under any pretext or means, nor are they allowed to retaliate against whistleblowers, investigators, witnesses, or their relatives.



All departments, organisations, and personnel must strictly keep confidential to any information related to the whistleblower, including but are not limited to their name, workplace and address.

The relevant materials for reporting must be submitted to the Company's discipline inspection commission and classified as confidential documents.



Do not privately excerpt, copy, withhold, or destroy reporting materials; it is strictly prohibited to transfer reporting materials to the reported organisation or individual.

Confidentiality should be taken to ensure that the identity of the whistleblower is protected without any exposure when accepting the reports from him or verifying the status of his reports.



The rewards and publicity for individuals who have made meritorious reports must not disclose the reporter's name, employer, etc., without written consent of the reporter.

Maintaining Fair Competition

The Company strictly complies with the *Anti-Monopoly Law of the People's Republic of China*, the *Anti-Unfair Competition Law of the People's Republic of China*, and other relevant laws and regulations. We clearly state the requirements for maintaining fair competition in the *Compliance Management Manual*, closely monitor changes in anti-monopoly policies at home and abroad, and maintains a fair market competition environment.

Key Measures for Maintaining Fair Competition

- Maintain the fairness of the market order, do not violate laws and regulations or commercial ethics, refrain from engaging in false advertising, damaging the reputation of others, commercial bribery, or infringing on commercial secrets in order to gain a competitive advantage.
- Comply with anti-monopoly laws and regulations. Do not engage in agreements that hinder competition, nor abuse market dominance to restrict or exclude fair competition.
- Adhere to the bidding and procurement processes. Do not exclude or discriminate against bidders or impose unreasonable conditions, do not engage in false or evasive bidding, do not manipulate or interfere, and do not seek commercial benefits through illegal means such as bid rigging or bid collusion.
- Strengthen contract management. Standardise the contract business process, strictly prohibit irregular behaviors and prohibit subcontracting, illegal subcontracting, or signing false contracts on the Shenzhen Expressway.

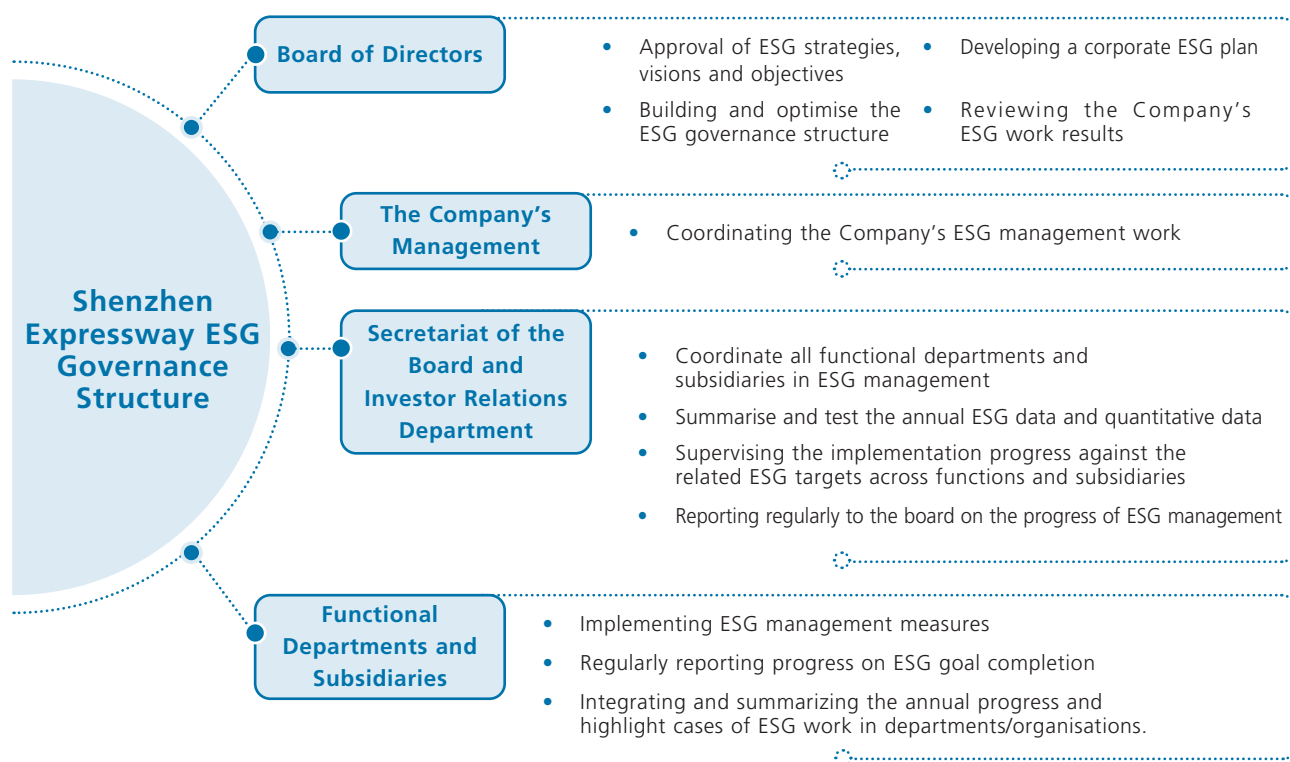
The Company treats small and medium-sized enterprises fairly, strictly complies with the provisions of the *Law of the People's Republic of China on the Promotion of Small and Medium-sized Enterprises*, eliminating unreasonable thresholds and restrictions in the procurement process. We do not apply discriminatory treatment, ensuring their fair participation in market competition.

A New Journey of Institutionally Accountable Governance

Fulfilling social responsibility is a strategic choice for achieving the long-term success of the Company. Shenzhen Expressway continues to integrate ESG principles into its development strategy, establishing a sound ESG governance system and working mechanisms. This ensures that the entire process of corporate decision-making, management and operations, as well as the entire industry chain is integrated. We actively respond to the reasonable demands of various stakeholders.

ESG Governance Structure of Shenzhen Expressway




The Board of Directors is the highest responsible body and decision-maker for ESG matters of Shenzhen Expressway. It is mainly responsible for overall deliberation and approval of ESG strategies, visions and objectives, review and evaluation of risks and importance related to ESG matters, and review and approve public disclosures related to ESG matters. The Secretariat of the Board & Investor Relations Department, under the administration of the Board of Directors, is mainly responsible for following up all functional departments and subsidiaries to carry out ESG-related work, supervising the Company's ESG performance and related target progress, and reporting the Company's ESG matters to the Company's management and the Board of Directors.







Stakeholder Communication

Shenzhen Expressway attaches great importance to communication with stakeholders including governments, shareholders, employees, customers, suppliers and communities. Diversified communication channels and feedback mechanisms are established in line with their characteristics, to disclose the Company's sustainable development tendency in a timely manner and to ensure that the demands of stakeholders are accurately identified, fully understood and responded in a targeted way.

Communication with Stakeholders of Shenzhen Expressway

Stakeholders category	Major issues	Demands and expectations	Responses
 Government and regulatory agency	<ul style="list-style-type: none"> Compliance Information disclosure Integrity discipline Fair competition ESG governance Responding to climate change Pollution prevention and control Ecosystem protection Circular economy Rural revitalisation 	<ul style="list-style-type: none"> Comply with laws and regulations Implement national policies and promote social and economic development Support regional development 	<ul style="list-style-type: none"> Reporting on production and operation status, progress of significant matters and implementation of policies Continuously strengthen the corporate compliance management and ensure legal and compliant operation, enhance the transparency of information disclosure. Formulate and continue to optimise the Company's strategic positioning, industrial orientation and business measures, ensure conformance to the orientation of national policies, balance economic and social benefits in development and promote social and economic development The Company should consider both economic and social benefits in their development to promote social and economic development Carry out targeted poverty alleviation and support regional development by means of industrial investment, personnel assignment and public welfare investment
 Shareholder	<ul style="list-style-type: none"> Investment return Risk management Information disclosure Stakeholder communication 	<ul style="list-style-type: none"> Robust income and dividends Reduce investment risk Open and transparent information 	<ul style="list-style-type: none"> Do well in business operation, improve business performance and maintain a stable dividend policy Improve enterprise management and attach importance to risk identification and control Conduct information disclosure in a compliance manner and attach importance to investor relations
 Suppliers	<ul style="list-style-type: none"> Supply chain management Fulfilment of commitments 	<ul style="list-style-type: none"> Carry out cooperation for mutual benefit and win-win results Fulfil contracts Promote industry development 	<ul style="list-style-type: none"> Implement fair procurement and build a responsible supply chain Keep promises and fulfil commitments Encourage suppliers to use new technologies, new materials and new processes, optimise their management mode and jointly promote industry development

Stakeholders category	Major issues	Demands and expectations	Responses
 <p>Customers</p>	<ul style="list-style-type: none"> • Quality services • Safe travel • Well-established facilities • Data security and privacy protection • Innovation-driven 	<ul style="list-style-type: none"> • High quality services • Ensure safe and smooth traffic flow • Ensure timely rescue and obstacle removal • Comprehensive and timely road information • Well-established road facilities 	<ul style="list-style-type: none"> • Render feedback on services and open the complaint channels to public • Improve traffic efficiency with new technologies and innovative modes • Improve traffic efficiency with new technologies and innovative modes • Timely release traffic information • Strengthen road maintenance
 <p>Employees</p>	<ul style="list-style-type: none"> • Occupational health and safety • Equal employment • Career development 	<ul style="list-style-type: none"> • Salary and benefits • Development opportunities • Training system 	<ul style="list-style-type: none"> • Continuously improve the salary performance system and carry out employee satisfaction survey • Optimise the position system and assessment and promotion mechanism and put into place systems for competitive recruitment of management positions and new employee guides • Attach importance to career development training, expand online and offline training courses, put into place incentive mechanism for those getting academic education and technical titles, etc.
 <p>Communities</p>	<ul style="list-style-type: none"> • Pollution prevention and control • Ecosystem protection • Rural revitalisation • Social contribution 	<ul style="list-style-type: none"> • Expressway environmental impact • Business ethics • Participate in community development • Support public charity 	<ul style="list-style-type: none"> • Do well in project environmental assessment, planning and design • Value coordinated development with surrounding communities, make public the complaint channels and timely and properly handle reasonable appeals • Carry out targeted poverty alleviation and support regional development • Carry out public welfare activities
 <p>NGOs/non-government environmental protection groups</p>	<ul style="list-style-type: none"> • Responding to climate change • Ecosystem protection • Low-carbon operation 	<ul style="list-style-type: none"> • Make rational use of resources • Protect the ecological environment 	<ul style="list-style-type: none"> • Improve the efficiency of energy and resource utilisation • Implement green operation and office • Strengthen the disclosure of environmental information

Assessment of Material Issues

We identified 26 potential materiality issues combined with the regulatory disclosure requirements and the focuses of stakeholders and benchmarked them with the outstanding enterprises in the industry. External experts in sustainable development were invited to provide professional advices on the ranking of materiality issues, to ensure that the existing issues are highly related to the business operation of Shenzhen Expressway and the development of the industry. The final review of major issues and ranking by the Company's management that the identified materiality issues are feasible and effective. Based on the analysed results of materiality issues, the major issues are fully elaborated in this Report and will be carefully considered when formulating internal development strategies and management policies.

Materiality Matrix of Shenzhen Expressway

Impact Significance	Very Important	<ul style="list-style-type: none"> Facility Perfection Rural Revitalisation Social Contribution Integrity and Discipline 	<ul style="list-style-type: none"> ESG Governance Safe Travel Occupational Health and Safety Stakeholder Communication 	<ul style="list-style-type: none"> Compliance with Laws and Regulations Good-faith Contract Performance Information Disclosure High-quality Service
		<ul style="list-style-type: none"> Equal Employment Career Development Low-carbon Operation 	<ul style="list-style-type: none"> Pollution Prevention and Control Ecosystem Protection Data Security and Privacy Protection 	<ul style="list-style-type: none"> Circular Economy Resource and Energy Utilisation Climate Change Mitigation
	Important	<ul style="list-style-type: none"> Fair Competition 	<ul style="list-style-type: none"> Supply Chain Management Innovation-driven 	<ul style="list-style-type: none"> Risk Management Return on Investment
		Financial Significance		
		Important	Very Important	

02

Service: Seamless Mobility, Service Excellence

Shenzhen Expressway has always adhered to the mission of “building high-quality infrastructure and serving a better life in the city”, meticulously crafting engineering quality, carefully guarding operational safety, and making every effort to create high-quality services, allowing passengers to enjoy a relaxed, pleasant and convenient journey.

Risk Analysis and Response

The public’s demand for high-speed travel continues to grow, with expectations for maintenance standards, traffic efficiency and road safety constantly rising. Therefore, Shenzhen Expressway adheres to high-quality construction, implements refined maintenance, and continuously optimises service experiences to enhance the safety and comfort of road travel.

Aligning with the United Nations Sustainable Development Goals (SDGs)



Key Issues

- High Quality Services
- Facilities Improvement
- Data Security and Privacy Protection
- Safe Travel
- Innovation-driven

Constructing High-quality Projects

Shenzhen Expressway controls the quality of construction projects, adheres to high-level construction and refined management simultaneously, establishes a sound engineering quality management system, promotes the application of innovative technologies, strengthens road maintenance, and strives to create high-quality projects, model projects and safe projects.

Engineering Quality Management

The Company continuously improves its quality control system covering the entire process from project planning, engineering design, project tendering, material monitoring, construction, operation and maintenance in accordance with the requirements of the *Road Law of the People's Republic of China*, *Regulations on Quality Management of Construction Projects* and *Management Measures for Highway Maintenance Projects*.

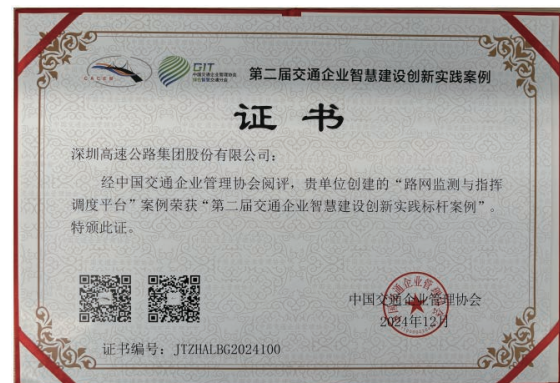


During the reporting period, the Company's projects have maintained stable quality in terms of management operations, raw material quality, construction site environment, and the physical condition of the projects.

Innovative Technology Application

The Company adheres to scientific and ethical norms, actively promoting the integration and implementation of innovative technologies in the construction and operation of traditional expressways, advocating the use of innovative technologies to bring positive impacts. We utilise the technological innovation system and informatisation as carriers, widely applying intelligent engineering technologies in major projects to empower the high-quality development of expressway. During the reporting period, the Company's "Road Network Monitoring and Command Dispatch Platform" case won the "Second Smart Construction Innovation Practice Benchmark Case Award for Transportation Enterprises", two submissions from the Jihe Expressway Reconstruction and Expansion Project won the Gold Award and the Excellence Award respectively, while one submission from the Third Phase of the Outer Ring Phase III project secured the Silver Award at the 7th "Youlu Cup" National BIM Technology Competition hosted by the Talent Exchange Center of the Ministry of Industry and Information Technology.

We protect our independent intellectual property rights and ensure non-infringement of others' intellectual property rights. We have formulated the *Company Knowledge Management Control Procedure* to carry out the protection of Company intellectual property rights and patent management, effectively preventing infringement and infringing behaviors.





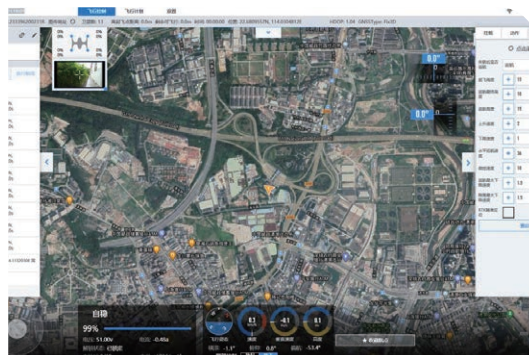
Shenzhen Expressway implements BIM modelling to enhance the refined management of expressway operations

Shenzhen Expressway has carried out research on BIM modeling and digital management for five stretches of road in the Shenzhen area, creating BIM models for the entire road line, road surface, bridges, tunnels, traffic engineering, along with facilities, and safety facilities. By integrating BIM technology with various types of spatiotemporal data and planning information, it is possible to achieve dynamic urban operation data monitoring, intelligent scheduling, predictive analysis, and enhance the efficiency of urban service and safety management.



Shenzhen Expressway Utilises a drone-based road inspection system to carry out intelligent inspections

The traditional manual inspection methods are easily affected by ground traffic conditions and on-site environments. By using drones to conduct regular inspections of key locations and structures such as high slopes, bridges, spaces under bridges and roadside control areas, the effectiveness of control can be enhanced. Shenzhen Expressway has leveraged its existing drone application platform to achieve intelligent inspections of road key structures, key control areas, road traffic conditions, road safety facilities and nighttime construction safety scenarios, further strengthening its monitoring and management capabilities.



Shenzhen Expressway deploys a road construction collision warning system to enhance the safety of driving on construction sections

In construction sections, Shenzhen Expressway deploys a road construction collision warning system. Through radar monitoring, vehicles that mistakenly enter the construction area are detected, and construction personnel are alerted via wristbands. This not only enhances the safety of road construction workers but also ensures the safety of vehicles passing through the construction section.



Guarding Operational Safety

Shenzhen Expressway continues to implement the safety culture concept of “ensure safe production, embrace joyful life”, meticulously carries out hidden danger inspections, deepens the construction of a dual prevention mechanism, strengthens the implementation of safety production responsibilities, and continuously improves the level of safety standardisation management.

Establishing a Safety Management System

The Company strictly complies with the requirements of the *Safety Production Law of the People's Republic of China* and other laws and regulations. Following the “1+N+5” framework for safety production management system, the Company has comprehensively revised and improved a series of safety management systems including the *Safety Production Responsibility Management System*, *Fire Safety Management System*, and *Safety Production Risk Deposit System*. The Company has established a Safety Production Management Committee, with offices such as the Safety Production Management Committee Office and the Safety Supervision Department. Each subsidiary company has set up a safety management department with dedicated full-time and part-time staff to ensure the orderly conduct and efficient supervision of daily safety management work.

“1+N+5” framework for work safety management



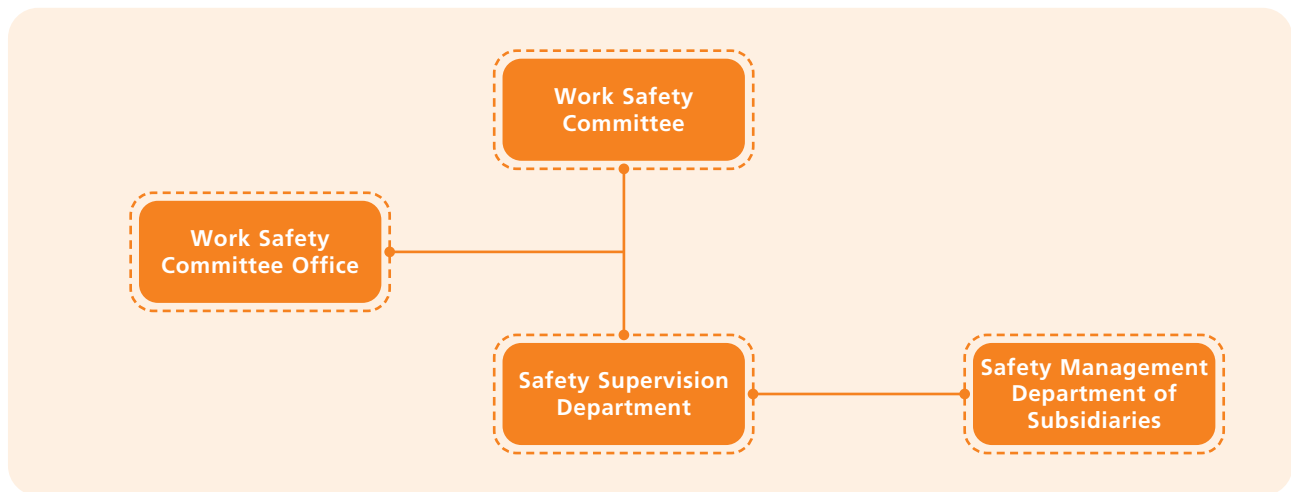
1
overall work safety
procedure



N
supporting work
safety management
systems



5
work safety guidance
manuals for major
business sectors



Work Safety Management Structure

The Company has set “zero casualties” as goal and formulated the *Shenzhen Expressway Safety Production Fundamental Attack Three-Year Action Plan (2024-2026)*, implementing the “12345” safety production management strategy. We focuses on the main line of implementing the “safety production responsibility”, clarify the two management priorities of “accident prevention” and “legitimate and compliant construction”, and implement the “double prevention mechanism construction, multi-level control system, safety production standardisation” through three key paths. We also carry out a four-step closed-loop management of “regular evaluation, leak detection and correction, system optimisation, and inertia operation” to effectively address five major risks.

Improve the Safety Work Mechanism

Safety Risk Classification Management and Hidden Danger Investigation and Control

The Company is advancing in the identification and control of safety risks by establishing lists of key points, key positions, key equipment and key operations. Following the principle of “each risk has a responsible person, different levels of risks are managed at different levels,” responsibilities for risk control are divided based on the level of risk, achieving comprehensive and multi-level safety risk management.

The Company has comprehensively carried out hidden danger investigation and rectification work, focusing on geological hazard risks, conducting detailed inspections on potential risks such as landslides and collapses; paying attention to road traffic safety to ensure smooth and safe driving; attaching importance to construction safety to ensure accident-free construction; being mindful of environmental safety to protect the surrounding ecology; strengthening fire safety to prevent fire hazards, and implementing daily control measures for the five major risks, resolutely upholding the “zero liability” bottom line.



Safety Special Inspection for Hazardous and Major Projects

Standardisation of Safety Production

The Company has established a scientific, systematic, and standardised safety production management system, striving to build a long-term mechanism for safety production and vigorously promote the standardisation construction of safety production in various business sectors. During the reporting period, the Company's first-level safety production standardisation system operated effectively.

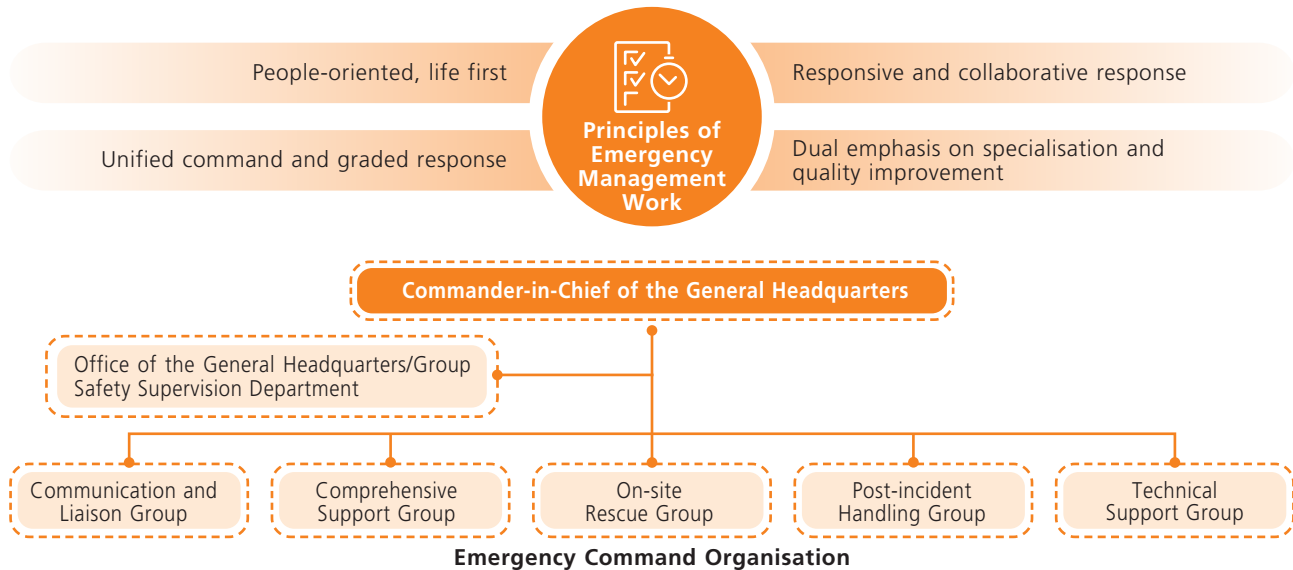
We implement the *Safety Meeting Management System*, stipulating that the Party Committee shall review and discuss work related to production safety at least once every six months, while the Board of Directors shall conduct such reviews and discussions quarterly. This institutional arrangement aims to better implement and enforce relevant safety production laws, regulations and requirements from higher-level authorities, while also facilitating timely communication and systematic summarisation of various production safety-related tasks.



Achievement of Level 1 Standardisation in Work Safety Standardisation Construction

🌿 Emergency Response for Sudden Incidents

The Company is establishing a comprehensive and effective emergency management system, developing the *Shenzhen Expressway Emergency Response Plan for Sudden Incidents* as well as specific plans for production safety accidents, traffic accidents, natural disasters, and public health incidents. These plans aim to provide emergency response guidance for sudden incidents in the areas of expressway operation and maintenance, engineering construction, organic waste treatment, clean energy generation, elderly and child care, property management, and other business fields.



The Company has established an emergency organisational command system composed of the overall commander of the emergency command headquarters, the office of the command headquarters, and various functional teams. According to the types of emergencies, on-site emergency rescue teams are formed to carry out on-site emergency rescue work. We have taken various measures to effectively enhance monitoring, early warning, and emergency response capabilities, conducting special inspections of emergency materials; implementing leadership shifts and a 24-hour duty system; organising emergency evacuations, road traffic accident handling, slope collapse, and various emergency drills to enhance the ability to respond to urgent emergencies.

Expressway operation sector:

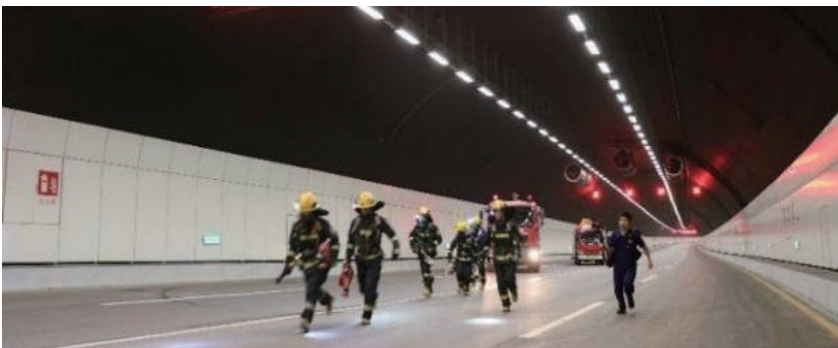
Slope collapse, fire escape drill, gas leak, emergency response drill for road collapse accidents, emergency drills for sudden situations, etc.

Building construction sector:

Desktop simulation of project site office fire incident, emergency rescue drill for flood and typhoon prevention, comprehensive emergency drill for high-altitude fall accidents.

Environmental protection industry sector:

Fire evacuation emergency drill, summer heatstroke emergency drill, electric shock accident emergency response, etc.



Tunnel Emergency Evacuation Drill



Emergency Evacuation Drill from High Altitude

Enjoying a Pleasant Journey

Shenzhen Expressway upholds the service concept of providing safe, fast, and high-quality services to the majority of drivers and passengers. With the “36710” quality service brand system as the carrier, the Company continuously enriches the service content, innovates service models and helps to achieve the beautiful vision of people enjoying their journey.

Improving Service Quality

The Company aims to “set industry benchmarks” and takes serving the passengers, creating comfortable driving environment and spreading city civilisation as responsibility. Through multi-dimensional service enhancement activities, we strive to make travel more enjoyable. We have established the “36710” brand, which includes “three requirements before taking up the post, six steps of toll service, seven uniform dress codes and ten must-have civilised customer service practices”, to provide passengers with a safe and comfortable passage environment, as well as efficient transportation services. During the reporting period, we conducted a 12-day “36710” civilised service centralised training and roadshow event, further enhancing the level of quality service and the image of window service.

Qinglong Company insists on creating a corporate image of “smiling service”, conducting a series of training on toll collection business, special smiling service, etc., enabling employees to master business operation skills and standard service norms; by carrying out activities such as “toll collection series assessment” and “star-rated service toll collector selection”, we strengthens employees’ service awareness, motivates employees to provide quick and comfortable toll services to passengers with a full face, sincere smile, and skilled operation.

Shenchang Company promotes the scientific, standardised, and refined management of toll stations through station-level training, company-level training, and business examinations. This continuous effort aims to enhance the overall quality of operational management, strengthen toll management standards, improve the business literacy of toll staff, solidify foundational work, reduce business errors, and enhance the image of civilised service.



Civilised Service Training



Set Up Service Points to Provide Convenience Services



Deploy Rescue Personnel to Ensure the Smooth Operation of the Expressway

清连高速2024年“五一”劳动节假期出行指引

清连高速 2024年04月30日 12:30 广东

点击蓝字 关注我们

今年的第二个小长假——“五一”劳动节小长假就要来了，不知道大家是否已经做好规划，好好利用假期，尽兴游玩呢？

Publish Travel Guidelines to Improve Traffic Efficiency



Weather Information to Assist Safe Travel



Qinglian Expressway has enhanced service area management to improve passenger satisfaction

Qinglian Company has improved the facilities at service areas, such as the mother and baby room, third restroom, accessible pathways, convenience store, free WIFI, charging stations, massage chairs, etc. We conducted a comprehensive inspection of the current status of restrooms, water dispensers, leisure seating, faucets, etc., to ensure that travelers can truly have their issues resolved during daily and holiday peak periods, such as difficulties in getting hot water, using the restroom, or finding a place to rest.



Convenience Store Inspection



Faucet Inspection



Catering Inspection



Charging Pile Inspection

Protecting the Rights and Interests of Passengers and Drivers

The Company values listening to customer feedback, and has established the 24/7 hotline for consultations. At the same time, we gather information on the needs of both drivers and passengers through on-site visits, websites, media and feedback channels. We keep communication channels open for inquiries and complaints, conduct thorough investigations into incidents, and carry out post-event statistical analysis, improvement and enhancement tracking, as well as customer feedback follow-ups. We regularly conduct surveys and phone calls with drivers and passengers to evaluate customer satisfaction data in terms of impression, quality and service. The Customer Satisfaction Index in 2024 is 88.6.



The Customer Satisfaction Index in 2024 is **88.6**

The Company has implemented multiple security measures to safeguard customer information confidentiality, including the establishment of information security management systems such as the *Information System Network and Data Security Management Procedures* and the *Network and Data Security Incident Emergency Response Plan*. The Company also utilises IPS intrusion prevention systems, organises regular inspections by third-party units, and implements technical preventive measures. Annually, the Company reviews the role permissions status of the entire group's OA system, with original transaction records and video materials stored on the intranet with restricted query and access permissions. Strict controls are in place for managing queries and operations related to customer information data.

Smooth Traffic Environment

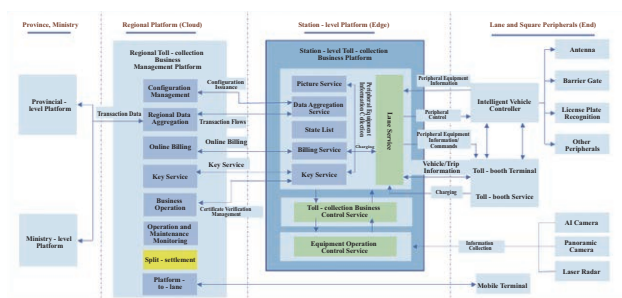
Congestion Management

Develop a tailored congestion management plan:

The Company implements the *One Station, One Strategy Congestion Management Plan for Toll Stations on Directly Managed Road Sections*, the *Peak Traffic Flow Prediction Management Measures*, the *Toll Plaza Traffic Peak Response Management Measures*, and the *Peak Traffic Flow Rapid Evacuation Control Measures*. This involves conducting in-depth analysis of the traffic structure, distribution, peak characteristics, and commuting habits at each toll station; dynamically adjusting congestion management measures including tidal lanes, lane layout, lane types, emergency response and other aspects.



Develop smart toll stations: The Company integrates front-end devices for standardisation and IP connectivity, while back-end systems are streamlined and online to enhance monitoring of toll station operations and improve lane traffic efficiency. The application of self-developed fast card issuance system at entry points enables issuing over 350 cards per hour per lane; the establishment of plaza prepayment systems and gantry pre-transaction systems empowers exit lane processing efficiency; the promotion of the "Shenzhen e-traffic tolling model" addresses the issue of non-ETC vehicles passing through quickly; and the commitment to exploring the "port-road coordination model" aims to establish truck exemption and dedicated lanes to address the inefficiency of truck traffic.



The Integrated Collaborative Architecture of "Cloud, Edge and Endpoint"



Entrance Fast Card Issuing System



Shenzhen E-Traffic Advance Payment



Plaza Prepayment System and Gantry Pre-Transaction System

Establish the "Five Fast and Six Coordinated" working mechanism: Build a joint response mechanism involving traffic police, road administration, maintenance, rescue, service areas and toll stations. Prior to major holidays, activate the six-party coordinated mechanism, convene coordination and mobilisation meetings, strictly maintain duty schedules, and ensure that all road administration staff are on standby during critical periods. Based on the characteristics of peak traffic flow, pre-allocate on-site personnel and rescue equipment and machinery.



Staffed with
professional rescue
personnel

136



Set up regular
rescue sites

21



Equipped with
various trailers and
equipment

67



Offered rescue
services times

30,401



Average time to
reach rescue site
were

15 minutes

Multi-dimensional information interaction transmission: Fully utilise the customer service center to build multi-dimensional communication, achieve seamless connection of information between road management, traffic police, customer service center, rescue teams and adjacent road units, and share road police resources. This highlights the important role of proactive intervention in traffic control, risk prevention and control, and rapid handling of accidents.

Road Environment Improvement

The Company, guided by the principles of “emphasising key areas, comprehensive rectification, focusing on effectiveness and long-term management,” has established a road environment improvement working group and formulated a special work plan.

- 1 The road surface is smooth and clean, providing a comfortable and safe driving experience.
- 2 The green landscape is beautiful, and the ecological environment is good.
- 3 The facilities are well-equipped and in good condition, with comprehensive service functions.
- 4 The road environment is clean, and the overall image is enhanced.

Road conditions:	»	Inspect the smoothness and cleanliness of the road surface, as well as the presence of large-scale damage, peeling, looseness, etc., in order to determine the priority and plan for road repairs.
Roadbed and slopes:	»	Inspect the stability of the roadbed, reinforce or repair any problematic roadbeds; check the stability of slopes, the integrity of protective facilities, and evaluate the vegetation coverage, and carry out greening replanting or maintenance based on actual conditions.
Drainage facilities:	»	Check the clearness of the side ditches and drainage ditches, regularly clean up debris and sediment in the ditches; inspect the culverts and bridge drainage systems to ensure operating properly to prevent water seepage from damaging the structures.
Traffic safety facilities:	»	Check if the traffic signs are clear, positioned appropriately, and contain accurate information; inspect the guardrails and barriers to ensure they are intact and meet the standard height and strength requirements, repair or replace any damaged guardrails and barriers.
Greening landscape:	»	Inspect the vegetation on both sides of the road and the central reservation of the Expressway to ensure healthy growth. Regular maintenance such as pruning, watering, fertilizing, and pest control should be carried out. Replant missing greenery to enhance the coverage and visual appeal of the landscape. Regularly clean up litter and debris within the landscape nodes to maintain cleanliness and aesthetics.



Clean The Road Surface and Side Walls of The Tunnel



Roadside Tree Pruning



Pavement Preventive Maintenance



03

Environment: Green Commitments, Sustainable Growth

Shenzhen Expressway upholds the concept of green development, strictly follows the national environmental protection policy, strengthens environmental management, and promotes ecological civilisation through the use of advanced technologies. We actively respond to climate challenges, focus on improving the quality and efficiency of the environmental protection industry, accelerate green transformation and work together to create a beautiful future of harmonious coexistence between humanbeings and nature.

Risk Analysis and Response

In terms of environmental protection, the construction and operation of expressways involve land use, biodiversity, noise and other aspects, while clean energy generation and solid waste resource utilisation involve multiple factors such as water resources, air quality, biodiversity, noise and cultural aspects. If not properly controlled, it may lead to environmental issues and social impacts. Therefore, Shenzhen Expressway has established an environmental management system covering all business processes of the Company, taking into full consideration environmental factors in route selection design, material procurement, construction, and operational activities.

In terms of climate change, frequent extreme weather events and natural disasters pose threats to the safety and sustainability of transportation infrastructure and large projects. Therefore, Shenzhen Expressway has established a comprehensive climate event emergency plan to ensure the safety of expressway operations, while also promoting environmental protection investments, continuing efforts in clean energy and enhancing adaptive capacity in addressing climate change.

Aligning with the United Nations Sustainable Development Goals (SDGs)



Key Issues

- Circular Economy
- Resource and Energy Utilisation
- Low-carbon Operation
- Pollution Prevention and Control
- Ecosystem Protection
- Responding to Climate Change

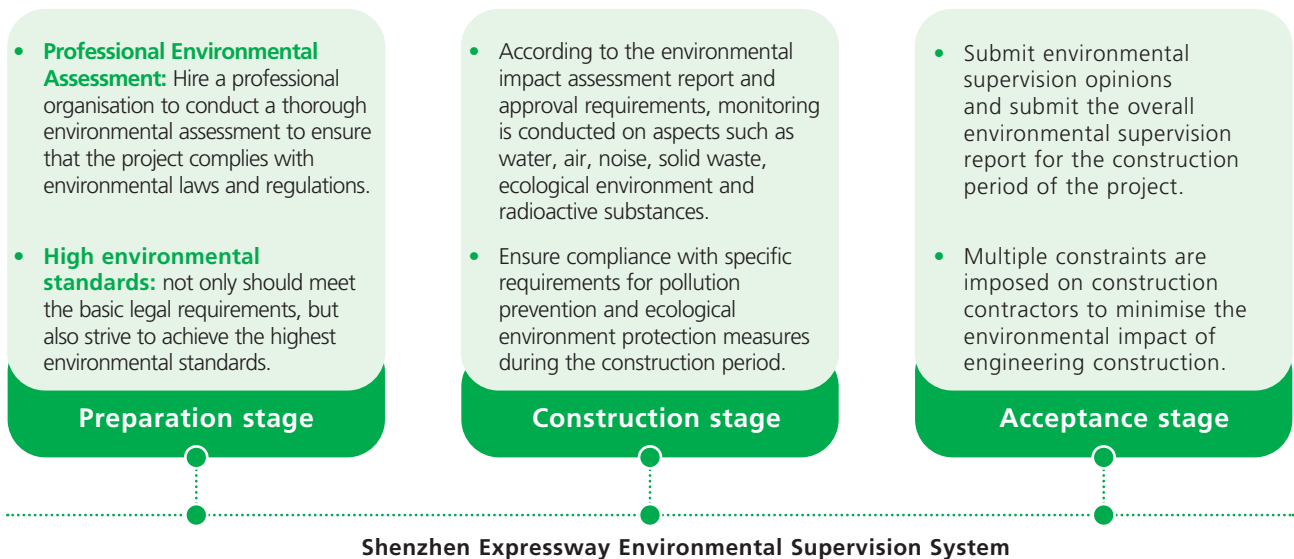
Enhancing Environmental Management

Shenzhen Expressway actively responds to the national “dual carbon” strategic goals and the call for the construction of “zero-waste cities,” attaching great importance to the efficient utilisation of resources and energy, as well as the comprehensive protection of the ecological environment. The Company is accelerating the establishment of an ecological civilisation system, continuously improving standardised environmental management, and supporting a sustainable development path that prioritises ecology, efficiency, intensity and green low-carbon initiatives.

Environmental Management System

The Company strictly complies with relevant laws and regulations such as the *Environmental Protection Law of the People's Republic of China* and the *Regulations on Ecological and Environmental Protection in the Shenzhen Special Economic Zone*, formulates the *Ecological Environment Protection Management*, establishes an environmental management system covering project construction, road operation, and environmental protection industry sectors, and implements environmental protection requirements to a high standard.

The Company has established an Ecological Civilisation Construction Leadership Team with the President as the team leader, designating the Office of the Chief Engineer as the main department responsible for ecological civilisation construction. Other departments are required to practice the concept of ecological environmental protection in their daily work, while each subsidiary company is responsible for implementing specific tasks related to ecological environmental protection within their respective units. We have set up an environmental supervision mechanism to effectively monitor the entire process of construction projects that impact the environment, from planning and design to construction and operation, supervise the construction and operation of environmental protection facilities, and ensure that ecological protection measures meet the required standards.



Environmental Requirements for Contractors in the Construction Sector

Cooperation Construction Phase

Environmental protection materials and equipment requirements: Use environmentally friendly materials that are conducive to environmental protection, material conservation, water conservation, energy conservation, and land conservation for green construction on the Shenzhen Expressway.

Environmental protection requirements during the construction phase include establishing environmental protection regulations for the construction period, effectively controlling dust pollution and managing water source protection areas. Environmental protection measures should be implemented for temporary roads, temporary facilities, roadbed construction, and bridge construction on the Shenzhen Expressway construction site.

Project Completion Phase

After the project is completed, the contractor is required to fully restore the temporary construction sites such as construction access roads, construction bases, material yards, mixing yards, and construction sites occupied during the construction period according to the principle of “destroying one place, restoring one place”.

This year, the Company has incorporated the work goals, plans and contents of ecological civilisation construction into the assessment system of various related departments and subsidiary companies. Based on the assessment results, corresponding commendations and criticisms are given to continuously motivate the continuous optimisation and improvement of ecological civilisation construction work.

Risk Prevention and Response

The Company adheres to the principle of giving priority to prevention and combining prevention with emergency response in carrying out emergency management of environmental emergencies. The Company actively identifies environmental impact factors, conducts risk assessments, and addresses hidden dangers to prevent potential environmental pollution incidents from the source. We have formulated the Emergency Response Plan for Sudden Environmental Incidents and improved the plan through emergency drills to enhance our emergency response capabilities for potential environmental risks.

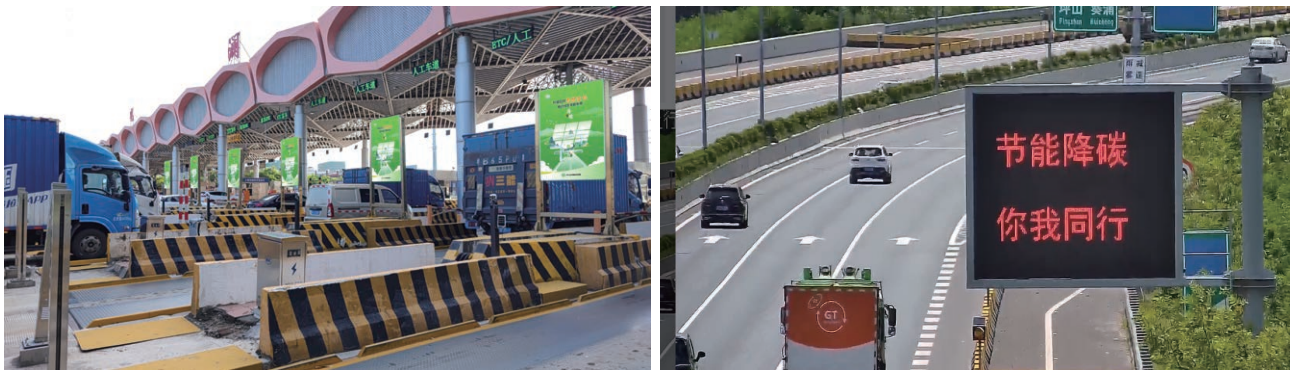
Emergency drill for anaerobic tank slurry leakage implemented by Guiyang Bioland

Guiyang Bioland focuses on the recycling of kitchen waste resources. Leakage of biogas slurry produced after anaerobic fermentation and solid-liquid separation of kitchen waste can lead to serious environmental pollution. In order to master the correct handling methods for sudden environmental incidents, Guiyang Bioland simulated a scenario of biogas slurry leakage at the bottom of the anaerobic tank, and tested its rapid response capability in dealing with environmental pollution incidents.



Environmental Awareness Promotion

The Company actively participates in environmental protection public welfare activities, calling on all sectors of society to jointly safeguard the blue sky and green waters. We utilise road information boards to display ecological civilisation slogans; use official Weibo accounts of “Shenzhen Expressway Customer Service Center” to disseminate environmental protection public welfare propaganda; and utilise on-site signs at toll stations, parking areas, service areas, electronic scrolling screens, and other media to promote ecological civilisation ideology to the general public and passengers, advocating ecological civilisation concepts and awareness of green and low-carbon lifestyles.



Ecological and Environmental Protection Promotion



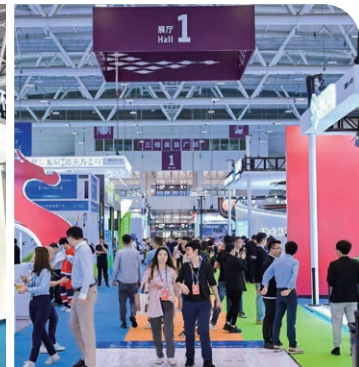
Shenzhen Expressway held a themed event “environmental protection little vanguard, low-carbon children’s day”

Before Children’s Day, Environmental Company, Operation Development Company and Guangming Environment jointly held the “Environmental Protection Little Vanguard, Low Carbon Children’s Day” themed event. The event aimed to promote a low-carbon lifestyle through activities such as a visit to a science education base, creating an environmental protection commitment piece, a Children’s Day gift, a blessing card, and holding a game that children enjoyed. This initiative aimed to awake the environmental awareness in the hearts of the children.



Environmental Company participated in the 2024 Shenzhen (international) urban environment expo

In April 2024, Environmental Company was invited to participate in the 2024 Shenzhen (International) Urban Environment Expo. Through the three major exhibition areas of “Development with the Times,” “Setting Industry Benchmarks,” and “City of Tomorrow,” the Company fully showcased the development history, core technologies and advantages, intelligent operation systems, and several benchmark projects of the Shenzhen Expressway environmental sector to the audience, attracting numerous visitors who stopped by and praised the exhibits.



Guangxi Bioland participated in the environmental day event to showcase ecological management technologies

On 5 June 2024, Guangxi Bioland participated in the main venue event of the “Comprehensive Promotion of Beautiful China Construction” on the World Environment Day in Nanning. They introduced the Company’s environmental governance technologies and related achievements to the visiting citizens, students, and representatives from enterprises. They also emphasised the importance of waste classification, contributed to enhancing the ecological awareness of the whole society in an active way.



Building Ecological Civilisation

Shenzhen Expressway has always adhered to the development concept of cleanliness and low carbon, advocating clean production and practicing green office initiatives. The Company effectively integrates the concept of ecological civilisation into various production activities of engineering construction, operation, and maintenance, promoting the Company's development towards a more environmentally friendly and efficient direction.

Ecological Route Selection

During the initial planning phase of road construction, the Company conducts surveys and analyses of the terrain, soil types, vegetation distribution, animal habitats and water sources within the construction area. This is to identify ecologically sensitive areas and prioritise routes that have minimal impact on the terrain, avoiding extensive excavation of mountains and diversion of river channels. The aim is to maintain the stability of the original ecosystem.

During the design phase, the Company designs wildlife passages such as viaducts and culverts based on the types of local wildlife, migration routes, and life patterns, aiming to minimise disturbance to wildlife habitats. In the landscaping design, priority is given to selecting local plant species that are more suitable for the survival and reproduction of wildlife, creating a multi-layered plant community structure to meet the needs of wildlife migration and activities.

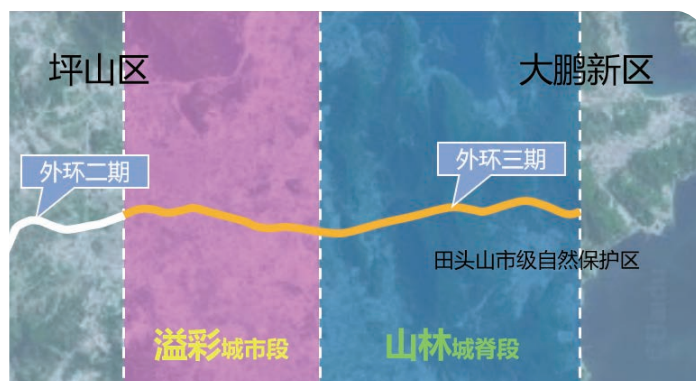
Road Greening Design Measures

- **Road design should be coordinated with the environment:** Investigate the surrounding meteorological conditions, biodiversity, urban development planning, cultural background, natural resources, historical sites and the distribution of residents along the road to understand the ecological characteristics of the environment along the Shenzhen Expressway.
- **Optimise land resource utilisation:** Conduct research on the land resources along the route, and select the route alignment based on local land use planning to minimise the occupation of arable land, farmland and economic forests. Additionally, reduce the project's land occupation to the maximum through engineering designs such as retaining walls, slope protection structures, or elevated bridges. During earthwork excavation, we prioritise the utilisation of soil and stone resources from the excavation sections.
- **Protection of natural water systems:** The design of bridge structures along the Shenzhen Expressway should maximally conform to the direction of water flow, avoiding compression of the water passage and preventing obstruction of water flow. In the planning of drainage systems, the water flow path should be considered, and water accumulation on the road surface and in the road ditches should be directed to designated areas for discharge instead of discharging randomly into the water bodies or soil on both sides of the road.



Ecological design of Shenzhen Outer Ring Expressway in harmony with the environment

The Shenzhen section of the Shenzhen Outer Ring Phase III project is rich in precious ecological resources along its route, with a wide variety of surrounding ecological communities. In the project planning process, we fully considered the natural features and landscape patterns along the route. We designed two road landscape areas, namely the Colorful City Section and the Mountain Forest Ridge Section, to integrate the beauty of nature with the cultural charm, highlighting the ecological concept of harmonious coexistence between nature and the city.



Schematic Diagram of The Ecological Design of Shenzhen Outer Ring Expressway in Harmony with Environment

Civilised Construction

The Company has standardised the construction site and enhanced the management of civilised construction. In terms of dust control, the Company employs eco-friendly and energy-efficient processes during construction, clearly defining the “three centralisations”² management principle, strictly implementing the “seven 100%” dust pollution control measures, allocating special funds for dust control, and incentivizing construction parties to take dust prevention and control measures. To address noise pollution, we urge construction units to strictly implement the “eight requirements” and other noise reduction measures in accordance with the *Technical Specification for Prevention and Control of Construction Project Noise Pollution*, minimizing noise disturbances. In terms of water pollution prevention and control, the construction site is equipped with mobile toilets, wastewater sedimentation treatment systems, and oil separation facilities. For construction wastewater that cannot be reused, is transported by sealed vacuum trucks to municipal wastewater treatment plants for processing.

The Seven 100% Measures for Dust Pollution Prevention

- 1 Construction fencing and external scaffolding are 100% fully enclosed.
- 2 Entrances and exits, as well as the roadways are 100% hardened.
- 3 100% of the entrances and exits are equipped with flushing facilities.
- 4 100% wet construction method is used for dust-prone surfaces.
- 5 100% coverage of exposed soil and easily dusty materials.
- 6 Install TSP online monitoring equipment at 100% of the entrances and exits.
- 7 All construction sites must fully implement the requirements.



The Coverage of Exposed Soil and Easily Dusty Materials



Install TSP Online Monitoring Equipment at The Entrances and Exits

Measures for the Prevention and Control of Dust Pollution at Construction Sites

- Urge the construction sites under management to fully implement the seven 100% dust pollution prevention measures in accordance with relevant technical specifications.
- In the project bidding and procurement process, it is encouraged to use non-road mobile machinery that meets the National IV emission standards or higher, and to promptly replace high-energy-consuming and high-emission construction machinery and equipment that are being phased out.
- Urge the construction project's construction units to comprehensively carry out the posting of environmental protection QR codes on non-road mobile machinery, achieving the informatisation and digital management of engineering machinery equipment.
- Promote the use of clean energy liquefied natural gas (LNG), which is colorless, odorless, and non-toxic, at the asphalt mixing plants, and implement enclosed construction management to reduce dust and fume emissions during the construction process.

² Implement enclosed construction for steel bar processing plants, concrete mixing stations, and asphalt mixing plants.

Eight Requirements for Noise Pollution Prevention and Control

1. It is necessary to do a good job in handling public visits.
2. It is essential to communicate effectively with the affected communities.
3. Public notices must be made properly.
4. Continuous construction in Compliance with Legal Requirements.
5. The sound insulation and noise reduction measures must be implemented effectively.
6. The construction schedule must be scientifically planned.
7. It is necessary to strengthen the publicity and education on civilised construction.
8. Online monitoring networking must be done well.

Measures for the Prevention and Control of Noise Pollution at Construction Sites

- Urge the construction units to fully implement the “eight requirements” and other noise reduction measures in accordance with the *Technical Specifications for Prevention and Control of Construction Project Noise Pollution* in order to achieve noise control at the source.
- Encourage the active promotion of low-noise construction techniques at construction sites, comply with the construction noise decibel limit requirements, and promote the use of new noise pollution prevention and control technologies and measures, such as noise reduction measures for rubber-tired machinery and shock absorption plate measures, to minimise the negative impact on surrounding residents and the ecological environment. At the same time, we adopt a proactive attitude and effective measures to properly address related noise complaints.
- Adopt the “three concentration” principle, implementing enclosed construction management for the production activities at the rebar processing plant, concrete mixing station, and asphalt mixing station on the construction site, further reducing noise pollution generated during the construction process.

The Ranking of Shenzhen Expressway in the Ecological Civilisation Construction Assessment in Shenzhen has been Rising Year by Year

2021 **No.10**2022 **No.7**2023 **No.5**

Green Operation

The Company has fully integrated the green and low-carbon concept into various aspects of its management and maintenance operations, aiming to build a sustainable expressway system. We utilise innovative technologies, environmentally friendly materials, and efficient equipment to optimise resource allocation and energy consumption promoting the coordinated development of expressway operation and environmental protection.

Resource and Energy Conservation

The Company's toll road business sector primarily consumes energy from the electricity consumption of expressway street lights. To effectively reduce energy consumption, we have implemented LED energy-efficient lights to replace traditional high-pressure sodium lamps in various directly managed road sections, reducing electricity consumption while maintaining road illumination levels. Additionally, we actively promote the use of the “Shenzhen e-Traffic Mini Program” and encourage the adoption of electronic invoices to minimize paper usage. Furthermore, we are implementing a paperless office mode by optimizing the OA system in key business areas such as document management, contract management, financial reimbursement, and human resources management to achieve digital information circulation.

To reduce resource consumption during the project construction process, the Tonggang Avenue project relies on BIM technology and employs energy-efficient and environmentally friendly tunnel construction methods to effectively conserve construction materials. Additionally, after separating construction waste such as soil and sand, the project promotes the recycling of resources, thereby reducing the amount of construction waste at the source.

We constructed a 3.404 megawatt distributed photovoltaic power station on the rooftops of buildings and parking sheds within the Qiantai Industrial Park in the Shenzhen-Shanwei Special Cooperation Zone, contributed to the development of a “zero-carbon industrial park” with significant environmental benefits.



Taking 2021 as the baseline, we have set a three-year target to reduce water consumption per million in revenue by 2.5% and energy consumption per million in revenue by 3% by 2024. In 2024, the Company's resource and energy usage is as follows:

Shenzhen Expressway's Resource Usage Data in 2024



Electricity
117,133,578 kWh



Gasoline
759,613 Litre



Diesel
248,710 Litre



Natural gas
301,399 m³



Liquefied petroleum gas
235,340 kg



Water resources
2,328,094 ton



Water resource usage intensity
251.82 t/million revenue



Comprehensive energy consumption intensity
14,342.38 kWh/million revenue

Emission Reduction

The main emissions generated by the Company's construction activities are construction waste, construction waste oil and waste liquids. For construction waste, we have set up temporary solid waste disposal areas in the construction area, enclosed with safety nets to separate them from other areas, and regularly contact the environmental protection department for transportation. As for construction waste oil and waste liquid, we store and treat them together. The main types of waste generated by the Company's organic waste treatment business are slag, exhaust gas, and wastewater. Most of the slag is used for power generation, a small portion is used for black soldier fly farming or composting. For exhaust gas, we purify it through on-site deodorisation facilities before emission meets standards. For wastewater, after treatment by on-site sewage treatment facilities, it is discharged in compliance with standards or transported to nearby sewage plants for treatment.

Taking 2021 as the baseline, we have set a three-year target to reduce waste generated per million in revenue by 3%, reduce non-hazardous waste per million in revenue by 3%, reduce air pollutant emissions per million in revenue by 3%, and reduce wastewater discharge per million in revenue by 3%. In 2024, the Company's emission situation is as follows:

Shenzhen Expressway Emissions Data in 2024



Waste gas

Nitrogen Oxides emissions
44,889 kg

Sulfur Oxides emissions
6,895 kg

Particulate matter emissions
935 kg



Wastewater

Wastewater discharge volume
2,175,704 ton

Wastewater discharge intensity
235.34 t/million revenue



Non-hazardous waste

Non-hazardous waste generation
165,013 ton

Non-hazardous waste intensity
17.85 t/million revenue



Hazardous waste

Hazardous waste generation
12,127 kg

Hazardous waste intensity
1.31 kg/million revenue

Responding to Climate Change

Climate change has become one of the most critical challenges facing the world, with extreme weather events posing challenges to the safety and stability of transportation infrastructure. Shenzhen Expressway actively engages in climate governance actions, referencing the Task Force on Climate-related Financial Disclosures (TCFD) to identify climate-related risks and opportunities, focusing on enhancing climate resilience, ensure the long-term safety and stable operation of transportation infrastructure.

Governance

The Company actively responds to the “Carbon Peak” and “Carbon Neutrality” strategies and diligently implements measures to address climate change. We have clearly defined the governance responsibilities of the board of directors and management in matters related to climate change, and have formulated the *Regulations on Ecological Environment Protection Management* to manage energy consumption and greenhouse gas emissions.

Basic Requirements of the *Regulations on Ecological Environment Protection Management* for Energy Conservation and Carbon Reduction

- Actively respond to the ‘Carbon Peak’ and ‘Carbon Neutrality’ strategies, control greenhouse gas emissions, reduce pollutant emissions, effectively manage total energy consumption, and actively promote the development of ‘Zero Waste Cities’.
- Incorporate the special plan for ecological environment protection and resource conservation into the development strategies and plans of all units, steadily and orderly promoting the green, low-carbon, and sustainable development of the group.
- Encourage the research, development and application of new technologies, processes, equipment, and materials that are energy-efficient, low-carbon, and environmentally friendly. Strengthen carbon emission management to promote synergistic effects in pollution reduction and carbon reduction.
- Implement the main responsibility for energy conservation and emission reduction, advocate for clean production and green operations, practice green office initiatives, and strengthen ecological environmental protection management in daily work.
- Calculate and convert the carbon emission reduction data of our unit in production and business activities according to relevant standards.

Strategy

The Company has conducted a comprehensive review of potential climate-related risks and their financial impacts, establishing high and low greenhouse gas emission scenarios. We have analysed the challenges and opportunities brought by climate factors in each scenario, and conducted a comprehensive assessment of the financial impacts of climate factors³.

We have chosen to conduct a scenario analysis using the Shared Socioeconomic Pathways (SSP) outlined in the Sixth Assessment Report (AR6) by the Intergovernmental Panel on Climate Change (IPCC). Specifically, we will compare the Low Greenhouse Gas Emissions scenario (SSP1-2.6) with the High Greenhouse Gas Emissions scenario (SSP5-8.5) to qualitatively assess the potential impacts of physical risks on company operations in the short term (2025), medium term (2030), and long term (2050).

³ The assessment by Shenzhen Expressway of the potential financial impacts of climate-related risks constitutes forward-looking statements. Due to numerous uncertainties in the external environment, actual future developments may differ from the projections made in this report.

Description of Climate Scenarios for Physical Risk Analysis

Scenarios	Shared Socioeconomic Pathway SSP1-2.6	Shared Socioeconomic Pathway SSP5-8.5
Description	Assuming that countries will reduce greenhouse gas emissions in accordance with the Paris Agreement to control global warming this century to no more than 2.0°C above pre-industrial levels (1850), achieving sustainable development.	Assuming business as usual with no greenhouse gas reduction measures implemented by countries, carbon emissions are projected to triple the compared to 2015 levels by 2100. This scenario would lead to a global temperature increase of 4.4°C by the end of this century compared to pre-industrial levels, necessitating countries to implement climate adaptation and mitigation measures.
Temperature rise magnitude	Not exceeding 2.0°C	Approaching or exceeding 4.4°C
Key assumptions	Assuming factors such as business operations, asset size, and asset location remain constant, the physical risks faced by assets in various scenarios are measured solely through financial expected losses.	

Physical Risk Overview

	SSP1-2.6			SSP5-8.5		
	2025	2030	2050	2025	2030	2050
Extreme Rainfall						
Typhoon						
Coastal Flooding						
Extreme Heat						
Sea Level Rise						
Extreme Cold						
Extreme Snowfall						

Risk Level:



Low Risk



Medium Risk



High Risk

Assessment of Financial Impact of Physical Risks

Climate-related Risks	Impact Period	Potential Financial Impact
Acute Physical Risks <ul style="list-style-type: none"> Extreme Rainfall, Typhoon, Coastal Flooding and Extreme Heat 	Short-term, Medium-term, Long-term	<ul style="list-style-type: none"> Damage to road infrastructure and work equipment, road closures, construction suspensions, and business interruptions; limited ability to obtain insurance and increased costs of acquiring resources.
Chronic Physical Risks <ul style="list-style-type: none"> Sea Level Rise 	Long-term	<ul style="list-style-type: none"> Increased maintenance and repair costs due to roadbed settlement.

Measures to Address Acute Physical Risks

- Enhance the emergency response plan for climate events, including warning systems and emergency response measures to address sudden climate events and ensure the safety of Shenzhen Expressway operations.
- Upgrade and improve roads, bridges, and drainage systems to enhance disaster resilience and reduce the damage caused by climate events on facilities.

Measures to Address Chronic Physical Risks

- Monitor meteorological dynamics, closely track long-term changes in weather patterns, forecast weather events, and take measures in advance.
- Adjust the Company’s long-term planning, including road maintenance, construction, and updating plans, to continuously adapt to meteorological conditions in accordance with the trend of climate change.

Measures to Address Physical Risks

We have chosen to conduct scenario analysis using the orderly scenario and greenhouse world scenario proposed by the Network for Greening the Financial System (NGFS) to qualitatively assess the potential impacts of transition risks on company operations in the short term (2025), medium term (2030), and long term (2050).

Description of Climate Scenarios for Transition Risk Analysis

Scenarios	Orderly Scenario	Greenhouse World Scenario
Description	Strict climate policies and innovation will limit global warming to 1.5°C, achieving net zero carbon dioxide emissions around 2050.	Implement current policies alone, even with the implementation of National Determined Contributions (NDCs) targets, lacks effective policy support.
Temperature rise magnitude	Not exceeding 1.5°C	More than 3°C
Key assumptions	Assuming factors such as business operations, asset size, and asset location remain unchanged, the transition risk faced by assets in various scenarios is measured solely through financial expected losses.	

Transition Risk Assessment Overview

	Ordered scenario			Greenhouse World Scenario		
	2025	2030	2050	2025	2030	2050
Policy and Legal Risks						
Market and Technology Risks						
Reputational Risk						

Risk Level: Low Risk Medium Risk High Risk

Financial Impact Assessment of Transition Risks

Climate Related-Risks	Impact Period	Potential Financial Impact
Policy and Legal Risks <ul style="list-style-type: none"> • Increase in greenhouse gas emission pricing • Enhanced disclosure requirements • Operational permit restrictions 	Medium-term, Long-term Short-term, Medium-term, Long-term Medium-term, Long-term	<ul style="list-style-type: none"> • Restrictions on the use of carbon-intensive materials, leading to price increases for some high-carbon emission raw materials • Increased compliance costs • Early retirement of existing assets due to policy changes
Market and Technology Risks <ul style="list-style-type: none"> • Shift in mobility patterns • Increased competition in the clean energy sector • Substitution of existing products and services with low-emission alternatives 	Long-term Medium-term, Long-term Long-term	<ul style="list-style-type: none"> • Revenue reduction due to changes in supply and demand for goods and services • Changes in corporate valuation and decline in profits • Early obsolescence of existing technologies and increased capital investment in new technologies
Reputational Risk <ul style="list-style-type: none"> • Increased stakeholder scrutiny 	Short-term, Medium-term, Long-term	<ul style="list-style-type: none"> • Lack of transparency in climate action could harm corporate image • Meeting relevant demands may increase costs

Measures to Address Policy and Legal Risks

- Recycle construction waste, etc., to reduce costs associated with purchasing new materials.
- Establish a robust reporting and monitoring system to meet disclosure requirements.
- Diversify business operations to reduce reliance on specific permits.

Measures to Address Market and Technology Risks




- Provide diversified transportation services to meet the green mobility needs of different customer segments.
- Diversify the business portfolio to address market uncertainties.
- Regularly assess the benefits of technology upgrades and transitions to ensure that initial investments yield reasonable returns.

Measures to Address Reputational Risk

- Collect and analyse customer feedback to adjust products and services.
- Establish transparent communication channels to actively communicate the Company's sustainability initiatives.
- Collaborate with stakeholders to jointly advance sustainability goals.

Measures to Address Transition Risks

Climate change is both a challenge and an opportunity. Shenzhen Expressway seizes the opportunity for development, identifies diverse climate-related opportunities, and is committed to transforming the challenges of climate change into a powerful driver for the Company's sustainable development, achieving a win-win situation for economic benefits and environmental protection.

Climate-related Opportunities	Potential Financial Impact	Measures
 Technological Opportunities <ul style="list-style-type: none"> • Clean Energy Technologies: Adopt clean energy technologies and develop energy storage solutions. • Intelligent Transportation Systems: Develop intelligent transportation systems to improve traffic efficiency and reduce energy consumption. 	<ul style="list-style-type: none"> • Reduce Operating Costs: The adoption of clean energy and intelligent transportation technologies can lower fuel and maintenance costs, and enhance operational efficiency. 	
 Market Opportunities <ul style="list-style-type: none"> • Green Mobility Demand: Meet consumers' demand for eco-friendly travel options by providing clean energy transportation services, thereby attracting environmentally conscious customers. • Clean Transportation Projects: Participate in and invest in clean transportation projects, such as electric vehicle charging infrastructure and battery swapping facilities. • Clean Energy Consumption Demand: Increase the supply of clean energy and expand charging infrastructure. 	<ul style="list-style-type: none"> • Increase Revenue: Provide clean transportation services and infrastructure to attract more customers, thereby increasing the Company's revenue streams. 	<ul style="list-style-type: none"> • Invest in Clean Technologies: Actively invest in and adopt clean energy technologies and intelligent transportation systems to reduce greenhouse gas emissions and lower operating costs. • Diversify Business: Offer clean energy transportation options to attract more customers and increase revenue streams. • Engage in Green Projects: Participate in clean transportation projects and infrastructure development to gain support and incentives from governments and environmental organisations. • Transparent Communication: Proactively communicate the Company's climate-related initiatives to stakeholders to enhance the Company's reputation and commitment to sustainability.
 Reputational Opportunities <ul style="list-style-type: none"> • Social Responsibility: Actively participate in climate action to enhance the Company's reputation among society and stakeholders, attracting investments and partnerships. • Sustainable Development: Demonstrate the Company's commitment to sustainability to increase public recognition and strengthen brand image. 	<ul style="list-style-type: none"> • Return on Investment: Participate in clean transportation projects and green infrastructure initiatives to obtain funding and incentives from governments and environmental organisations, thereby improving return on investment. 	

Risk Management

The Company has conducted a comprehensive review of potential climate-related risks and their potential financial impacts. The Risk Management Committee assists the Board of Directors in overseeing the Company's overall risk profile, providing alerts to the Board on high-risk areas or risk mitigation recommendations, guiding the Company's management in establishing a comprehensive risk management system and related protocols, and implementing appropriate risk mitigation measures. In the future, we will continue to reference international leading standards, enhance short-term and medium- to long-term climate change management strategies, regularly update greenhouse gas emission reduction targets, explore participation in carbon emission trading markets, to continually strengthen the Company's adaptive capacity in addressing climate change and ensure the Company's flexibility in responding to climate challenges.



Indicators and Targets

The Company has set performance targets in areas such as ecological civilisation, incorporating them into the performance compensation calculation of senior management to incentivise executives to drive the practical implementation of the Company's ESG practices. The main type of greenhouse gas emitted by the Company is carbon dioxide. Using 2021 as the baseline, we have set a three-year target to reduce greenhouse gas emissions per million yuan of revenue (Scope 1 + Scope 2) by 3% by 2024⁴. In 2024, the Company's greenhouse gas emissions situation is as follows:

Shenzhen Expressway's Greenhouse Gas Emissions Data in 2024

Greenhouse Gas Emissions Types	Unit	2024
Scope 1 emissions	tCO ₂ e	4,040
Scope 2 emissions ⁵	tCO ₂ e	62,854
Scope 3 emissions (Business travel)	tCO ₂ e	131
Total emissions (Scope 1 + Scope 2)	tCO ₂ e	66,894
Emissions intensity (Scope 1 + Scope 2)	tCO ₂ e/million revenue	7.24

⁴ Due to the office relocation in 2021, the scope of environmental targets was limited to Environmental Company, Operations Company, New Energy Company, Shenchang Company, Qinglian Company, Investment Company, and Qinglong Company. In the future, we will further expand the coverage of environmental targets.

⁵ The power emission factor is taken from the latest grid-average emission factor published by the Ministry of Ecology and Environment of the People's Republic of China.

Improving the Quality of Environmental Protection Industries

Shenzhen Expressway actively participates in climate governance, seizing the “dual carbon” opportunities and actively laying out developing plans. The Company has established the Environmental Company and the New Energy Company as investment management platforms to expand the environmental protection industry, strengthen existing projects to improve quality and efficiency, comprehensively enhance the quality of environmental protection industry operations, and strive to become a key force in addressing the challenges of climate change.

Solid Waste Resource Utilisation

The Company is focusing on the development of organic waste treatment as a key area of solid waste resource utilisation. Currently, there are 14 organic waste treatment projects in commercial operation. We utilise the biogas generated from anaerobic fermentation of organic waste for heating or power generation, the dewatered digestate for composting, and the separated oil for the production of chemical products. This effectively promotes an efficient and sustainable development model of ‘environmental protection – resource recycling – carbon emission reduction’. During the reporting period, Shenzhen Expressway was honored with the title of ‘Outstanding Contribution Enterprise to the Construction of a Waste-Free City in Shenzhen by 2024’. In 2024, the Company processed amount of organic waste 1,400,958 tons, biogas power generation grid-connected electricity 38,579 MWh in total, equivalent to reducing carbon dioxide emissions by 22,149 tons and reducing the use of standard coal by 3,360 tons.



The Guangming Environmental Park project has officially entered the trial operation phase

The Guangming Environmental Park, built by Guangming Environment, is a significant public welfare project in Shenzhen, and the largest project in the city for the individual treatment of kitchen waste. The park is designed on the advanced concept of a smart factory, utilising next-generation digital technology to achieve automation, intelligence, and highly integrated management of the kitchen waste treatment process. This significantly improves management efficiency and quality, optimizing resource utilisation. After the project is put into operation, it is expected to generate approximately 80 million kWh of electricity annually, reduce carbon emissions by about 60,000 tons per year, and effectively enhance Shenzhen’s capacity for end-of-life treatment of kitchen waste.



The Lisai Environmental biomass waste disposal demonstration project has won multiple prestigious awards

The Lisai Environmental biomass waste disposal demonstration project is a municipal project in Longhua District, Shenzhen, handling kitchen waste. It is a national key special project for “solid waste resource utilisation” demonstration. Lisai Environment adopts the “hydrothermal enhanced hydrolysis – two-phase anaerobic digestion” process to dispose of urban solid waste harmlessly, while obtaining clean electric energy, grease, feed protein, and other resource products, achieving comprehensive resource utilisation of urban biomass waste. In January 2024, Lisai Environment was awarded the title of the Advanced Collective in Shenzhen’s Ecological Environment for the year 2023 and obtained recognition as a specialised, refined, unique and innovative small and medium-sized enterprise.



The Company is simultaneously developing the dismantling and cascaded utilisation of retired cars and new energy batteries. Shenshan Qiantai is based on industrial planning, processing methods, automated production line design, and supporting industrialisation construction, actively participating in provincial and municipal pilot demonstration projects for power battery recycling, processed 366 MWh of end-of-life power batteries.



Shenshan Qiantai participates in the pilot demonstration work of power battery recycling in provinces and cities

Shenshan Qiantai is a national high-tech enterprise focusing on the dismantling of new energy vehicles for scrapping and the cascading utilisation of power batteries. By combining the recycling and dismantling of scrapped motor vehicles and retired power batteries, as well as the remanufacturing of cascaded utilisation products, the Company ultimately achieves the resource recycling and utilisation of batteries throughout their entire lifecycle. During the reporting period, Shenshan Qiantai obtained the second domestic certification for cascaded products of power batteries for new energy vehicles.



Clean Energy Generation

The Company has integrated business capabilities in clean energy generation and post-operation maintenance services, as well as project financing. We continue to improve the standardised operation and control system of clean energy generation projects to enhance operational efficiency and quality, and to create a clean energy system with the characteristics of Shenzhen Expressway.

The Company is actively involved in clean energy generation and post-market maintenance of wind turbines. The total installed capacity of wind power in operation has reached 668 MW, with projects distributed in multiple provinces such as Inner Mongolia, Xinjiang, Jiangsu, and Henan. It is committed to becoming a force in Shenzhen in China's "carbon peak" efforts. The Company generated wind power connected to the grid 1,468,817 MWh, equivalent to reducing carbon dioxide emissions by 1,201,492 tons and reducing the use of standard coal by 180,517 tons in 2024.



Xinjiang Mulei Laojun Temple Wind Farm

The Company has explored and experimented with distributed photovoltaics, and has developed and constructed the first self-developed and internally industry-coordinated distributed photovoltaic project on the Shenzhen Expressway within Shenzhen – the "Integrated Photovoltaic Storage and Charging" project in the Shenshan Qiantai Industrial Park. The project adopts a grid-connected mode of "self-generation for self-use, surplus electricity to the grid". Upon completion, it can save approximately 1,093.23 tons of standard coal annually, reduce carbon dioxide emissions by about 3,002.16 tons, sulfur dioxide emissions by about 0.37 tons, nitrogen oxide emissions by about 0.55 tons, and dust emissions by about 0.08 tons, resulting in significant environmental benefits. Currently, Shenshan Qiantai has been selected as one of the third batch of pilot construction enterprises for near-zero carbon emissions in Shenzhen.



Shenshan Qiantai Industrial Park "Integrated Photovoltaic Storage and Charging" Project

04

Talent: Talent Accumulation, Shared Growth

Putting people first leads to long-term success. Shenzhen Expressway upholds the concept of “people-oriented”, prioritising the protection of employees’ rights and interests, improves employee compensation and benefits, establishes a sound talent development mechanism, and actively creating a diverse, equal, and inclusive work environment.

Risk Analysis and Response

The industry in which the Company operates is facing a dual challenge of attracting and retaining talent, especially with the deepening of emerging technologies such as intelligent transportation. The demand for professionals in related fields is growing rapidly. In response, the Company has implemented a diverse range of talent acquisition methods and offers a variety of non-monetary benefits to attract top talent. It has also developed comprehensive, clearly structured, and diverse training programs to ensure the continuous and stable supply of talent in the Shenzhen Expressway.

Aligning with the United Nations Sustainable Development Goals (SDGs)



Key Issues

- Equal Employment
- Occupational Health and Safety
- Career Development

Employee Rights and Welfare

Shenzhen Expressway strictly adheres to relevant laws and regulations such as the *Labour Law of the People's Republic of China* and the *Labour Contract Law of the People's Republic of China*, upholds the legitimate rights and interests of employees, enhances the protection of employees' rights, optimises the salary and benefits system for employees, and establishes a legal, compliant, and harmonious employment relationship with employees.

Diversified and Compliant Employment

The Company advocates the principle of equal and voluntary employment, formulates and implements internal systems such as the *Employee Recruitment Management Measures* and the *New Employee Enrolment and Confirmation Management Measures*, continuously enhances the level of employment management. Based on actual circumstances and recruitment needs, we attract talents with different professional backgrounds and experience levels through diversified talent acquisition channels. We respect and safeguard human rights, adopt a “zero tolerance” attitude towards harassment and discrimination. We do not tolerate any form of discrimination based on race, color, gender, language, religion, political or other opinions, nationality or social origin, property, birth or any other reason. At the end of the reporting period, the total number of employees categorised by gender, age, educational background and function division is as follows:



The Company fully recognises the significant contributions of female employees to its development. We consistently maintain an inclusive and friendly working environment, support the career development and personal growth of female employees. The Company strictly adheres to national regulations regarding various types of leave for female employees during pregnancy, childbirth, and breastfeeding. We have established dedicated rest areas and lactation rooms to ensure that female employees can receive adequate care and support when needed.



Series of Activities on Women's Day

The Company firmly opposes and prohibits any form of child labour and forced labour. By adhering to the principle of voluntarism in establishing labour contracts and verifying the identities of job applicants, we ensure the prevention of such practices. To promptly identify and properly handle any cases of minors mistakenly entering the Company, we follow relevant standards and laws, take appropriate measures to maintain a legal and just working environment on the Shenzhen Expressway.

Fair Remuneration and Welfare

The Company regards compliant and effective salary management and incentive management as important focal points. It has revised and improved the *Salary and Welfare Performance Management System* and *Incremental Profit Incentives and Constraints Program*, actively benchmarked salary levels in the market based on factors such as job value, skill level, and performance contribution. This is to establish a salary system that is rational, fair, and competitive.

The Company strictly supervises the employment management of contractors, requires them to strictly implement the *Regulations on Protection of the Rights and Interests of Migrant Workers*, strictly enforce the real-name management of rural workers, the management of special accounts for rural workers' wages, and the system of construction general contractors issuing wages on behalf of the units. A dedicated hotline has been set up to receive reports and complaints about actions that infringe upon the legitimate rights and interests of rural workers to receive remuneration for their work.

We provide a diverse range of non-monetary benefits for all employees, including daily and holiday benefits, insurance benefits, vacation benefits, and retirement benefits, aiming to enhance employees' sense of happiness and belonging through reasonable welfare policies.



Welfare System

Daily and holiday welfare

- Offer employees with free breakfast, lunch and overtime dinner
- Send warm wishes and birthday cake gift cards to employees on their birthdays
- The labour union of the Company distributes gifts to employees on the New Year's Day, Spring Festival, Labour Day, Dragon Boat Festival, Mid-Autumn Festival and National Day
- Labour union members are entitled to spring and autumn outing benefits each year, as well as the rights to condolences for weddings, funerals and hospitalisation

Insurance

- Statutory insurance and housing Fund: Pension insurance, medical insurance, maternity insurance, work-related injury insurance, unemployment insurance, housing Fund
- Supplementary insurance: Enterprise annuity, group accidental injury insurance, critical illness insurance, Shenzhen Employee Medical Mutual Aid Guarantee Plan

Vacation welfare

- Paid annual leave, marriage leave, bereavement leave, family planning leave

Retirement benefits

- Annual health examination

Build Harmonious Dialogue

The Company regards listening to employee feedback as an important approach to enhancing the level of enterprise management. We have established various communication channels and mechanisms, such as the staff representative meetings, employee symposiums, and suggestion boxes, to encourage employees to actively participate in corporate governance and voice their concerns. We regularly conduct employee satisfaction surveys, delving into four dimensions – job content, work reporting, work team, and enterprise management – to comprehensively assess employee satisfaction. In response to issues raised by employees in the surveys, we carefully analyse, categorise, implement strategies, and continuously monitor improvements, focusing on addressing the key concerns highlighted by employees.



Shenzhen Expressway pays attention to the well-being of its employees by organising a variety of cultural and sports activities to help them cultivate a healthy lifestyle and positive attitude in their leisure time. During the reporting period, trade unions held activities such as basketball friendship matches, badminton competition, book sharing sessions, speech competitions, and mountain climbing, allowing employees to nurture their character and enrich their minds through cultural exchanges, as well as to relax and release stress through competitive sports.



"Happy Run" Event



Basketball Friendly Match



Badminton Match



Book Sharing Event



Speech Competition



Mountain Climbing Activity

The Company continues to improve the long-term mechanism for assisting employees in difficulty, ensuring that every employee facing difficulties can receive timely help and support. The Company's employee mutual aid plan provides voluntary contributions for major illness insurance and personal accident mutual aid funds, helping employees reduce their medical burden. For employees who unfortunately suffer from major illnesses or accidents, we actively take special rescue measures to help them overcome difficulties as soon as possible.

Talent Training and Development

Shenzhen Expressway upholds the talent concept of “setting a stage for the hard-working and growing together with them”, continuously deepens the training and development system for talents, smooths the career advancement path, improves the assessment and evaluation mechanism, helps employees enhance their skills, and achieve career growth.

Build a Platform for Growth

The Company continues to improve internal systems such as the *Employee Training Management Measures* and the *Professional Title and Qualification Examination Management Measures*, establishes an employee training system guided by corporate strategy, centered on job competency, and aimed at cultivating high-level talents. Through scientifically designed training programs and diverse training methods, the Company continuously empowers employees to improve themselves.

The Company has formulated a comprehensive training plan that covers a wide range of levels and forms, and has implemented a variety of general training courses including comprehensive management, operational management, and professional skills. Tailored training programs have been developed to meet the differentiated learning needs of employees at different levels and positions.

In terms of training methods, we combine internal trainers with external expert resources and internal and external training sessions, promote self-development learning, and implement a variety of strategies. We have adopted a synchronous online and offline live broadcast training mode, advocating on-the-job self-learning. We also collaborate with major universities to provide young employees with opportunities to participate in educational programs for academic advancement, and encourage them to obtain relevant professional certificates. To support this initiative, the Company has established special subsidies and reward mechanisms.

Shenzhen Expressway Employee Training System

Knowledge training

Professional knowledge, management knowledge, company knowledge, law knowledge, information technology knowledge, etc.

Skill training

Comprehensive analysis, planning and judgment, pioneering and innovation, public relations, internal cooperation, computer application, document writing, etc.

Cognitive training

Sense of identity with the Company, professional and working attitude, sense of teamwork, etc.





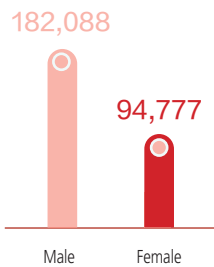
Digital Technology Company holds an “employee lecture hall” activity

In April 2024, Digital Technology Company organised the sixth session of the “Employee Lecture Hall” activity. This session focused on “Data Governance – Empowering the Future Development of Enterprises,” sharing insights on the basic concepts, frameworks and methodologies, as well as enterprise case studies of data governance. This aimed to deepen employees’ understanding and awareness of data governance.

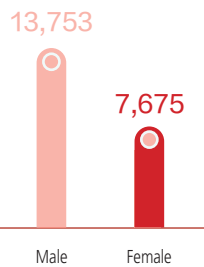


» Categorised by gender

Total training hours for employees

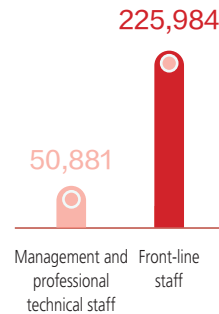


Number of trainees

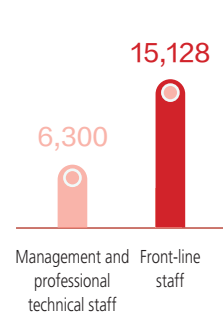


» Categorised by function

Total training hours for employees



Number of trainees



Career Blueprint Planning

Shenzhen Expressway is committed to building high-quality professional teams with “bold innovation, good management, significant achievements, integrity and honesty”. We have formulated and implemented the *Measures for Selection and Appointment of Management*, the *Measures for Management of Employee Position System* and *Measures for Management of Employee Competition for Promotion* to optimise the talent structure and enhance overall operational efficiency.

The Company has established an internal job rotation mechanism and continuously provided progressive career planning and professional empowerment for employees at all levels. We have improved the open and fair performance appraisal and job promotion system, by adopting a multi-dimensional approach to performance evaluation, promoted the standardisation and scientisation of performance appraisal work. Through the comprehensive use of special incentives, and interest-binding incentives, we aim to showcase outstanding talents and ensure that dedicated employees receive their due rewards.

Occupational Health and Safety

The Company places great emphasis on the health and safety of all employees, and has established the *Occupational Safety and Health Supervision System* and the *Work Safety Education and Training Management System*. Employees' awareness of safety and health management is comprehensively enhanced through systematic safety production education and training with a positive atmosphere of "everyone talks about safety, everyone knows how to respond in emergencies".

Occupational Hazard Communication and Warning

- At the time of signing the employment contract, we will truthfully inform the practitioner of the occupational hazards that may arise during the work period, as well as information on their consequences and protective measures, which will be clearly stated in the employment contract.
- If an employee is found with health impairments related to the occupation in which he or she is engaged during an occupational health check, the Company will immediately transfer him or her from the original position and replace it with an appropriate place.
- Warning signs and Chinese warning instructions are set up at the entrance of the workplace that may produce serious occupational disease hazards or at a prominent location in the workplace.

Employee Health Screening

- Pre-employment Examination: All new employees are required to participate in pre-employment occupational health check-ups, fill in the *Employee Occupational Health Curriculum Vitae*, and establish health records for new employees. New employees are allowed to work in this type of work only after they have passed the occupational health examination, and we will keep detailed records of new employees who are diagnosed with occupational diseases.
- Inspection during duty: All employees exposed to occupational hazards must undergo regular medical check-ups in accordance with the regulations, and the original medical examination form will be promptly filed in the employee's file after the check-up. For employees who are found to have occupational contraindications and occupational diseases during on-the-job medical checkups, we will immediately stop them from engaging in the relevant types of work, and the Human Resources Department will coordinate the follow-up arrangements.
- Examination on leaving the job: Before employees are ready to be transferred from or end their employment in operations or positions where occupational disease hazards may exist, they should undergo a health examination of leaving the job.

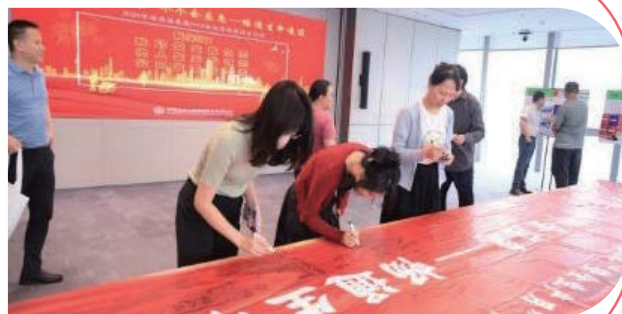
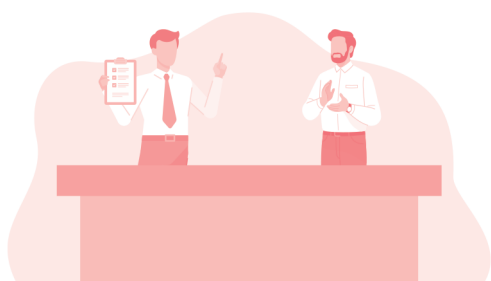
Occupational health protection

- Equip employees with occupational disease protective equipment appropriate to their work.
- Regularly check the use of personnel equipped with protective equipment and urges them to wear and use it correctly.
- Conduct regular or unscheduled inspections and checks of protective facilities and supplies used by the relevant party's on-site workforce.

Occupational Health and Safety Measures

The Company held a variety of safety awareness activities, arranged professional experts to answer employees' questions about self-inspection, self-improvement, and repair of life passages in construction sites, nursing homes, employee apartments, workplaces. We actively conducted safety knowledge competitions, safety-themed series training, safety-themed activities, and other diverse safety-related activities to deepen safety awareness. During the reporting period, Shenzhen Expressway was awarded the "Excellent Organisation Award" in the 2024 Safety Management Skills Competition for Shenzhen municipal enterprises.

Signature of Security Commitment



Safety Knowledge Lecture Hall



Emergency Drill for Escape from High-rise Office Buildings



Fire Escape Drill in Dormitory Building



05

Society: Responsibility in Action, Collective Well-being

Our mission is to create high-quality infrastructure and serve the city for a better life. While pursuing corporate development, we actively undertake social responsibilities by promoting mutual growth with our partners, continuously create more value for society, and strive to enhance social well-being.

Risk Analysis and Response

Improper selection and management of suppliers can have a negative impact on the Company's operations and brand image. Therefore, Shenzhen Expressway has improved its procurement standards to achieve full-cycle tracking from admission, cooperation to evaluation, ensuring the procurement process is efficient, compliant, and transparent.

Aligning with the United Nations Sustainable Development Goals (SDGs)



Key issues

- Supply Chain Management
- Integrity and Performance
- Rural Revitalisation
- Social Contribution

Collaborative Partnership for Mutual Prosperity

Shenzhen Expressway upholds the business partner concept of “sincere cooperation, win-win development”, continuously optimises the procurement process, actively promotes a transparent and sustainable procurement model, and is committed to building a compliant and fair procurement environment, working together to promote the overall level of the supply chain.

Supplier Management

The Company strictly adheres to relevant laws and regulations such as the *Tendering and Bidding Law of the People's Republic of China* and the *Civil Code of the People's Republic of China* and has established systems such as the *Procurement Management Procedure* and the *Procurement Operation Rules* to enhance the comprehensive management of suppliers from admission, cooperation, to evaluation on the Shenzhen Expressway. In 2024 the Company has 2,833 primary suppliers, with 2,830 of them located within Chinese mainland.



Principles of Building Good Business Partnerships

The Company has formulated the *Measures for Supplier Performance Evaluation Management*, which clarify the specific process and standards for supplier performance evaluation to ensure the fairness and transparency of the evaluation process. We have adopted the *Supplier Performance Evaluation Score Sheet* as an evaluation tool to provide comprehensive scores for suppliers, in terms of a number of dimensions, such as completeness of staffing and equipment, quality and schedule management, implementation of production safety, and fulfilment of social responsibilities. The Company regularly summarises the results of supplier contract performance evaluations each year and takes various measures to promote the overall improvement of the supply chain.

Supplier Ratings

Grading	Mark
Superior	95 points ≤ comprehensive evaluation score <100 points
Good	80 points ≤ comprehensive evaluation score <94 points
Medium	70 points ≤ comprehensive evaluation score <79 points
Qualified	60 points ≤ comprehensive evaluation score <69 points
Unqualified	Below 60 points

Procurement Management

The Company has implemented transparent procurement and signed an *Anti-Commercial Bribery Agreement* and *Integrity Contract* with business partners to establish a procurement mechanism that is regulated, efficient, fair, and clean, based on the work philosophy of “standardisation, efficiency, fairness, and integrity”. We strictly adhere to the *Compliance Risk List for Bidding and Procurement Management* for item-by-item review, giving priority to suppliers with good credit and industry representation to reduce supply chain risks from the source.

Principles of Anti-Corruption and Anti-Commercial Bribery



We adopt a “zero tolerance” attitude towards corruption and commercial bribery, strictly adhere to relevant laws and regulations, and do not engage in or support any form of corruption or commercial bribery.



No property or non-property benefits (such as cash, stocks, real estate, job opportunities, promotions, vacations, etc.) shall be directly or through a third party provided or promised to counterparties, government officials, business partners, or other relevant individuals for gaining a competitive advantage or business opportunities.



When providing gifts, hosting banquets, or entertaining guests for official business activities, one must follow the approval procedures as stipulated by the group, and ensure compliance with legal regulations and the internal regulations of the other party.



Do not provide commercial bribery in a disguised form through public welfare donations, social responsibility expenses, etc.



Incorporate anti-commercial bribery and anti-corruption requirements into the criteria for business partner admission, and mandate them to make anti-corruption and anti-commercial bribery declarations and commitments in business dealings and commercial contracts on the Shenzhen Expressway.

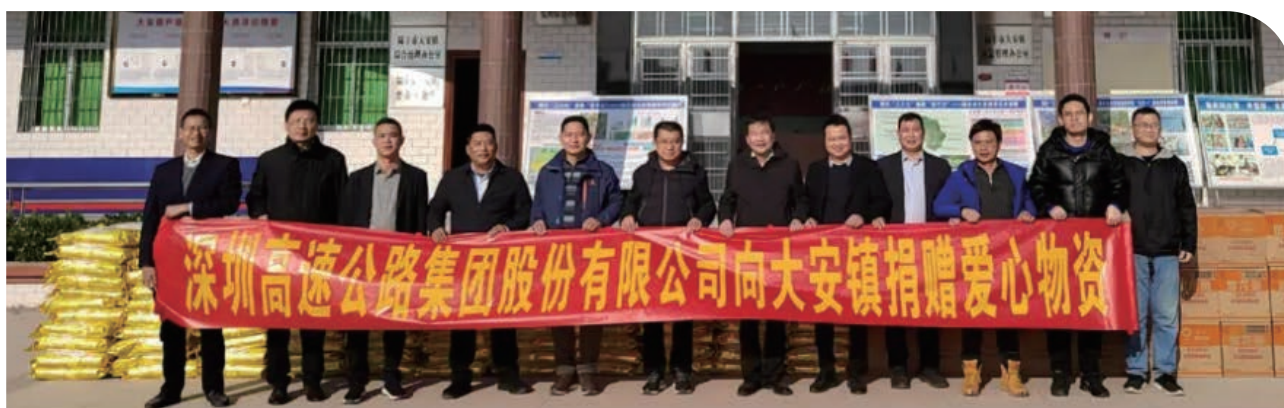
During the procurement process, we conduct comprehensive assessments of suppliers in terms of environmental and social aspects. In the engineering construction sector, we require suppliers to develop scientifically sound measures to ensure environmental protection and civilised construction of projects. At the same time, we also demand that suppliers safeguard the legitimate rights and interests of migrant workers coming into the city.

Gathering the Power of Goodness

Shenzhen Expressway fully leverages its own advantages, actively participates in regional construction and development, and fulfils corporate social responsibility through practical actions. It is committed to realising the beautiful vision of social harmony and common prosperity, contributing efforts to enhance the overall development level of the region.

Promote Common Prosperity

The Company actively fulfils its paired assistance responsibilities, consolidates and expands the achievements of poverty alleviation and effectively connecting with rural revitalisation. At present, four personnel have been selected to carry out the work of stationing in towns to help towns and villages in Anbei and Xiarao villages of Da'an Town, Shan Wei Lufeng City. We will continue to adhere to long-term assistance, constantly explore innovative models, contribute more strength to rural revitalisation, and help achieve the goal of common prosperity.



Donate Love Supplies to Da'an Town

The Company also pays attention to the growth of rural children. Since entering Longli County, Guizhou Province in 2012 for investment, it has also incorporated social responsibility for supporting education. As of today, the Company's "Starlight Project Public Welfare Action" has been continuously delivering the love of Shenzhen Expressway to left-behind children in remote areas for thirteen years.



Shenzhen Expressway carried out charity visits to Longli third primary school

On June 3rd, Guishen Company, Guizhou Zhidi, and the property management Company sent a condolence team to Longli Third Primary School to carry out the public welfare condolence activity "Warm Children's Hearts on Children's Day, Care for Growth". They carefully investigated the needs of the students and the school construction situation at Longli Third Primary School, and meticulously prepared learning materials and sports equipment. The condolence team conducted on-site research to understand the school's educational facilities needs and difficulties, and continued to support the educational work at Longli Third Primary School.



Protecting the Elderly and the Young

The concept of “caring for the elderly and nurturing the young” is crucial to every household and the well-being of the people. The Company upholds the philosophy of “Focusing on warm service and commit to the original promise all the time”, lays out community, institution, hostel and intelligent elderly care services, establishes a service ecosystem integrating “home – community – institution”, and provides a full range of life support such as home aging modification, community catering, sports rehabilitation and child care. During the reporting period, Shenzhen Expressway Joyful Health elderly services met the five-star standard and obtained a three-star rating for the integration of medical and elderly services.



Gaole Yijia responds to waiting-list platform system to provide equitable resources for elderly services

Gao Le Yi Jia (Guangming Social Welfare Institute) features health care, vitality care, technology care, and cultural care, aiming to create a district-level elderly care institution that integrates leisure, gourmet dining, entertainment, health care, and basic medical services, warmly safeguarding the happiness of every elderly person in their later years. Gao Le Yi Jia has a total of 377 beds, including 100 policy beds, and allocates resources reasonably to provide waiting-list elderly individuals with equal access to high-quality, refined services. Through the Guangming District's waiting-list system, it has successfully provided stable care and emotional comfort to 21 elderly individuals, effectively supporting the social security system.



Gao Le Yi Jia Living Environment



The Community integrated service centre focuses on addressing urgent, difficult, worrisome and hopeful issues to create a diverse, integrated and comfortable environment

Guangming New Village and Phoenix Jiulongtai Guangming Hui are positioned as pilot projects for high-value, high-quality, and high-standard community comprehensive service centres. They aim to create a high-quality community service centre that integrates “care for the elderly and children, medical care and support, smart interconnection, and assistance for good meals”, adding to the well-being of residents in the area. The “elderly meal assistance” and “charity canteen” provide warm meal services to over 10,000 residents, while the childcare centre has accommodated hundreds of children. This not only reduces the burden on families in terms of childbirth, child-rearing, and education but also warms the hearts of the elderly through their taste buds.



Love Kitchen



Childcare Centre

Enthusiastic Public Welfare and Charity

While developing our company, we have not forgotten to give back to society. We have established the Shenzhen Expressway Volunteer Team with the aim of “serving society and spreading civilisation”. Through a volunteer recruitment platform, we have gathered public welfare projects in various fields such as education, environmental protection, poverty alleviation, and healthcare, to attract more people to pay attention to and support public welfare undertakings. During the reporting period, the Company’s charitable contributions amounted to RMB2.84 million, with 1,700 employees participating in volunteer, providing a total of 3,811 hours of volunteer service, and social contribution per share is RMB1.40.



Investment Company carries out dengue fever prevention and education campaign

On the morning of October 11th, the investment Company carried out a dengue fever prevention and education campaign at the Guangming Social Welfare Institute. Volunteers worked together to clean up stagnant water on the institute’s premises and carried out mosquito control in the flower beds to improve the overall hygiene conditions of the welfare institute. At the end of the event, the volunteers organised a quiz on dengue fever prevention with prizes to enhance awareness of dengue fever prevention.



Investment Company organises community health seminars and children’s popular science reading activities

The investment Company “Shenzhen Expressway Joyful Health” project pays close attention to the health and living needs of the community residents. It carries out a series of diverse health lectures, free clinics, and popular science reading activities in the community to enhance residents’ health awareness, support children’s reading and knowledge growth, and provide substantive help and support for the health and life of the community residents, effectively improving their quality of life.



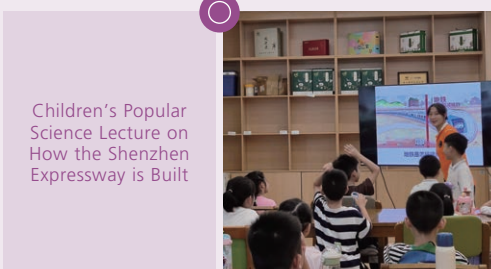
Lecture on Emotional Management and Positive Mindset for Psychological Well-being



Traditional Chinese Medicine Health and Wellness Activities



“Healthy Oral Cavity, Happy Family” Event



Children’s Popular Science Lecture on How the Shenzhen Expressway is Built

Appendix

Laws and Regulations

Major laws/regulations	Policies/procedures established by the Company	Compliance measures
Highway Law of the People's Republic of China Measures for quality control of highway engineering Standard for quality inspection and assessment of highway engineering (JTGF80/1-2004)	Specification for engineering quality management Construction Safety Management Regulation Handbook of standardised management of engineering construction Manual for prevention and treatment of common quality defects Plan for construction organisation and design Code for supervision of expressway engineering Project Construction Management Control Procedure Regulation for supervision and inspection of construction projects	Strict implementation of the Company's system and procedures, in the project management process, the Company to contract management as the core, through system management, access management, construction process management, standardised management and other measures to control the construction quality, in order to ensure the quality of the project, the quality management system such as equipment access management, raw material access system, owner independent sampling system, first piece engineering approval system and test piece construction system should be implemented.
Regulations on road administration Standard for assessment of highway technical condition (JTG H20-2007) Regulations on the administration of toll roads Technical code for highway maintenance (JTG H10-2009)	Technical code and acceptance standard for routine maintenance engineering Project Management Manual for special conservation projects Implementation Measures for maintenance and road production management of new expressways during the liability period for defects Implementation measures for entrustment of expressway maintenance projects Measures for the administration of expressway maintenance contracts Ministry of Road Maintenance Hidden Trouble Investigation and management system	In strict accordance with the national technical specifications and evaluation standards for expressway maintenance, medium and long-term maintenance plans have been formulated for each expressway, and routine inspections and regular professional inspections have been carried out to ensure the safety of structures such as bridges and tunnels, closely monitor the technical condition of the expressway, find out the expressway diseases as early as possible and treat them.
Law of the People's Republic of China on tendering and bidding Regulations for the implementation of the law of the People's Republic of China on bidding and tendering Civil Code of the People's Republic of China	Procurement management procedures Rules governing the conduct of procurement Administrative measures on supplier performance evaluation Administrative Measures for the establishment of bid evaluation and bid determination committees Administrative measures on bidding and tendering of expressway engineering construction projects Measures for the administration of subcontracts Measures on tendering and bidding for construction projects Administrative measures on tendering and bidding of expressway engineering construction supervision Management Regulation for project bidding Special Technical Specification for construction Measures for the management of the archives of expressway maintenance contractors	In accordance with the relevant regulations and regulations on qualification management and bidding management, special construction technical standards have been formulated and strictly implemented, the qualification examination of potential contractors has been carried out, and the quality of bidding documents has been strictly controlled, to conduct regular appraisals of the contractors and contractors, and establish appraisal files, so as to select qualified contractors and establish long-term cooperation with reliable partners.

Major laws/regulations	Policies/procedures established by the Company	Compliance measures
<p>Law of the People's Republic of China on environment protection</p> <p>Law of the People's Republic of China on the prevention and control of air pollution</p> <p>Law of the People's Republic of China on the prevention and control of water pollution</p> <p>Law of the People's Republic of China on the prevention and control of environmental pollution by solid waste</p> <p>Opinions on further promoting the classification of domestic waste</p> <p>Renewable Energy Law of the People's Republic of China</p>	<p>Administrative measures on ecological and environmental protection</p> <p>Administrative Measures for the assessment of the construction of ecological civilisation</p> <p>Third-party monitoring and management system</p> <p>Code of practice for deodorisation</p> <p>Code of practice for wastewater treatment</p> <p>Code of operation for desulfurization system</p> <p>Code for maintenance of pretreatment equipment</p> <p>Code for maintenance of anaerobic biogas equipment</p> <p>Equipment Management System</p> <p>Production site management system</p> <p>Work instruction for wind turbine operation data analysis</p> <p>Equipment Change Management System</p> <p>Management System of technological transformation</p> <p>Special Project Management System</p> <p>Technical Supervision and management system</p>	<p>In accordance with the requirements of relevant laws and regulations on environmental protection, the corresponding operation specifications and management systems have been formulated, and the environmental protection facilities and equipment have been configured and strictly managed to ensure the effective operation of environmental protection facilities and equipment. Strictly in accordance with the discharge permit requirements, environmental assessment requirements for monitoring, to ensure that the waste discharge and disposal standards.</p> <p>In strict accordance with the national solid waste recovery and treatment technical specifications and evaluation standards, the development of technical standards and operating procedures, the inorganic waste residue harmless landfill treatment, kitchen waste should be treated as resources to realise resource recycling, and innovative technologies and processes should be actively developed to improve the treatment effect and reduce waste generation.</p> <p>The use of innovative processes, new environmental protection materials, efficient equipment to optimise the allocation of resources and energy consumption.</p>
<p>Work Safety Law of the People's Republic of China</p> <p>Road Traffic Safety Law of the People's Republic of China</p> <p>Emergency Response Law of the People's Republic of China</p> <p>Law of the People's Republic of China on the prevention and control of occupational diseases</p>	<p>Safety and production management system</p> <p>Work Safety Responsibility Management System</p> <p>Work Safety Risk Mortgage system</p> <p>Fire Safety Management System</p> <p>Safety education and training management system</p> <p>Management System of work safety expenses</p> <p>Work Safety Management Manual of Ministry of Road Maintenance</p> <p>Assessment Standard for work safety standardisation</p>	<p>Strictly implement the Company's various systems and processes, refine the safety production system, formulate the implementation plan of the root cause of safety production, implement the safety risk classification control and hidden danger investigation and management, we will promote the standardisation of work safety in all business sectors, build a comprehensive and effective emergency management system, and ensure work safety.</p>

Major laws/regulations	Policies/procedures established by the Company	Compliance measures
Labour Law of the People's Republic of China Labour contract law of the People's Republic of China Regulations on the protection of wage payments for migrant workers	Administrative measures on staff recruitment Measures for the management of new employees entering and becoming full-time employees C & B Performance Management System Measures for the management of staff training Administrative measures on professional titles and qualification examinations Measures for the selection and appointment of managers Measures for the management of staff position system Measures for the administration of employees' competition for posts	Safeguard the legitimate rights and interests of employees, enhance the protection of employees' rights and interests, optimise the salary and welfare system of employees, deepen the talent training system, and improve an open and fair performance appraisal and post promotion system.
Criminal Law of the People's Republic of China Anti-money laundering law of the People's Republic of China	Measures for compliance management Compliance Manual Measures for the management of conflict of interest among staff	We will implement the risk prevention and control system and working mechanism, build a closed-loop management system that integrates compliance, risk control and supervision, standardise the process of accepting and handling problem clues, and carry out integrity warning and education activities.

Key Performance Indicators (KPIs)

Indicators	Units	2024	2023	2022
Environment performance				
Emissions				
Exhaust gas emissions				
Nitrogen oxides (NOx)	kg	44,889	65,208	4,601
Sulphur oxides (SOx)	kg	6,895	2,380	1,630
Particulate matter (PM)	kg	935	1,666	158
Greenhouse gases (GHG) emissions				
Direct (Scope 1) GHG emissions	tCO ₂ e	4,040	8,999	8,706
Indirect (Scope 2) GHG emissions	tCO ₂ e	62,854	59,162	60,068
Scope 3 emissions (Business travel)	tCO ₂ e	131	–	–
Total GHG emissions (Scope 1 and Scope 2)	tCO ₂ e	66,894	68,161	68,875
Total GHG emissions intensity (Scope 1 and Scope 2)	tCO ₂ e/million revenue	7.24	7.33	7.34
Non-hazardous waste				
Non-hazardous waste	ton	165,013	159,476	95,612
Non-hazardous waste intensity	t/million revenue	17.85	17	10.2
Hazardous waste				
Hazardous waste	kg	12,127	5,863	9,142
Hazardous waste intensity	kg/million revenue	1.31	0.63	0.98
Effluents				
Effluents	ton	2,175,704	1,212,384	941,867
Total effluents intensity	t/million revenue	235.34	130	100.49
Resources consumption				
Electricity	kWh	117,133,578	103,737,634	105,328,316
Gasoline	litre	759,613	732,790	703,942

Indicators	Units	2024	2023	2022
Diesel	litre	5,065,543	407,473	2,475,094
Natural gas	m ³	301,399	2,589,477	132,350
Liquefied petroleum gas (LPG)	kg	235,340	123,716	210
Total water usage	ton	2,328,094	1,710,269	1,755,037
Total intensity of water usage	t/million revenue	251.82	184	187.25
Total energy consumption intensity	kWh/million revenue	14,342.38	15,231	19,545.38

Social performance

Employment

Employees	person	7,254	7,062	7,279
New employees recruited	person	1,366	1,356	2,038

Employees – By type of employment

Full-time employees	person	7,254	7,062	7,279
Part-time employees	person	0	0	0

Employees – By gender

Male	person	4,431	4,358	4,355
Female	person	2,823	2,704	2,924

Employees – By age group

30 years old or below	person	4,291	4,160	4,290
31-40 years old	person	1,507	1,519	1,562
41-50 years old	person	1,019	983	1,020
50 years old or above	person	437	400	407

Employees – By educational background

Master degree and above	person	332	339	354
Bachelor degree	person	1,430	1,301	1,335
College degree	person	1,851	1,425	1,366
Below college degree	person	3,641	3,997	4,224

Employees – By job function

Management and specialised technical staff	person	1,935	2,223	2,367
Front-line staff	person	5,319	4,839	4,912

Indicators	Units	2024	2023	2022
Employees – By region				
Mainland China	person	7,240	7,045	7,269
Hong Kong, Macau and Taiwan regions of China	person	14	15	10
Other regions	person	0	2	0
Total employee turnover rate				
Turnover rate	%	18.4	17.6	25.6
Employee turnover rate – By gender				
Male	%	17.7	17.8	25.4
Female	%	19.5	17.3	25.9
Employee turnover rate – By age group				
30 years old or below	%	27.6	26.0	34.2
31-40 years old	%	5.9	6.3	17.7
41-50 years old	%	3.1	4.5	9.2
50 years old or above	%	3.4	5.3	6.1
Employee turnover rate – By region				
Mainland China	%	18.2	17.1	27.8
Hong Kong, Macau and Taiwan regions of China	%	7.1	23.5	20
Other regions	%	0	0	0
Health and safety				
Work-related fatalities	person	0	0	0
Working days lost due to work-related injuries	days	1,174	775	605
Development and training				
Training performance				
Total number of employee	person	21,428	28,409	–
Total training hours	hours	276,865	6,553	16,488
Total training input	Yuan	2,254,820	2,145,025	646,608

Indicators	Units	2024	2023	2022
Training performance – By gender				
Male	person	13,753	13,086	–
Female	person	7,675	15,323	–
Average training hours for male employees	hours	182,088	2,895	–
Average training hours for female employees	hours	94,777	3,695	–
Training performance – By employee category				
Management and specialised technical staff	person	6,300	9,852	–
Front-line staff	person	15,128	18,557	–
Average training hours for management and specialised technical staff	hours	50,881	3,175	–
Average training hours for front-line staff	hours	225,984	3,379	–
Supply chain management				
Suppliers	number of suppliers	2,833	2,745	3,641
Supplier Integrity Agreement Signing Rate	%	100	100	100
Product responsibility				
Customer service				
Business complaints	cases	8,876	5,925	3,967
Complaint handling rate	%	100	100	100
Customer satisfaction index	points	88.6	95.8	94.84
Intellectual property protection				
IPR infringement or being infringed	cases	0	0	1
Patents obtained	number of patents	277	318	356
New patents	number of patents	18	17	29
Anti-corruption				
Employees educated in anti-corruption	person	7,254	7,062	7,279
Total hours of anti-corruption education	hours	284	270	137
Senior management educated in anti-corruption	person	11	14	14
Total hours of anti-corruption education for senior management	hours	16	7	5
Community investment				
Public welfare expenditure	yuan	2,840,000	6,330,014	2,800,000
Volunteer participation	person	1,700	725	287
Hours of volunteer activities	hours	3,811	1,450	3,444

Report Disclosure Index

Guidelines No. 14 of Shanghai Stock Exchange for Self-Regulation of Listed Companies – Sustainability Report (Trial)

Dimension	No.	Issues	Chapter
Environment	1	Responding to climate change	Responding to climate change
	2	Pollutant emissions	Building Ecological Civilisation
	3	Waste disposal	Building Ecological Civilisation
	4	Ecosystem and biodiversity conservation	Building Ecological Civilisation
	5	Environmental compliance management	Enhancing Environmental Management ⁶
	6	Energy utilisation	Building Ecological Civilisation
	7	Water utilisation	Building Ecological Civilisation
	8	Circular economy	Improving the Quality of Environmental Protection Industries
Social	9	Rural rejuvenation	Gathering the Power of Goodness
	10	Social contribution	Gathering the Power of Goodness
	11	Innovation drive	Constructing High-quality Projects
	12	Technology ethics	Constructing High-quality Projects
	13	Supply chain security	Collaborative Partnership for Mutual Prosperity
	14	Equal treatment of small and medium-sized enterprises	New Dimensions of Integrity and Ethical Governance
	15	Product and service safety and quality	Constructing High-quality Projects Guarding Operational Safety
	16	Data security and customer privacy protection	Enjoying A Pleasant Journey
Sustainable development-related governance	17	Employees	Employee Rights and Welfare Talent Training and Development Occupational Health and Safety
	18	Due Diligence	New Dimensions of Integrity and Ethical Governance Risk Analysis and Response
	19	Stakeholder communication	A New Journey of Institutionally Accountable Governance
	20	Anti-commercial bribery and corruption	New Dimensions of Integrity and Ethical Governance
	21	Anti-unfair competition	New Dimensions of Integrity and Ethical Governance

⁶ During the reporting period, the Company's holding company, Zhuji Bioland, was fined by the Shaoxing Bureau of Ecology and environment for discharging pollutants in excess of permitted concentrations due to fluctuations in water treatment load, as detailed in the announcement of administrative penalty information, at present the Company has cooperated with the implementation of corrective measures.

Environmental, Social and Governance Reporting Code of The Stock Exchange of Hong Kong Limited

Part C: “Failure to comply or interpretation” provision

Aspects		Description	Chapter
A Environmental			
Aspect A1: Emissions	General Disclosure	Policies relating to emissions, discharges to water and land, generation of hazardous and non-hazardous waste; and information on compliance with relevant laws and regulations that have a significant impact on the issuer.	Enhancing Environmental Management
	A1.1	The types of emissions and respective emission data.	Building Ecological Civilisation
	A1.3	Total hazardous waste produced (in tonnes) and (where appropriate), intensity (e.g. per unit of production volume, per facility) .	Building Ecological Civilisation
	A1.4	Total non-hazardous waste produced (in tonnes) and, where appropriate, intensity (e.g. per unit of production volume, per facility).	Building Ecological Civilisation
	A1.5	Description of emissions target(s) set and steps taken to achieve them.	Building Ecological Civilisation
	A1.6	Description of how hazardous and nonhazardous wastes are handled, and a description of reduction target(s) set and steps taken to achieve them.	Building Ecological Civilisation
Aspect A2: Use of resources	General Disclosure	Policies on the efficient use of resources including energy, water and other raw materials.	Building Ecological Civilisation
	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).	Building Ecological Civilisation
	A2.2	Water consumption in total and intensity (e.g. per unit of production volume, per facility).	Building Ecological Civilisation
	A2.3	Description of energy use efficiency target(s) set and steps taken to achieve them.	Building Ecological Civilisation
	A2.4	Description of whether there is any issue in sourcing water that is fit for purpose, water efficiency target(s) set and steps taken to achieve them.	Building Ecological Civilisation
	A2.5	Total packaging material used for finished products (in tonnes) and, if applicable), with reference to per unit produced.	Type of Business not Applicable

Aspects		Description	Chapter
Aspect A3: The Environment and Natural Resources	General Disclosure	Policies on minimising the issuer's significant impacts on the environment and natural resources.	Enhancing Environmental Management
	A3.1	Description of the significant impacts of activities on the environment and natural resources and the actions taken to manage them.	Building Ecological Civilisation
B Social			
Aspect B1: Employment	General Disclosure	Policies on remuneration and dismissal, recruitment and promotion, working hours, holidays, equal opportunities, diversity, anti-discrimination and other treatment and benefits; and information on compliance with relevant laws and regulations that have a significant impact on the issuer.	Employee Rights and Welfare
	B1.1	Total workforce by gender, employment type (for example, full- or part-time), age group and region.	Employee Rights and Welfare
	B1.2	Employee turnover rate by gender, age group and geographical region.	Key Performance Indicators (KPIs)
Aspect B2: Health and Safety	General Disclosure	Policies relating to the provision of a safe working environment and the protection of employees against occupational hazards; and information on compliance with relevant laws and regulations that have a significant impact on the issuer.	Guarding Operational Safety Occupational Health and Safety
	B2.1	Number and rate of work-related fatalities occurred in each of the past three years including the reporting year.	Key Performance Indicators (KPIs)
	B2.2	Lost days due to work injury.	Key Performance Indicators (KPIs)
	B2.3	Description of occupational health and safety measures adopted, how they are implemented and monitored.	Guarding Operational Safety
Aspect B3: Development and Training	General Disclosure	Policies on improving employees' knowledge and skills for discharging duties at work. Description of training activities.	Talent Training and Development
	B3.1	The percentage of employees trained by gender and employee category (e.g. senior management, middle management).	Talent Training and Development
	B3.2	The average training hours completed per employee by gender and employee category.	Talent Training and Development

Aspects		Description	Chapter
Aspect B4: Labour Standards	General Disclosure	Policies relating to the prevention of child labour or forced labour; and information on compliance with relevant laws and regulations that have a significant impact on the issuer.	Employee Rights and Welfare
	B4.1	Description of measures to review employment practices to avoid child and forced labour.	Employee Rights and Welfare
	B4.2	Description of steps taken to eliminate such practices when discovered.	Employee Rights and Welfare
Aspect B5: Supply Chain Management	General Disclosure	Policies on managing environmental and social risks of the supply chain.	Collaborative Partnership for Mutual Prosperity
	B5.1	Number of suppliers by geographical region.	Key Performance Indicators (KPIs)
	B5.2	Description of practices relating to engaging suppliers, number of suppliers where the practices are being implemented, how they are implemented and monitored.	Collaborative Partnership for Mutual Prosperity
	B5.3	Description of practices used to identify environmental and social risks along the supply chain, and how they are implemented and monitored.	Collaborative Partnership for Mutual Prosperity
	B5.4	Description of practices used to promote environmentally preferable products and services when selecting suppliers, and how they are implemented and monitored.	Collaborative Partnership for Mutual Prosperity
Aspect B6: Product Responsibility	General Disclosure	policies on health and safety, advertising, labelling and privacy matters and remedies for the products and services offered; and information on compliance with relevant laws and regulations that have a significant impact on the issuer.	Guarding Operational Safety Enjoying A Pleasant Journey
	B6.1	Percentage of total products sold or shipped subject to recalls for safety and health reasons.	Type of Business not Applicable
	B6.2	Number of products and service related complaints received and how they are dealt with.	Enjoying a Pleasant Journey
	B6.3	Description of practices relating to observing and protecting intellectual property rights.	Constructing High-quality Projects
	B6.4	Description of quality assurance process and recall procedures.	Constructing High-quality Projects
	B6.5	Description of consumer data protection and privacy policies, and how they are implemented and monitored.	Enjoying a Pleasant Journey

Aspects		Description	Chapter
Aspect B7: Anti-corruption	General Disclosure	Information about policies to prevent bribery, extortion, fraud and money laundering; and compliance with relevant laws and regulations that have a significant impact on the issuer.	New Dimensions of Integrity and Ethical Governance
	B7.1	Number of concluded legal cases regarding corrupt practices brought against the issuer or its employees during the reporting period and the outcomes of the cases.	New Dimensions of Integrity and Ethical Governance
	B7.2	Description of preventive measures and whistle-blowing procedures, how they are implemented and monitored.	New Dimensions of Integrity and Ethical Governance
	B7.3	Description of anti-corruption training provided to directors and staff.	New Dimensions of Integrity and Ethical Governance
Aspect B8: Community Investment	General Disclosure	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.	Gathering the Power of Goodness
	B8.1	Focus areas of contribution (e.g. education, environmental concerns, labour needs, health, culture, sport).	Gathering the Power of Goodness
	B8.2	Resources contributed (e.g. money or time) to the focus area.	Gathering the Power of Goodness

Part D: Index to Climate-Related Disclosures

Climate-related disclosures		Chapter
Governance		Responding to Climate Change – Governance
Strategy	Climate-related risks and opportunities	Responding to Climate Change – Strategy
	Business models and value chains	Responding to Climate Change – Strategy
	Strategy and Decision Making	Responding to Climate Change – Strategy
	Financial position, financial performance and cash flows	Responding to Climate Change – Strategy
	Climate resilience	Responding to Climate Change – Strategy
Risk Management		Responding to Climate Change – Risk Management
Indicators and targets	Greenhouse gas emissions	Responding to Climate Change – Indicators and Targets
	Climate-related transition risks	Responding to Climate Change – Risk Management
	Climate-related physical risks	Responding to Climate Change – Risk Management
	Climate-related opportunities	Responding to Climate Change – Risk Management
	Capital deployment	Improving the Quality of Environmental Protection Industries
	Internal carbon pricing	No internal carbon pricing applied
	Remunerations	Responding to Climate Change – Indicators and Targets
	Discussion on the process for assessing and managing environmental risks associated with project design, siting and construction	Building Ecological Civilisation
	Climate-related goals	Responding to Climate Change – Indicators and Targets

Survey

Dear Reader:

Thank you very much for reading the *Shenzhen Expressway Corporation Limited 2024 Environmental, Social and Governance Report*. We hope you evaluate this report and provide us your valuable feedback, your comments and suggestions are the important basis to help us make continuous improvements to the report. Please fill in the survey form below and send us your feedback via ir@sz-expressway.com.

Shenzhen Expressway Corporation Limited 2024 Environmental, Social and Governance Report Feedback Form



Name _____



Occupation _____



Tel _____



Email _____

1. What is your overall evaluation of this report?

☐Excellent

☐Good

☐Average

☐Poor

☐Very poor

2. What do you think about the accuracy, completeness, timeliness and clarity of the information disclosed in this report?

☐Excellent

☐Good

☐Average

☐Poor

☐Very poor

3. Do you find the organisation and style of this report easy to read?

☐Excellent

☐Good

☐Average

☐Poor

☐Very poor

4. What material issues are you interested in?

5. What need-to-know information do you think is not disclosed in the report?

6. Do you have any other comments on the environmental, social and governance aspects of Shenzhen Expressway?



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