# Promoting environmental development

Annual Report 2022



ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED

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## Corporate Profile 公司简介

Zheneng Jinjiang Environment Holding Company Limited ("Zheneng Jinjiang Environment" or the "Company") is a forerunner and leading waste-to-energy operator in China's waste-to-energy ("WTE") industry. In 1998, the Company established the first WTE facility in China to utilise differential-density circulating fluidised bed technology and was the first WTE operator in China to develop and industrialise this technology. The Company has an established track record in investment, construction, operations, and management.

On 3 August 2016, the Company was successfully listed on the Mainboard of the Singapore Exchange, marking an important milestone for the Company. On 21 August 2019, Zhejiang Provincial Energy Group Co., Ltd ("Zheneng Group") became the largest controlling shareholder of the Company and on 25 November 2019, the Company changed its name from "China Jinjiang Environment Holding Company Limited" to "Zheneng Jinjiang Environment Holding Company Limited". It is the main platform for the circular economy development of Zheneng Group and the important driver for the green transition of Zheneng Group.

Zheneng Jinjiang Environment ranks among the top few WTE industry players in the PRC in terms of waste treatment capacity and geographical coverage. The Company strives to be a promoter and leader in domestic WTE technology, an integral promoter of the application of fluidised bed technology and moving grate technology, and an outstanding manager of WTE operations among enterprises. At present, the Company progressively extending its industry chain from a single waste incineration plant to include the treatment of sludge, kitchen waste, animal carcasses and many other fields. Through leveraging the advantages of synergistic cycles and digital capability-empowered development, the Company strives to build an urban ecological complex with an unwavering focus on green and high-quality development to meet the people's growing environmental needs for a better life. 浙能锦江环境控股有限公司(以下简称"浙能锦江 环境"或"公司")是中国垃圾焚烧发电行业的先行 者和引领者。1998年,公司在中国建立了第一家 异重循环流化床垃圾焚烧发电厂,是中国首家开 发异重循环流化床技术并使之工业化的垃圾焚烧 发电运营企业。公司具有成熟的投资、建设、运 营和管理经验。

2016年8月3日,公司在新加坡证券交易所主板成 功挂牌上市,是发展过程中的重要里程碑。2019 年8月21日,浙江省能源集团有限公司("浙能集 团")入股,成为公司最大控股股东;同年11月25 日,公司由"中国锦江环境控股有限公司"更名为 "浙能锦江环境控股有限公司",成为浙能集团循 环经济发展的主要平台和转型发展的重要抓手。

浙能锦江环境垃圾处置能力及地域覆盖范围均居 行业前列,公司力争在国产化垃圾焚烧发电技术 方面做推广者和引领者,在流化床技术和炉排炉 技术应用方面做整合提升者,在垃圾发电企业运 行方面做优秀管理者。当前公司正由单一垃圾焚 烧厂,逐步延伸产业链,涉足污泥、餐厨垃圾处 理、病死动物无害化处理等多个领域,发挥协同 循环优势,数字赋能融合发展,着力打造城市生 态综合体,坚定不移走绿色高质量发展之路,满 足人民日益增长的对美好生活的环境需求。



### **BOARD OF DIRECTORS**

Wei Dongliang (Executive Chairman)

Wang Ruihong (Executive Director and Deputy General Manager)

Ang Swee Tian (Lead Independent Director)

Ni Mingjiang (Independent Director)

Kan Yaw Kiong (Ernest) (Independent Director)

### AUDIT AND RISK MANAGEMENT COMMITTEE

Kan Yaw Kiong (Ernest) (Chairman) Ang Swee Tian (Member) Ni Mingjiang (Member)

### NOMINATING COMMITTEE

Ang Swee Tian (Chairman) Wei Dongliang (Member) Ni Mingjiang (Member)

### **REMUNERATION COMMITTEE**

Ang Swee Tian (Chairman) Ni Mingjiang (Member) Kan Yaw Kiong (Ernest) (Member)

### JOINT COMPANY SECRETARIES

Hoon Chi Tern (LLB (Hons)) Toh Li Ping, Angela (ACIS)

### **REGISTERED OFFICE**

Grand Pavilion Hibiscus Way, 802 West Bay Road P.O. Box 31119, KY1-1205 Cayman Islands

### **PRINCIPAL PLACE OF BUSINESS**

1 Yinxiu Road Level 19, Tower A, Hangyue Commercial Center Gongshu District, Hangzhou City Zhejiang Province, People's Republic of China 310011

2 Venture Drive #15-19 Vision Exchange Singapore 608526

## LEGAL ADVISER TO THE COMPANY AS TO SINGAPORE LAW

Rajah & Tann Singapore LLP 9 Straits View #06-07 Marina One West Tower Singapore 018937

## LEGAL ADVISER TO THE COMPANY AS TO PRC LAW

Jingtian & Gongcheng 34th Floor, Tower 3, China Central Place 77 Jianguo Road, Chaoyang District Beijing 100025 People's Republic Of China

### LEGAL ADVISER TO THE COMPANY AS TO CAYMAN ISLANDS LAW AND BRITISH VIRGIN ISLANDS LAW

Walkers (Singapore) Limited Liability Partnership 3 Church Street #16-02 Samsung Hub Singapore 049483

### **INDEPENDENT AUDITORS**

PricewaterhouseCoopers LLP 7 Straits View #12-00 Marina One East Tower Singapore 018936

Partner-In-Charge: Mr Tham Tuck Seng (Appointed since the financial year ended 31 December 2020)

## SHARE REGISTRAR AND SHARE TRANSFER AGENT

Boardroom Corporate & Advisory Services Pte Ltd 1 Harbourfront Avenue #14-07 Keppel Bay Tower Singapore 098632

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## Corporate Information 公司信息

### 董事

韦东良(执行董事长) 王瑞红(执行董事和副总经理) 汪瑞典(首席独立董事) 倪明江(独立董事) 简耀强(独立董事)

### 审计及风险管理委员会

简耀强(主席) 汪瑞典(会员) 倪明江(会员)

### 提名委员会

汪瑞典(主席) 韦东良(会员) 倪明江(会员)

### 薪酬委员会

汪瑞典(主席) 倪明江(会员) 简耀强(会员)

### 联席公司秘书

洪啟腾(法学学士(荣誉)) 卓丽萍(新加坡特许秘书行政管理人员学会成员)

### 注册办公室

Grand Pavilion Hibiscus Way, 802 West Bay Road P.O. Box 31119, KY1-1205 Cayman Islands

### 主要业务地点

浙江省杭州市拱墅区隐秀路 1 号杭悦商业中心写字楼 A 座 19 楼 (邮编: 310011)

探险大道 2 号 #15-19 愿景楼 新加坡邮区 608526

### 公司的新加坡法律事务法律顾问

新加坡立杰有限责任合伙律师事务所 海峡景9号 #06-07 滨海盛景西座 新加坡邮区 018937

### 公司的中国法律事务法律顾问

北京市竞天公诚律师事务所 中国北京朝阳区建国路 77 号 华贸中心 3 号写字楼 34 层 邮编: 100025

### 公司的开曼群岛法律事务和英属维尔京群岛法律 事务法律顾问

汇嘉开曼群岛律师事务所 新加坡三教堂街 #16-02 三星中心 新加坡邮区 049483

### 独立审计师

普华永道会计师事务所有限合伙 海峡景 7 号 #12 滨海盛景东座 新加坡邮区 018936

合伙人: 谭德成 (任命自截止 2020 年 12 月 31 日的财政年度起)

### 股票过户登记处和股票过户代理人

宝德隆企业 & 咨询服务私人有限公司 1 海滨大道 #14-07 吉宝湾大厦 新加坡邮区 098632



### **DEAR SHAREHOLDERS**

First of all, on behalf of Zheneng Jinjiang Environment Holding Company Limited, I would like to express my heartfelt gratitude for the continued care and support you have shown towards the healthy and sustainable development of the Company.

#### **Industry Analysis**

2022 was a pivotal year for the implementation of the "14th Five-Year Plan". The 2022 National Working Conference on Ecological and Environmental Protection highlights that ecological environmental protection will be guided by the overarching principle of "orderly promotion of green and low-carbon development" to promote the coordinated management of pollution reduction and carbon reduction and manage the second compliance cycle of the national carbon emissions trading market, thereby striving to achieve synergy between economic development and environmental protection.

With the support of national policies and with the assistance of fiscal subsidies, the WTE industry in China expanded rapidly and its related industries continue to expand. In 2022, the Chinese government introduced a series of policies to steadily develop urban household waste incineration and power generation, which facilitated the formation of a market-driven operation model for the waste incineration and power generation model for the waste incineration and power generation further improved China's harmless waste treatment system, providing a favorable environment for the development of the industry.

### 尊敬的各位股东

首先,本人谨代表浙能锦江环境控股有限公司向一 直以来关心、支持公司健康可持续发展的各位致以 诚挚敬意与衷心感谢!

### 行业分析

2022 年是实施"十四五"规划的关键之年,2022 年 全国生态环境保护工作会议提出,生态环境保护将 以"有序推动绿色低碳发展"为首,推动减污降碳 协同治理,做好全国碳排放权交易市场第二个履约 周期管理,努力实现经济发展和环境保护协同共进。

在国家政策的引导和财政补贴下,我国垃圾发电行 业快速成长,相关产业不断壮大。2022年,国家连 续出台多部政策,稳步发展城镇生活垃圾焚烧发电, 推动形成垃圾焚烧发电市场化运营模式,进一步健 全和完善中国垃圾无害化处理系统,为行业发展提 供了有利环境。 In March 2022, the National Development and Reform Commission ("NDRC") and the National Energy Administration ("NEA") issued the "14th Five-Year Plan on Modern Energy System Planning" ("Plan") to promote the establishment of a modern energy system, and identified this as the main goal during China's "14th Five-Year Plan" period. The Plan highlights the development of other renewable energy sources according to local conditions, the promotion of the diversified utilization of biomass energy, the orderly development of urban waste incineration and power generation, agricultural and forestry biomass power generation and biogas power generation, and the use of biomass energy for clean heating according to local conditions.

In June 2022, nine departments including the NDRC, the NEA, and the Ministry of Finance ("MoF") promulgated the "14th Five-Year Plan for Renewable Energy Development", which outlines requirements for the optimization of the development landscape for biomass power generation, the steady expansion of urban domestic waste incineration and power generation, the orderly development of biomass cogeneration, the development of biomass power generation under a market-oriented model, and the promotion of the diversified development of biomass energy.

In October 2022, the Report to the 20th National Congress of the Communist Party of China listed the promotion of the harmonious coexistence of human beings and nature as one of the essential requirements of Chinese modernization, once again emphasizing the principle that lucid waters and lush mountains are invaluable assets, and that harmonious coexistence of human beings and nature must be maintained in long term development planning.

As the domestic WTE industry enters a stage of stable development, it is expected that there will be strong focus on specialized operations. WTE enterprises will carry out business layout across the whole industry chain, overcome the geographical restrictions of the domestic market, and gradually move towards the international market. With technology advancements, China's WTE industry will usher in a new wave of growth in the future. 2022年3月,国家发展和改革委员会("发改委")、 国家能源局印发《"十四五"现代能源体系规划》(简称"规划"),推动构建现代能源体系,提出了中 国"十四五"时期现代能源体系建设的主要目标。 规划提出,因地制宜发展其他可再生能源,推进生 物质能多元化利用,稳步发展城镇生活垃圾焚烧发 电,有序发展农林生物质发电和沼气发电,因地制 宜发展生物质能清洁供暖。

2022 年 6 月,国家发改委、能源局、财政部等九部 门印发《"十四五"可再生能源发展规划》,要求 优化生物质发电开发布局,稳步发展城镇生活垃圾 焚烧发电,有序发展生物质热电联产,开展生物质 发电市场化示范,推进生物质能多元化开发。

2022 年 10 月,中国共产党第二十次全国代表大会报 告更是将促进人与自然和谐共生作为中国式现代化 的本质要求之一,再次强调必须牢固树立和践行绿 水青山就是金山银山的理念,站在人与自然和谐共 生的高度谋划发展。

随着国内垃圾焚烧发电行业步入平稳发展阶段,运营为王的专业化时代也将到来,垃圾焚烧发电企业 将进行全产业链布局,打通国内市场的地域限制, 逐渐迈向国际市场,随着技术的迭代升级,未来中 国垃圾发电行业将迎来新一波增长。



### *Chairman's Message* 主席致辞



#### **Business Review**

2022 saw the culmination of changes which were decades in the making and a once-in-a-century pandemic. In the face of a challenging international environment and the arduous tasks of economic development within China, the Company closely collaborated and strived towards the established strategic goals and achieved steady progress and sustainable development.

In 2022, the Company tapped on its advantages and mitigated its weaknesses. Focusing on the triple aspects of management improvement, planning development and problem-solving, the Company strived to ensure stable operation and development by improving quality and efficiency, keeping up with outstanding peers, promoting safety in production, launching in-depth investigations into safety hazards, rectifying identified problems and adhering to the foundation of environmentally-friendly development.

In 2022, the Company overcame difficulties in technological innovation, built a strong digital enterprise, and further stimulated enterprise vitality, creativity and market competitiveness. Led by the principle of digital reform, we continue to deepen transformation in various fields. The AI intelligent incineration project has been implemented in 13 operating enterprises. The intelligent management and control system was officially put into operation, breaking through the digital barriers of the Company. The Company completed the launch of Finance Robotic Process Automation, which significantly improved the automation level and accuracy of financial sharing payments and reduced duplication in workload. The Company further implemented its innovation-driven strategy, solved the "bottleneck" problem with scientific and technological innovation, strengthened production technology supervision, and continued to improve the quality of stock management operation.

### 业务回顾

这一年,百年变局和世纪疫情交织叠加,面对风高 浪急的国际环境和艰巨繁重的中国经济发展压力, 经过公司全体员工团结奋斗、迎难而上,公司咬定 青山不放松,朝着既定战略目标,因时因势、积极 作为、稳进提质,向着可持续发展目标奋进。

这一年,公司集中优势、补足短板,围绕管理提升、 谋划发展、聚焦问题三方面,因企施策,提质增效, 对标优化、比学赶超,着力稳经营、促发展,扎实 推进安全生产,深入开展安全审查隐患排查,敢于 动真碰硬狠抓问题整改,筑牢环保企业发展底线。

这一年,公司攻坚克难、深化创新,打造数字化强 企,进一步激发企业活力、创造力和市场竞争力。 以数字化改革为引领,持续深化各领域改革。AI 智 能焚烧项目已累计实施 13 家运行企业;智慧管控系 统正式上线投运,打通公司数字化壁垒;完成财务 共享 RPA 机器人上线,大幅提高财务共享支付自动 化水平和准确度,降低重复工作量,公司深入实施 创新驱动战略,以科技创新解决"卡脖子"问题, 强化生产技术监督,持续强化存量运营质量。 In 2022, the Company integrated resources to seize business opportunities arising from low carbon emission goals and contributed to recycling and transformation. Tapping on its unique advantages, the Company focused on WTE facilities and whilst seeking out opportunities for collaborative treatment of various types of waste, such as construction waste, industrial waste, kitchen and food waste and so on. We ventured into new fields and new avenues, vigorously developed the heat supply market, made use of slag and other recycling resources and tapped on under-utilised resources, whilst cutting operational costs. With new businesses and new technologies to offset the negative impact of the reduction in National Energy Renewable Subsidies to the Company, the Company aims for steady and long-term development.

As at 31 December 2022, the Group has invested in 25 WTE facilities, two kitchen waste treatment facilities and nine waste resource recycling projects in operation in 13 provinces, autonomous regions and centrally-administered municipalities in PRC with a total waste treatment capacity of 41,955 tonnes/day, and a total installed capacity of 805 MW. In addition, the Company has an additional five WTE facilities under construction and 19 projects in the preparatory stage in China and overseas. Taking into consideration all its projects in operation, under construction and in the planning phase, the Company's total installed waste treatment capacity will reach 62,220 tonnes/day upon completion of aforesaid projects.

#### Social responsibility

Zheneng Jinjiang Environment constantly adheres closely to the mission of "Beautifying the Cities and Making the Environment more Natural" and remains committed to becoming an outstanding guardian of the urban environment. We thoroughly implement the requirements of the Party and the country, emphasising green and low-carbon development and catering to overall needs. The Company embraces challenges and responds swiftly to in order to protect the environmental health of the cities it operates in and effectively coordinates pandemic prevention and control and its own production and management with an unwavering sense of responsibility, and demonstrates the highest commitment to protect the land.

In 2022, the Company treated a total of 12.629 million tonnes of domestic waste and generated nearly 3.76 billion kilowatt-hours of green electricity, which could fulfil the electricity needs of 2.78 million households, showing an increase of 10.9%, 9.6% and 9.9% respectively compared with the same period last year. This translates to a reduction in the usage of 1.90 million tonnes of standard coal, 4.48 million tonnes of carbon dioxide emissions, and approximately 42,000 mu of land.

这一年,公司资源整合、统筹推进,"碳"路未来抢机 遇,协同循环促转型。公司结合自身发展优势,以 垃圾焚烧发电厂为中心,争取各类协同处置固体废 弃物资源,如建筑垃圾、工业垃圾、餐厨及厨余垃 圾等;进一步开发新领域、新赛道,大力开发供热 市场,牢牢抓住炉渣等循环资源,开源节流,挖潜 增效,迎难而上,以新业务、新技术对冲国补退坡 给公司带来的不利影响,推进公司乘风破浪、行稳 致远。

截至 2022 年 12 月 31 日,集团在中国境内 13 个省、 自治区和直辖市投资并运营 25 家垃圾焚烧发电厂, 2 个餐厨垃圾处理项目和 9 个垃圾资源化设施,垃 圾处理能力达 41,955 吨 / 天,装机容量达 805WW; 另外,集团在境内外有 5 个在建的垃圾发电项目和 19 个筹建项目;待所有在建、筹建项目全部建成后 垃圾处理能力将达到 62,220 吨 / 天。

### 社会责任

浙能锦江环境始终秉承"让城市更美丽,让环境更 自然"的使命,致力于成为卓越的城市环境守护者, 坚定不移响应党和国家号召,走绿色低碳发展道路, 自觉融入中心服务大局,困难面前豁得出、关键时 刻顶得上,为保障所在城市环境卫生,以"时时放 心不下"的责任感高效统筹疫情防控和生产经营, 坚决践行守土有责、守土负责、守土尽责。

2022年,公司累计处理了1,262.9万吨生活垃圾, 产生近37.6亿千瓦时的绿色电力,可满足278万 户居民的生活用电需求,与去年同期相比分别增加 10.9%,9.6%和9.9%。经折算公司在2022年共节约 标准煤约190万吨,减少二氧化碳排放448万吨, 至少为地球节约了近4.2万亩土地。

### *Chairman's Message* 主席致辞

In 2022, the COVID-19 pandemic prevention and control regime experienced a series of changes, from strict control to regular polymerase chain reaction testing to optimize and improve prevention and control measures. The Company strictly implemented the prevailing prevention and control measures at each stage, maintained high vigilance, continuously refined the precision of control measures, coordinated and guided the pandemic prevention plans and resources of all enterprises in a timely manner, and firmly held the "frontier position" of waste treatment. Despite the challenges brought about by the pandemic, the Company protected the lives and health of employees and ensured stable production. It also assisted the local government to complete the task of harmless treatment of pandemicrelated waste and fulfilled the corporate social responsibility of an environmental protection-focused enterprise.

The Company continues to fulfil its corporate social responsibility under the guidance and leadership of the state. In September 2022, the Company's WTE projects in Zhejiang and other areas promptly responded to the natural disasters such as Typhoon "Xuanlannuo" and "Meihua" and minimized adverse impact to residents and the environment alike. In addition, in 2022, the Company has donated a total of more than RMB2.5 million worth of goods and funds to the society.

In 2022, the Company set up an environmental protection education campus and environmental protection science and technology corridor through the media of environmental protection lecture halls and cooperating with schools to provide a platform for learning and education on environmental protection and WTE facilities for the public. In 2022, a total of 12,000 people visited Zheneng Jinjiang Environment to learn about the journey of transforming domestic waste into useful resources. Due to the outstanding contributions in environmental protection education, the Company's Kunming Wuhua WTE Facility in Yunnan Province and Wenling Ecological Industrial Park in Zhejiang Province won the "Polaris Cup" as 2022 Outstanding Open-to-Public WTE Enterprises.

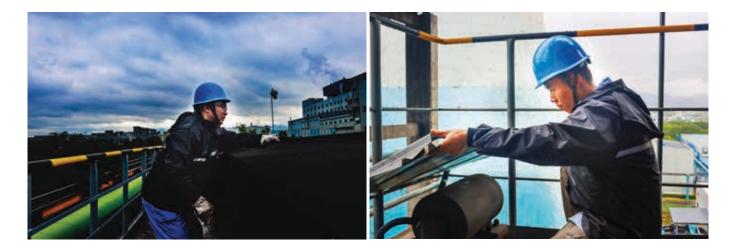


2022 年,新冠疫情防控经历了从严管控、常态化核 酸到优化完善防控措施。公司严格落实防控措施, 保持高度警惕,持续提高防控科学精准水平,统筹 各企业防疫预案、物资情况,及时指导企业的疫情 防控工作,紧紧守住垃圾处理"前沿阵地"不后退, 基本保障了疫情影响下的员工生命健康和企业的稳 定生产未受冲击,并协助当地政府完成涉疫垃圾无 害化处置任务,践行环保企业社会责任。

公司始终坚持国之大者、强化责任担当。2022年 9月,公司处在浙江等地的垃圾焚烧发电项目全力应 对台风"轩岚诺"及"梅花"的灾害天气,实现"人 员无伤害、环保有保障"等总体目标。此外,2022 年,公司累计向社会捐赠物品及资金合计250余万 元,挑梁担责坚定有力!

2022 年,公司以环保大讲堂、校企合作等形式为 载体,建立环保教育基地、环保科技长廊,为公众 提供零距离接触、感知环保知识的平台,不断加强 公众对垃圾发电厂等认识和理解。2022 年,共有 1.2万人次走进浙能锦江环境,了解生活垃圾变废为 宝之旅。因环保宣教方面突出贡献,公司旗下云南 省昆明市五华垃圾发电厂及浙江省温岭生态产业园 获得"北极星杯"2022 垃圾焚烧发电公众开放优秀 企业。





### **Future Outlook**

## Forging ahead with innovation and resolving to lay a solid foundation for high-quality development

Standing on the new runway of Chinese-style modernization, Zheneng Jinjiang Environment will actively implement the priority task of highquality development and focus on achieving the "carbon peaking and carbon neutrality" goal. The Company will undertake strong measures to fine-tune management, accelerate green and lowcarbon transformation, actively pursue reform and innovation, and coordinate efforts on resource assurance and market development. At the same time, we will seize the opportunities for cooperation in the post-COVID-19 global market, increase cross-border cooperation, continue to optimize the industry structure, break new ground to win development initiatives, and do our best to answer the calls of the era of ecological and environmental protection.

#### **Heartfelt Thanks and Well Wishes**

On behalf of the Board of Zheneng Jinjiang Environment, I would like to thank all shareholders and business partners for their strong support in the development of the Company, as well as the management and staff for their diligent performance and efforts in the past year! I wish for a more beautiful and natural environment for cities around the world!

### 未来展望

#### 锐意创新 笃定前行 厚植高质量发展根基

站在中国式现代化的新跑道上,浙能锦江环境将牢 牢把握高质量发展这个首要任务,锚定"双碳"目 标,以强有力的举措推进精细化管理,数智赋能加 快绿色低碳转型步伐,坚决树立改革创新自觉意识, 统筹抓好资源保障和市场开发。与此同时,抢抓疫 情后全球化市场合作机遇,加大"走出去""引进来" 力度,持续优化产业结构,以勇闯新路赢得发展主 动,全力答好生态环境保护时代考卷!

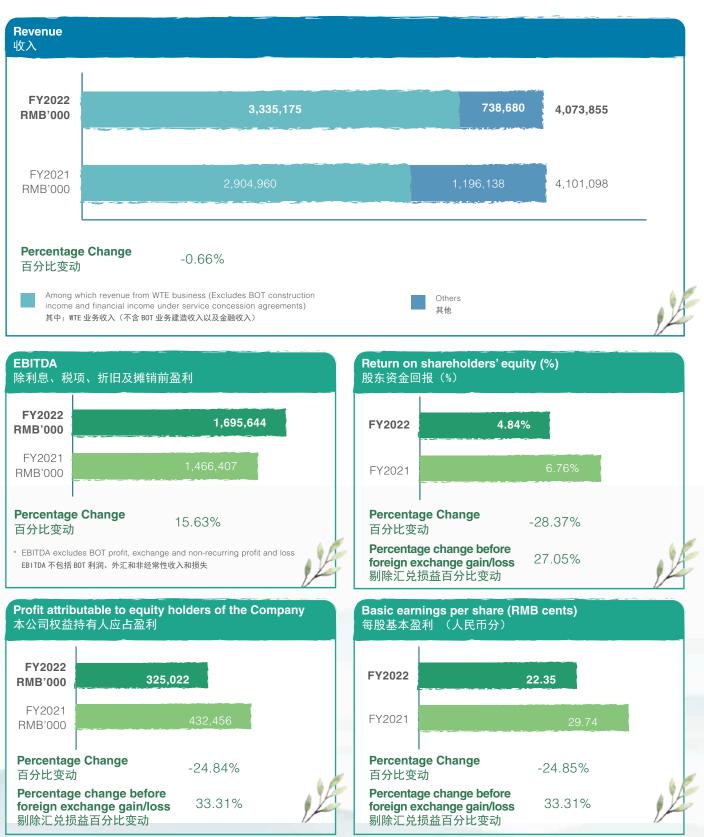
### 衷心感谢和良好祝愿

本人谨代表浙能锦江环境董事会,感谢各位股东、 商业伙伴为公司发展倾力帮助,也衷心感谢各管理 层及员工在过去一年的勤勉履职、团结奋进!由衷 祝愿全球各地城市更美丽,环境更自然!

## *Financial Highlights* 财务概况

### Results

业绩

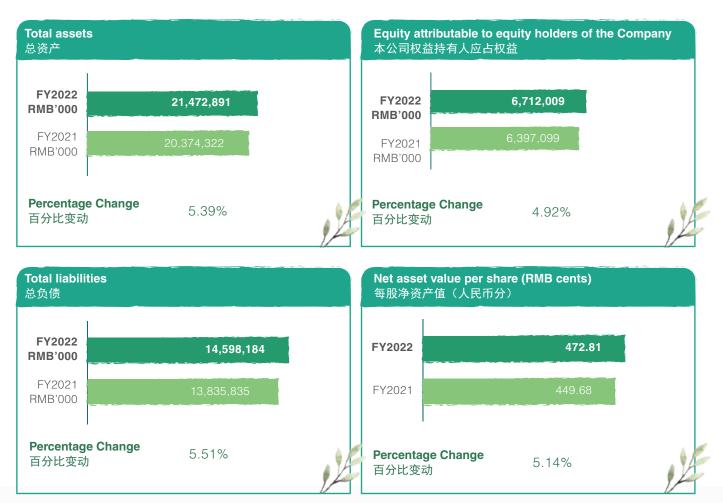


ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED

## Financial Highlights 财务概况

### **Financial Position**

财务状况





## *Corporate Milestones* 企业大事记

## 2022

### FIRST QUARTER OF 2022

- The first phase of Jinghong Jiasheng WTE Facility in Xishuangbanna Dai Autonomous Prefecture, Yunnan Province (BOT) officially started construction.
- The Group successfully secured the approval of Baoding Jinhuan WTE Project in Baoding City, Hebei Province granted by the local government, with a daily waste treatment capacity of 1,200 tonnes.
- The Group signed a supplementary agreement to the concession agreement with the government of Palembang, Indonesia. The waste treatment fee has been increased from about US\$22/tonne to about US\$28/tonne, which will be further increased yearly from its second year of operation after the project is put into operation.

### 2022 年第一季度

- 集团旗下云南省西双版纳傣族自治州景洪垃圾 发电项目(BOT)一期正式开工建设
- 成功取得当地政府授予的河北省保定高碑店 垃圾焚烧发电项目核准批复,日处理能力 1,200吨
- 集团与印尼巨港市政府签署了特许经营协议之 补充协议,协议约定垃圾处置费由原先的约 22 美元 / 吨增加至约 28 美元 / 吨,待项目投 运后将自运营的第 2 年起实现垃圾处置费逐年 增长



### Corporate Milestones 企业大事记



### **SECOND QUARTER OF 2022**

- The boiler of the second phase expansion project of Hohhot Jiasheng WTE Facility in Inner Mongolia, in which the Group has a stake, has been put into operation, increasing the Group's waste treatment capacity by 750 tonnes per day. In addition, construction of the Linzhou Kitchen Waste Treatment Project in Henan Province commenced.
- The Group's Jilin Xinxiang WTE Facility in Jilin Province and Tangshan Jiasheng WTE Facility in Hebei Province were certified as "National High-tech Enterprises", and Hangzhou Kesheng Energy Technology Co., Ltd. successfully passed the second round of review for "National High-tech Enterprise".
- The Company convened and held its FY2021 Annual General Meeting and released its FY2021 Annual Report.

### 2022 年第二季度

- 集团参股的内蒙古呼和浩特垃圾发电厂二期扩 建项目锅炉投产,增加垃圾处理能力750吨/ 日;同时,河南省林州餐厨项目开工建设
- 集团旗下吉林省长春垃圾发电厂和河北省唐山 垃圾发电厂获"国家高新技术企业"认定,杭 州科晟能源技术有限公司顺利通过"国家高新 技术企业"复审
- 公司召开 2021 年度股东大会,发布 2021 财年 年度报告



### *Corporate Milestones* 企业大事记



#### **THIRD QUARTER OF 2022**

- The Expansion Project of Yunnan Green Energy WTE Facility in Yunnan Province and the Songyuan Xinxiang Resource Recycling Project were put into operation, increasing the Group's waste treatment capacity by 750 tonnes per day.
- The Group was ranked as one of the "Top 500 Global New Energy Companies" jointly issued by China Energy News and China Institute of Energy Economics.
- The Linzhou Kitchen Waste Treatment Project in Henan Province entered into trial operation smoothly, increasing the Group's waste treatment capacity by 45 tonnes per day.

### 2022 年第三季度

- 云南省昆明市西山垃圾发电厂扩建项目和吉林 省松原垃圾收转运项目投运,增加垃圾处理能 力750吨/日
- 公司继续蝉联中国能源报和中国能源经济研究 院联手发布的"全球新能源企业 500 强"
- 河南省林州市餐厨垃圾处理项目顺利进入试运 行阶段,增加垃圾处理能力45吨/日

### FOURTH QUARTER OF 2022

- Yunnan Green Energy WTE Facility and Kunming Wuhua WTE Facility in Yunnan Province and Hankou Jinjiang WTE Facility and Wuhan Jinjiang WTE Facility in Hubei Province successfully passed the review process for accreditation as National Hightech Enterprises. Yinchuan Zhongke WTE Facility in Ningxia Hui Autonomous Region, Lianyungang Sunrise WTE Facility in Jiangsu Province and Gaomi Lilangmingde WTE Facility in Shandong Province were newly accredited as "National High-tech Enterprises".
- Tangshan Jiasheng WTE Facility in Hebei Province and Lianyungang Sunrise WTE Facility in Jiangsu Province were also awarded the title of Provincial-level Specialized Enterprise.
- The Reconstruction Project of Tianjin Sunrise WTE Facility to replace the original three furnaces and two units with two new grate furnaces and one unit commenced official construction.
- Zhongwei Kitchen Waste Treatment Project in Ningxia Hui Autonomous Region signed the investment and operation agreement with the local government, according to which the waste treatment fee is RMB294 per tonne.
- The Company was awarded "Top 50 Environmental Enterprises in China" issued by the Environment Chamber of Commerce of the All-China Federation of Industry and Commerce, and the "Top 10 Influential Enterprises of Solid Waste in 2022" issued by E20 Environmental platform.

### 2022 年第四季度

- 集团旗下云南省西山垃圾发电厂和五华垃圾发 电厂、湖北省汉口垃圾发电厂和武昌垃圾发电 厂已顺利通过国家高新技术企业复审,宁夏回 族自治区银川垃圾发电厂、江苏省连云港垃圾 发电厂和山东省高密垃圾发电厂新取得"国家 高新技术企业"认定
- 河北省唐山垃圾发电厂和江苏省连云港垃圾发电厂获得省级专精特新企业称号
- 天津垃圾发电厂改建项目正式开工建设,新建 两台炉排炉和一台机组以置换原有三炉二机
- 宁夏回族自治区中卫餐厨项目与当地政府签署 投资运营协议,约定垃圾处置费为 294 元 / 吨
- 公司荣膺由全国工商联环境商会颁发的"中国环境企业50强"荣誉,以及由E20环境平台颁发的"2022年度固废十大影响力企业"称号





## Achieving stable production and management by sustaining true innovation and improving quality and efficiency

In 2022, the impact of COVID-19 continued and the overall economic situation was not positive, environmental protection standards continued to increase, and operational pressures continued to grow. Zheneng Jinjiang Environment accurately identified changes with scientific planning, and adhered to goal-oriented and problem-oriented approaches in regular pandemic prevention and control. The Company focused on management refinements, learnt from and kept up with its competitors, provided targeted assistance to key enterprises, supervised key workstreams and sustained true innovation, stability and quality improvement, and enhanced operational efficiency.

In May 2022, according to the minutes of the local government meeting, the waste treatment fee of Qitaihe Green Energy WTE Facility in Heilongjiang Province was raised from RMB35 per tonne to RMB50 per tonne, effective from 1 January 2023. In July 2022, the fiscal subsidy for fly ash disposal of Xiaoshan Jinjiang WTE Facility in Hangzhou, Zhejiang Province was adjusted from RMB1,746 per tonne to RMB1,900 per tonne. In August 2022, the waste treatment fee of Suihua Green Energy WTE Facility in Heilongjiang Province was raised from RMB36.595 per tonne to RMB41.56 per tonne. In September 2022, Wuhu Jinjiang WTE Facility in Anhui Province received RMB10.16 million in subsidies from the new industrialization policy in support of the enterprise technology transformation project.

### 守正创新、提质增效,生产经营稳中向好

2022 年,疫情影响在延续,整体经济形势不乐观, 环保标准不断提高,运行压力不断增大。浙能锦江 环境准确识变、科学统筹,坚持在常态化疫情防控 中,将目标导向和问题导向相结合,以"三精管理" 为抓手,对标优化、比学赶超,精准帮扶重点企业, 挂牌督办重点工作,守正创新、稳进提质,努力提 升经营效益。

2022年5月,根据当地政府会议纪要,黑龙江省七 台河垃圾发电厂垃圾处理费从35元/吨上调至50 元/吨,自2023年1月1日生效;2022年7月, 浙江省杭州市萧山垃圾发电厂飞灰处置财政补贴从 1,746元/吨调整至1,900元/吨;2022年8月, 黑龙江省绥化垃圾发电厂垃圾处理费从36.595元/ 吨调整到41.56元/吨;2022年9月,安徽省芜湖 垃圾发电厂获新型工业化政策支持企业技术改造项 目补助资金1,015.83万元。

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The Group's project construction is progressing on schedule in an orderly manner. In 2022, two WTE facilities (including reconstruction and expansion project), one kitchen waste treatment project, and one resource recycling project were put into operation. The boiler of the second phase expansion project of Hohhot Jiasheng WTE Facility in Inner Mongolia, which the Group has a stake in, was put into operation, increasing the Group's waste treatment capacity by 750 tonnes per day. This will contribute to a more environmentally friendly and energyefficient waste treatment in the urban area of Hohhot and surrounding counties, promote greener initiatives within Hohhot City and improve residents' living environment at large. The Expansion Project of Yunnan Green Energy WTE Facility in Yunnan Province was put into operation, increasing the Group's waste treatment capacity by 750 tonnes per day. The Linzhou Kitchen Waste Treatment Project in Henan Province was smoothly put into trial operation, increasing the Group's waste treatment capacity by 45 tonnes per day, turning kitchen waste into urban mineral resources, and promoting the establishment of a more environmentally friendly and resource-conscious society in Linzhou City. The Songyuan Xinxiang Resource Recycling Project in Jilin Province was officially put into operation, which contributed to the improvement in the concentration rate of waste collection and transportation and enhancing the synergic disposal effect with the Songyuan Xinxiang WTE Facility. In summary, during the year under review, the Company added 1,545 tonnes per day of waste treatment capacity and 15MW of installed capacity in China. As at 31 December 2022, the waste treatment capacity of its WTE facilities (including the organic waste treatment facility) in operation reached 41,955 tonnes per day with an installed electricity generation capacity of 805MW.

In 2022, Jinghong Jiasheng WTE Facility in Xishuangbanna Dai Autonomous Prefecture, Yunnan Province and the Reconstruction Project of Tianjin Sunrise WTE Facility officially commenced construction. As at 31 December 2022, the Company has five WTE projects under construction in China and overseas, i.e. Shijiazhuang Jiasheng WTE Facility in Hebei Province, the turbine of the expansion project of Hohhot Jiasheng WTE Facility in Inner Mongolia, Jinghong Jiasheng WTE Facility in Xishuangbanna Dai Autonomous Prefecture, Yunnan Province, the Reconstruction Project of Tianjin Sunrise WTE Facility and the Gurgaon Integrated Waste Management Project, which are steadily progressing and will increase its waste treatment capacity by 3,515 tonnes per day and 153MW of installed electricity generation capacity upon completion.

集团的项目建设正按照既定计划目标有序推进,2个 垃圾焚烧发电设施(含改建和扩建项目)、1个餐厨 垃圾处理项目和1个资源化项目在2022年新投运: 集团参股的内蒙古呼和浩特垃圾发电厂扩建项目锅 炉投产, 增加垃圾处理能力 750 吨 / 日, 将为呼和 浩特市区及周边旗县的生活垃圾无害化、减量化、 资源化处置作出贡献,并助力呼和浩特市环保模范 城的创建和极大改善人居环境;云南省昆明市西山 垃圾发电厂扩建项目投运,增加垃圾处理能力750 吨 / 日; 河南省林州市餐厨垃圾处理项目顺利进入 试运行阶段, 增加垃圾处理能力 45 吨 / 日, 让"餐 厨垃圾"变"城市矿产",推动林州市生态文明建 设和资源节约型、环境友好型社会建设; 吉林省松 原垃圾收转运项目正式投运,有利于提升垃圾收运 集中率, 增强与松原垃圾发电厂的协同处置效应。 综上,于回顾年内,公司在中国国内新增垃圾处理 能力 1,545 吨 / 日及装机容量 15MW。截至 2022 年 12月31日,运营中的生活垃圾处理设施的垃圾处理 能力(含已运行的餐厨项目)达41,955吨/日,装 机容量为 805MW。

云南省西双版纳傣族自治州景洪垃圾发电项目和天 津垃圾发电厂改建项目于 2022 年正式开工建设,截 至 2022 年 12 月 31 日,公司在国内外有 5 个在建垃 圾发电项目正在稳步推进中,即河北省石家庄垃圾 发电项目、内蒙古呼和浩特垃圾发电厂扩建项目(一 机)、云南省西双版纳傣族自治州景洪垃圾发电项 目、天津垃圾发电厂改建项目和印度古尔冈垃圾一 体化项目,待投运后将新增垃圾处理能力 3,515 吨/ 日及装机容量 1530W。



The Company is committed to building an urban ecological complex, actively expanding the "Recycling and Synergy" business, disposing of all urban solid waste, striving to implement the "carbon peaking and carbon neutrality goal" and responding to the construction of a "zero-waste city". The Group successfully secured the Baoding Jinhuan WTE Project in Baoding City, Hebei Province in 2022, with a daily waste treatment capacity of 1,200 tonnes. It will jointly contribute to the "harmless, reduction and recycling" of local waste treatment together with the Gaobeidian Resource Recycling Project upon its completion. In addition, according to the Company's assessment, two projects in the preparatory stage, namely the Hunchun Green Energy WTE Project in Jilin Province, with a planned waste treatment capacity of 800 tonnes per day, and the Barueri WTE Project in Brazil, with a planned waste treatment capacity of 825 tonnes per day, no longer qualify for development. Accordingly, to further optimize the Company's structure, the Company has wound up or commenced the process for winding up the project companies for these projects in 2022. As at 31 December 2022, the Group has 15 WTE projects, 3 kitchen waste treatment projects and 1 waste resource recycling project in the preparatory stage in the PRC and overseas, which are undergoing active preparatory work and will increase the waste treatment capacity by 16,750 tonnes per day and 294MW of installed electricity generation capacity upon completion.

In summary, the waste treatment capacity will reach 62,220 tonnes per day and 1,252MW of installed electricity generation after all domestic and overseas facilities (projects in operation, projects under construction and projects in preparation) are operational.

## Vibrant development continues in the context of carbon peaking and carbon neutrality and low-carbon transformation

In 2022, under the framework of the carbon peaking and carbon neutrality strategy, and the construction of a zero-waste city, Zheneng Jinjiang Environment gradually transforms from an operator singularly focused on waste-to-energy to a comprehensive service provider for collaborative disposal of sludge, kitchen waste, industrial waste, construction waste, landfill waste, animal carcasses and other wastes. The Company actively advocates scientific and technological innovation, integrates new technologies with traditional WTE technology, constantly exhibits the advantages of collaborative cycle, and promotes development through data intelligence by focusing on building an urban ecological complex and striving to do an excellent job in preserving our valuable environment and promoting the key narrative that clear rivers and lush mountains are gold and silver mountains. 公司致力于打造城市生态综合体,积极拓展"循环、 协同"业务,处置所有城市固体废弃物,极力践行 "双碳战略目标"并响应"无废城市"的建设,于 2022年成功取得河北省保定高碑店垃圾焚烧发电项 目,日处理能力1,200吨,将在建成后与高碑店资 源化项目共同为当地垃圾处置的"无害化、减量化、 资源化"做出贡献。另外,经公司评估,处于筹建 阶段的吉林省珲春项目(垃圾处理能力800吨/日) 和巴西巴鲁埃里项目(垃圾处理能力800吨/日) 和巴西巴鲁埃里项目(垃圾处理能力825吨/日) 已不具备开发条件,为进一步优化公司结构,公司 已于2022年对这些项目的项目公司进行注销或启动 注销工作。截至2022年12月31日,集团在国内外 共有15个筹建的垃圾发电项目,3个筹建的餐厨垃 圾项目和1个筹建的垃圾资源化项目,正按计划积 极推进开工前各项准备工作,待投运后将新增垃圾 处理能力16,750吨/日及装机容量294MW。

综上,待境内外所有设施(在运项目、在建项目 及筹建项目)全部建成后的垃圾处理能力将达到 62,220吨/日,装机容量1,252WW。

双碳引领、低碳转型,发展活力持续释放

2022 年,在双碳战略和无废城市建设的大格局下, 浙能锦江环境由单一的垃圾焚烧发电运营商,逐步 转变为协同处置污泥、餐厨、工业垃圾、建筑垃圾、 填埋垃圾、病死动物等多元废物处置的综合服务商。 公司积极倡导科技创新,将新技术与传统的垃圾焚 烧发电整合起来,不断发挥协同循环优势,数智赋 能助力发展,着力打造城市生态综合体,努力做好 绿水青山就是金山银山这篇大文章。



In Wuhan City, Hubei Province, Zheneng Jinjiang Environment has created a beautiful blueprint of urban ecological complex centered on its Wuhan Jinjiang WTE Facility. Currently, the facility is making full efforts to plan and promote the renovation and expansion project. It plans to build an urban ecological complex that can efficiently and cooperatively dispose various urban wastes centered around WTE facility by 2025, to supply clean electricity and heat to the city. The waste treatment capacity of the facility will reach 5,500 tonnes per day upon completion. At the initial design stage, Zheneng Jinjiang Environment has considered using the application of AI intelligent technologies such as autonomous driving and digital twins, and introduced high-parameter equipment to significantly improve operational efficiency and achieve high-quality development of the facility. The former WTE facility is gradually transforming into a gardenstyle smart factory with ecological beauty and natural integration, contributing to the construction of a clean and beautiful city of Wuhan.

## Building a first-class technology firm with innovation and intelligence

In order to solve the difficulties in the operation of fluidized bed boilers, the Company has conducted a pilot project in Yunnan Green Energy WTE Facility in Kunming, Yunnan Province since 2017, building a waste incineration optimization engine with the help of AI intelligent means such as big data and cloud computing. Through image and video recognition, cloud computing, machine learning and other means, the first successful case of automatic boiler combustion control in the domestic WTE industry has been realized, radiating the new vitality of fluidized bed boiler. In 2022, Zheneng Jinjiang Environment has continuously increased its investment in scientific and technological innovation, and promoted the application of AI technology into the operation control process of WTE facilities.

In the digital wave, Zheneng Jinjiang Environment is following the fourstep strategy of production-level autonomous driving, equipment-level digital twins, facility-level intelligent management and enterprise-level business brain to further introduce digital technology into the whole process of enterprise operation management. This includes production management and operational analysis, promotion of the process in enterprise digital reform, digitalization of business, employees, operations, environmental protection and supply chain, improvement in the ability of organization and cooperation, and enhancement in the level of waste incineration operation and management. In 2022. the Company has completed the first phase of production-level autonomous driving and enterprise-level business brain projects, and is studying the implementation of equipment-level digital twins. It has been proved that the application of automatic combustion control system can effectively improve the level of environmental management, increase the emission stability by more than 50%, reduce the emission concentration by more than two-thirds, greatly reducing the intensity of manual operation by more than 85% and laying the foundation for the realization of unattended WTE facility. The digital reform would significantly reduce the plant electricity rate and production costs, and obtain higher output, bringing higher efficiency and quality in the inputoutput relationship for the Company.

在湖北省武汉市,浙能锦江环境已依托武昌垃圾发 电厂绘就了城市生态综合体的美丽蓝图,电厂目前 正在全力谋划、推进改扩建项目,计划于 2025 年前 以垃圾焚烧发电厂为中心,打造一座可高效协同处 置多种城市废弃物的城市生态综合体,为城市供应 清洁的电力和热力,建成后电厂的垃圾处理能力将 达到 5,500 吨/日。在设计初期,浙能锦江环境已 考虑应用自动驾驶、数字孪生等 AI 智能化技术,并 引入高参数设备,通过大幅提升运营效率,更好的 实现电厂优质发展。昔日的垃圾焚烧发电厂正逐渐 蝶变成为生态优美、自然融合的花园式智慧工厂, 为武汉市的清洁美丽城市建设赋能添彩。

#### 创新致胜、数智赋能,打造一流科技强企

为解决流化床锅炉运行难点,自 2017 年起,公司在 云南省昆明市西山垃圾发电厂试点,借助大数据、 云计算等 AI 智能化手段,打造了一个垃圾焚烧优 化引擎,通过图像视频识别、云计算、机器学习等 手段,实现锅炉自动化燃烧控制,是国内垃圾焚烧 行业首个成功案例,焕发了流化床锅炉的新活力。 2022 年,浙能锦江环境持续加大对科技创新的投入, 将 AI 技术应用推广应用到电厂运行控制过程中。

在数字浪潮中,浙能锦江环境正沿着"生产级自动 驾驶-设备级数字孪生-电厂级智慧管理-企业级 经营大脑"四步走战略,进一步将数字技术引入生 产管理、经营分析等企业经营管理全过程,推动企 业数字化改革进程,促进业务数字化、员工数字化、 经营数字化、环保数字化、供应链数字化,提升组 织协作能力,数智赋能提升垃圾焚烧运营管理水平。 2022年,公司已完成生产级自动驾驶及企业级经营 大脑一期项目,正在研究实施设备级数字孪生。事 实证明,自动燃烧控制系统的应用可有效提升环保 管理水平,排放稳定性提高达50%以上,同时排放 浓度可降低2/3以上,大幅减少人工操作强度达85% 以上,为实现无人值守垃圾焚烧工厂奠定基础。数 字化改革可大幅降低厂用电率,减少生产成本,获 得更高产出,已为公司带来了更高效率、更高质量 的投入产出关系。



In 2022, seven of the Group's subsidiaries were accredited as "National Hightech Enterprises", including four subsidiaries passing the review process for accreditation, and five subsidiaries were awarded the title of Provincial-level Specialized Enterprise. To-date, a total of 15 subsidiaries have been accredited as "National High-tech Enterprises" and a total of 5 subsidiaries have been awarded the title of Provincial-level Specialized Enterprise.

In 2022, the Company improved its core competitiveness through technological innovation, effectively organized and carried out innovation activities, jointly built core technologies, and vigorously promoted the deep integration of Industry-University-Research. We have obtained a total of 58 patents, including 8 invention patents, 49 utility patents and one software work during the year, adding up to an aggregate of 355 patents and software works, including 52 invention patents, 293 utility model patents and 10 software works.

2022 年,集团旗下 7 家企业获得"国家高新技术企 业"称号(含4家复审通过企业),5 家企业也荣获 省级专精特新企业称号。至今,集团旗下已有15家 企业获得国家高新技术企业认定,5 家企业荣获省级 专精特新企业称号。

2022 年,公司以技术创新提升企业核心竞争力,有 效组织开展创新活动,共建核心技术,大力推动产 学研深度融合,于年内新取得 58 项专利,其中发明 专利 8 项、实用专利 49 项,1 个软件著作;累计取 得 355 个专利及软著,其中 52 个发明专利,293 个 实用新型专利,10 个软件著作。

#### **Major Economic Indicators and Financial Summary**

In 2022, the Company continued to deepen its WTE business, improved its management and refined its production and operation indicators and firmly promoting the integration of digital intelligence. The Group has expanded and increased its existing capacity, leveraging on synergistic cycles, tapped potential capacity to enhance its efficiency and continuously improved its value creation ability. The profitability of its main business has been enhanced with its profit structure optimization, achieving a higher level of development quality. Along with the fullyear operation of the Linzhou Jiasheng WTE Facility in Henan Province and Leting Jinhuan New Energy WTE Facility in Hebei Province, as well as the continued increase in the Company's existing waste treatment capacity and waste treatment unit contribution, and the continued steady growth in power generation capacity, during the period covered by this report, the waste treatment amount increased by 9.0% to 12.63 million tonnes and power generated increased by 8.2% to 3.764 billion kWh, maintaining our advantageous position.

In 2022, the Company's operating revenue reached RMB4.074 billion, in line with the previous corresponding year ("FY2021"). Revenue for the WTE business increased 14.8% year-on-year ("y-o-y"), achieving RMB3.335 billion, mainly due to the increase of the Company's waste treated and power supplied, and the increase in the steam demand of customers of Zhuji Bafang Facility in Zhejiang Province. Revenue from construction services and financial income provided under buildoperate-transfer ("BOT") concession agreements ("BOT Construction") decreased by RMB97 million y-o-y to RMB638 million. The decrease was mainly due to the impact of the construction investment value and the progress of the projects under construction. The revenue from project technical and management services, equipment selection and sale and EMC business decreased by RMB360 million y-o-y to RMB101 million. The decrease was mainly due to the decrease in revenue of RMB308 million from the technical services, equipment selection and procurement services provided and a y-o-y decrease in revenue sharing ratio in the later stages of the EMC contracts as compared to FY2021. The Company continues to adhere to the principle of focusing on its main business, and the revenue contribution of each segment is as follows: the WTE business (excluding revenue from construction services provided under BOT concession agreements) accounted for 82% of total revenue, BOT Construction accounted for 16% of total revenue, and project technical and management services, equipment selection and sale and the EMC business accounted for 2% of total revenue. The gross profit contribution of WTE business (excluding revenue from construction services provided under BOT concession agreements) has increased from 53.2% in 2018 to 87.8% in 2022, which provides better quality of the Company's earnings and competitive sustainability.

### 主要经济指标及财务摘要

2022 年,公司继续深耕垃圾焚烧发电业务,做好管 理提升及生产运营指标的精细化管理,坚定推进数 智融合,以存量拓增量,协同循环,挖潜增效,价 值创造能力不断提升,主营业务盈利能力不断增强, 利润结构持续优化,发展质量更上一层楼。伴随着 公司河南省林州垃圾发电厂、河北省乐亭垃圾发电 厂的全年运营,及存量电厂垃圾处理能力及垃圾处 理单位贡献持续增加、发电量继续稳步增长,报告 期内垃圾处理量增加9.0%至1,263万吨,发电量增 加8.2%至37.64亿千瓦时,继续保持优势地位。

公司 2022 年营业收入达到 40.74 亿元, 与 2021 年 基本持平。其中,垃圾焚烧发电业务实现收入 33.35 亿元,较上年增长14.8%,主要是公司垃圾处理量、 供电量的增加,及浙江省诸暨八方电厂供热用户蒸 汽需求量增加所致; BOT 特许服务及项目建设业务 实现收入 6.38 亿元, 较 2021 年减少 0.97 亿元, 主 要是受在建项目建设投资额和进度影响;项目技术 与管理服务、设备选型和销售和 EMC 业务实现收入 1.01 亿元, 较 2021 年减少 3.60 亿元, 主要是 2022 年技术服务业务以及设备选型采购服务业务收入减 少 3.08 亿元及 EMC 业务处于合同后期收益分成比例 逐年下降影响。公司持续坚持聚焦主业原则,各板 块营业收入比重为: WTE 业务收入占营业收入 82%, BOT 业务收入占营业收入 16%, EMC 业务收入占营业 收入 2%。WTE 业务毛利占比在集团业务占比由 2018 年 53. 2% 稳步提升至 2022 年的 87. 8% 水平, 公司盈 利质量和持续性更好。

In terms of profit, the total comprehensive income attributable to shareholders in FY2022 was RMB315 million, excluding the foreign exchange effect was RMB510 million, a y-o-y increase of RMB131 million or 34.6%, mainly due to (1) the increase in gross profit from WTE business (excluding revenue from construction services provided under BOT concession agreements) by 22.4% which amounted to RMB186 million, which was offset by the decrease in gross profit from BOT construction amounting to RMB18.70 million, and the decrease in gross profit from project technical and management service equipment selection and sale, and the EMC business, amounting to RMB55.42 million. Collectively, the Group's gross profit increased by RMB111.6 million or 10.7%. Gross profit margin increased 2.9% y-o-y due to the increase in gross margin of WTE business and the continued increase in the proportion of WTE business; (2) Other income increased by RMB50.77 million y-o-y, mainly including (a) increase of RMB18.54 million in value added tax refund, (b) increase of RMB11.16 million in bank interest income, and the (c) increase of RMB25.28 million in gain on sales of scrap materials and others. (3) Loss allowance recognised on financial assets decreased by RMB16.05 million and other expenses on asset impairment losses decreased by RMB30.27 million as compared to FY2021. (4) The decrease in investment loss of associates and joint ventures increased the profit by RMB15.32 million. (5) the above increase was partially offset by the following: a) with the commencement of Linzhou Jiasheng WTE Facility in Henan Province and Leting Jinhuan New Energy WTE Facility in Hebei Province and the increase in the total scale of borrowings, finance expenses increased by RMB55.77 million y-o-y, and administrative expenses increased by RMB14.75 million, and (b) an increase in income tax expenses of RMB11.1 million resulting to y-o-y decrease in comprehensive income. In addition, due to the appreciation of the United States Dollar in 2022, the Group incurred exchange losses on its United States Dollar-denominated borrowings, resulting in a y-o-y decrease of RMB237.5 million in comprehensive income. Of the United States Dollar borrowings as of 31 December 2022, the balance of the 2020 syndicated term loan facility is approximately US\$175.82 million (RMB1,224.5 million), and the Company has repaid this syndicated term loan facility in full in end February 2023 to reduce financing costs.

The Company is investing in a number of new projects and expansion projects in China and expanding its overseas operations to achieve long-term sustainable business growth. These projects require considerable financial resources. Considering the current economic uncertainty and global recessionary risks, the Group's primary task is to manage cash flow carefully and responsibly to ensure that it meets its financial commitments. Accordingly, no dividends have been recommended in FY2022.

As of 31 December 2022, the Company's total assets were RMB21.473 billion. Net assets stood at RMB6.875 billion, with net assets per share of RMB4.728, an increase of 5.1% compared with the net assets per share of RMB4.497 at the end of 2021. The Company's liabilities to assets ratio is 68%. The Company strictly controls the amount of liabilities to ensure that the liabilities to assets ratio and related liabilities indicators are within reasonable limits.

利润方面,归属于股东的全面收益总额为3.15亿元, 剔除汇兑影响后为 5.10 亿元, 同比增加 1.31 亿元, 增幅 34.6%, 主要由于(1) WTE 业务毛利增加 1.86 亿元, 增幅 22.4%、BOT 业务毛利润(包括建造收入 及金融收入)减少 1,870 万元及技术管理服务和 EMC 业务等毛利减少 5,542 万元,综合使得公司主营业 务毛利同比增加 1.116 亿元, 增幅 10.7%; 综合毛 利率上升 2.9%, 主要是 WTE 业务毛利率上升及 WTE 业务比重持续增加综合所致; (2) 其他收入同比 增加 5,077 万元,主要是 (a) 增值税退税收入增加 1,854万元,(b)银行存款利息收入增加1,116万元, (c)废旧物资销售收入及其他综合影响增加 2,528 万元等; (3) 信用减值损失较上年减少 1,605 万 元,资产减值损失较上年减少3,027万元;(4)合 营公司投资损益变化使得综合收益同比增加 1,532 万元;及(5)以上增量因素被以下减量因素部分 抵消: (a) 随着河南省林州垃圾发电厂、河北省乐 亭垃圾发电厂正式运营及总借款规模增加,财务成 本及管理费用同比分别增加 5,577 万元和 1,475 万 元, (b) 所得税费用同比增加1,110万元使得综合 收益同比减少。此外,因 2022 年美元升值,本集团 美元借款产生汇兑损失,引起全面综合收益同比减 少 2.375 亿元。截止 2022 年 12 月 31 日的美元借款 中, 2020年银团贷款余额约17,582万美元(人民币 12.245 亿元),截止2023 年2月末公司已经全额偿 还该银团贷款以降低融资成本。

本集团正在中国境内投入多个新项目与改扩建项目, 并扩大海外业务,以实现业务的可持续和长期增长, 这些项目需要可观的财务资源,同时鉴于目前经济 的不确定性和全球经济衰退的风险,集团的首要任 务是谨慎和负责任地管理现金流,以确保履行其财 务承诺,因此本报告期不建议分红。

截止 2022 年 12 月 31 日,公司总资产为人民币 214.73 亿元,净资产为人民币 68.75 亿元,每股净 资产人民币 4.728 元,较 2021 年底的每股净资产 人民币 4.497 元增加 5.1%,公司资产负债比率为 68%,公司将严格控制负债水平,确保资产负债率以 及相关负债指标在合理范围内。



In FY2022, the Company's net cash inflow from operating activities (excluding the BOT business expenditures classified as intangible assets amounting to RMB448 million) was RMB1.880 billion, mainly due to the increase of cash flow caused by the increases in operating income and recovery of the historical state subsidy electricity payments and receipt of related party contract energy management contract fees in 2022. The net cash outflow in investment activities (including intangible asset expenditure of BOT project) was RMB1.231 billion, mainly used for the construction of BOT projects (Songyuan Xinxiang Resource Recycling Project in Jilin Province, Expansion Project of Yunnan Green Energy WTE Facility and Jinghong Jiasheng WTE Project in Xishuangbanna Dai Autonomous Prefecture, Yunnan Province and other projects), expansion project of Shijiazhuang Jinhuan Resource Recycling Project in Hebei Province, Reconstruction Project of Wuhu Jinjiang WTE Facility in Anhui Province, Baishan Green Energy WTE Facility in Jilin Province, Shijiazhuang Jiasheng WTE Facility in Hebei Province, and other projects. The net cash outflow from financing activities was RMB412 million.

The Company adopts the principle of prudence in cash and financial management, properly managing risks and reducing capital cost. Operating capital mainly comes from internal cash, operating cash flow and loans from financial institutions. Meanwhile, the Company effectively controls capital expenditure and ensures the stable development of the environmental protection business. As of 31 December 2022, the Company's cash position remained stable, with a cash balance of RMB627.0 million.

公司 2022 年经营活动所得(不含 BOT 项目的无形资 产支出 4.48 亿元)净现金流入为人民币 18.80 亿 元,主要得益于收益增加引起的现金流增加及公司 于 2022 年收回历年国补电费款及关联方合同能源管 理费;投资活动(含 BOT 项目的无形资产支出 4.48 亿元)净现金流支出为人民币 12.31 亿元,主要用 于吉林省松原垃圾发电厂收转运项目、云南省西山 垃圾发电厂扩建项目、西双版纳傣族自治州景洪垃 圾发电项目等 BOT 项目实施,河北省石家庄藁城资 源化项目、安徽省芜湖垃圾发电厂改建项目、吉林 省白山垃圾发电厂及河北省石家庄垃圾发电项目等 支出;融资活动净现金支出为人民币 4.12 亿元。

公司对现金及财务管理采取审慎原则,妥善管理风 险及降低资金成本,运营资金主要来自自有现金、 运营现金流及金融机构贷款,同时公司对资本开支 进行有效控制,并确保环保业务的稳定发展。截止 2022 年 12 月 31 日,公司现金状况维持稳健,持有 现金结余人民币 6.270 亿元。

### **Target Strategy**

In an era full of challenges and hopes, Zheneng Jinjiang Environment sets out on a journey with forward-looking vision, undertakes to thrive despite the difficulties, pursues innovation in the century of changes, moves forward firmly in the face of challenges, and strives to promote the steady growth of business performance by focusing on the strategic goal of high-quality development. The Company will draw a comprehensive blueprint, vigorously exploring the three major spaces of "technology and management", "resources and products" and "domestic and overseas", riding on the wave of digitalization to re-energise, re-vialise and expand, on a three-year "Blueprint Action" throughout the Group. The Company undertakes to fully stimulate potential and reshape core competitiveness. We have the courage to carry out self-revolution, optimize the industry structure, actively plan for the future, and make green contributions to the comprehensive development of a modern socialist country.

#### **Environmental and National Policy**

In February 2022, the General Office of the State Council forwarded the "Guiding Opinions on Accelerating the Construction of Urban Environmental Infrastructure" (Guobanhan [2022] No. 7) issued by the NDRC and other departments, which will promote synergies in reducing pollution and carbon emissions, continuously improve the quality of the ecological environment and achieve carbon peaking and carbon neutrality.

In March 2022, the NDRC, the NEA and the Ministry of Finance jointly issued the "Notice on Carrying out Self-Inspection of Renewable Energy Power Generation Subsidies", requiring a nationwide verification of renewable energy power generation subsidies to further identify the base amount of subsidies, which is conducive to standardizing the management of the use of subsidy funds and improving the utilization rate.

In June 2022, seven departments including the Ministry of Ecology and Environment and the NDRC jointly promulgated the "Implementation Plan for Synergistic Efficiency of Pollution Reduction and Carbon Reduction", taking a collective step to promote the synergy of pollution reduction and carbon reduction. This is an important part of the policy framework of carbon peaking and carbon neutrality, and serves to optimize ecological environment governance and contributes towards the construction of "DoubleCarbon Demonstration City".

In September 2022, the NDRC, the Ministry of Housing and Urban-Rural Development of the People's Republic of China, and the Ministry of Ecology and Environment of the People's Republic of China jointly promulgated the "Sludge Disposal and Resource Recovery Utilization Implementation Scheme" (the "Scheme"), which stipulated that the increase in harmless treatment capacity of sludge in China shall be not less than 20,000 tonnes per day by 2025, the rate of harmless treatment of sludge in urban areas shall be more than 90%, or more than 95% in respect of prefectural level and above cities. In addition, the Scheme set out requirements to optimize the sludge treatment structure, orderly promote sludge incineration treatment, and promote energy and material recovery and utilization.

### 目标策略

在这个充满挑战和希望的时代,浙能锦江环境以展 望开启新征程,犯其至难而图其致远,于百年变局 中锐意创新,在多重考验中笃定前行,紧紧围绕高 质量发展战略目标,努力促进经营业绩稳步增长。 公司将一张蓝图绘到底,大力挖掘"技术+管理"、 "资源+产品"、"国内+国外"三大空间,以数 字化为稳健发展增强新动能、注入新活力、拓展新 空间,并在全集团推行为期三年的"蓝图行动", 充分激发潜力,重塑核心竞争力,勇于自我革命、 优化产业结构、积极布局未来,为全面建设社会主 义现代化国家开好局起好步做出绿色贡献。

### 环境及国家政策

2022 年 2 月,国务院办公厅转发国家发展改革委等 部门《关于加快推进城镇环境基础设施建设的指导 意见》(国办函〔2022〕7 号),对推动减污降碳协 同增效,促进生态环境质量持续改善,助力实现碳 达峰碳中和具有重要意义。

2022年3月,国家发改委、能源局以及财政部联合 下发《关于开展可再生能源发电补贴自查工作的通 知》,要求在全国范围内开展可再生能源发电补贴 核查工作,进一步摸清可再生能源发电补贴底数, 这有利于规范补贴资金使用管理,提高使用率。

2022 年 6 月, 生态环境部、国家发展改革委等七部 门联合印发《减污降碳协同增效实施方案》, 对推 动减污降碳协同增效作出系统部署, 这是碳达峰、 碳中和政策体系的重要组成部分, 对优化生态环境 治理, 形成协同推进工作格局, 助力"双碳示范城" 建设具有重要意义。

2022 年 9 月,国家发改委、住房和城乡建设部、生态环境部联合印发《污泥无害化处理和资源化利用 实施方案》("实施方案"),实施方案提出,到 2025 年,全国新增污泥无害化处置设施规模不少于 2 万吨/日,城市污泥无害化处置率达到 90% 以上, 地级及以上城市达到 95% 以上。此外,实施方案明 确要优化污泥处理结构,有序推进污泥焚烧处理, 推动能量和物质回收利用。



In November 2022, the NDRC, the Ministry of Housing and Urban-Rural Development, the Ministry of Ecology and Environment, the Ministry of Finance, and the People's Bank of China jointly issued the "Guiding Opinions on Strengthening the Construction of County-level Domestic Waste Incineration and Treatment Facilities" (Development and Reform, Environment and Capital [2022] No. 1746, "Guiding Opinions"), which seeks to accelerate the construction of domestic waste incineration and treatment facilities in county-level regions (including county-level cities). According to the Guiding Opinions, waste incineration facilities should be built to the greatest extent possible in the Yangtze River Economic Zone, the Yellow River Basin, cities which regulate household waste sorting by classifications, "waste-free cities" under construction and other county-level areas which meet the relevant conditions. In January 2023, the "Implementation Plan for Improving the Weak Points" of County-level Domestic Waste incineration and Treatment Facilities" was further issued, which set new requirements for promoting the construction of domestic waste incineration and treatment facilities in county-level areas.

China's WTE industry has matured and transitioned into an upgrading and transformation phase driven by a series of national policies. The market competition has shifted from the early capacity expansion competition to more refined competition that is driven by operational management strategies.

Zheneng Jinjiang Environment actively explores the transformation of new energy business, seeks new profit growth opportunity, promotes collaborative development between businesses, enhances the advantages of the circular economy, and leverages Al to further reduce cost and increase efficiency, thereby facilitating the steady and healthy development of the Company. 2022年11月,国家发展改革委、住房和城乡建设部、 生态环境部、财政部、中国人民银行五部门联合印 发《关于加强县级地区生活垃圾焚烧处理设施建设 的指导意见》(发改环资〔2022〕1746号,"《指 导意见》"),部署加强县级地区(含县级市)生 活垃圾焚烧处理设施建设工作。《指导意见》提出, 长江经济带、黄河流域、生活垃圾分类重点城市、 "无废城市"建设地区以及其他地区具备条件的县 级地区,应建尽建生活垃圾焚烧处理设施。2023年 1月进一步发布《加快补齐县级地区生活垃圾焚烧处 理设施短板弱项的实施方案》,对推动县级地区生 活垃圾焚烧处理设施建设作出新的要求。

中国垃圾焚烧发电行业已经趋于成熟,在国家一系列政策的推动下,行业整体进入了升级改造期。尤 其是在市场竞争模式上,从早期的产能扩张型的竞 争转向以运营管理为驱动的精细化竞争。

浙能锦江环境积极探索新能源业务转型,寻求新的 利润增长点,推动业务之间的协同发展,增强循环 经济优势,利用 AI 数智化进一步降本增效,推动公 司平稳健康发展。

#### **Major Risks and Uncertainties**

In recent years, the Chinese government has continuously issued policies related to green and low-carbon initiatives, pollution reduction and carbon reduction, and the WTE industry has entered an era of excess capacity, with increasingly strict environmental regulations and intensifying competition in the industry. It has shifted from aggressive growth focused on market share to operational and managerial strategies. Under the background of supply-side reform, the government and customers have put forward higher requirements, under which the Company must conduct construction with higher standards, provide services with higher quality, and carry out operations with higher efficiency in order to undertake further development and procure higher market share.

The reduction of National Renewable Energy Subsidies ("National Subsidies") was implemented. In 2023, Unit 1 and Unit 2 turbines of Hangzhou Xiaoshan Jinjiang WTE Facility and Zhuji Bafang Facility in Zhejiang Province will implement the benchmark price of coalfired power generation in Zhejiang Province due to the 15 years of subsidized electricity from the date of grid connection. The National Subsidies of Unit 1 and Unit 2 turbines of Lianyungang Sunrise WTE Facility in Jiangsu Province and Wuhan Jinjiang WTE Facility in Hubei Province and Unit 1 turbine of Hankou Jinjiang WTE Facility in Hubei Province will expire in 2024 and 2025 gradually, which will affect the Company's profit structure. With the decline in economic growth and population growth, and the implementation of waste sorting policies, similar projects in the same region are springing up and being put into operation. This has made the market more competitive, resulting in a lack of capacity utilization and idle assets from a resources perspective. As resource and operation become pertinent, the Company will focus on improving quality and efficiency, transformation and upgrading, reform and empowerment, innovation and collaboration through "technology and management".

As previously disclosed, the Old Kunming Wuhua WTE Facility in Kunming, Yunnan Province had ceased operation and the Company is still following up on the progress of compensation for its closure. The local government has engaged a third-party asset appraisal company to conduct an overall appraisal of the assets of the Old Kunming Wuhua WTE Facility. The Group is still in negotiation with the local government on the compensation for the closure of the Old Kunming Wuhua WTE Facility, and the compensation agreement is currently expected to be signed by the end of 2023.

The Company strives to promote steady operation, establish a firm and unwavering sense of responsibility and strong and uncompromising ethical standards. In accordance with the prior control requirements of "management first, pass forward, measure ahead", the Company improves the level and ability of safety and environmental protection management, and continuously strengthen risk prevention and control. The Company will undertake to improve the internal audit system, enhance the supervision function with an objective-oriented mindset, treat audit as a line of defense against risks, and implement measures to identify issues with close supervision whilst propose rectification steps with a facilitative attitude. The Company will adhere to strict anti-corruption guidelines and give strong emphasis to disciplinary standard-setting to maintain the overall harmony and stability of the enterprise.

### 主要风险及不确定性

近年来,中国政府不断发布与绿色低碳、减污降碳 相关政策,垃圾焚烧发电行业进入存量时代,环保 监管要求日益趋严,行业竞争态势不断加剧,已由 "跑马圈地"转向"运营为王"。供给侧改革的大 背景下,政府和用户提出更高要求,公司必须以更 高标准进行建设、更高品质提供服务、更高效率开 展运营,才能获得更大发展空间,才有机会扩大市 场占有率。

国补退坡靴子落地。2023 年集团旗下浙江省杭州萧 山垃圾发电厂1#2# 机组及诸暨八方电厂1#2# 机组 因自并网之日起满15 年补贴电量,上网电价执行浙 江省当期燃煤发电基准价。江苏省连云港垃圾发电 厂1#2# 机组、湖北省武昌垃圾发电厂1#2# 机组和 湖北省汉口垃圾发电厂1# 机组国补将于2024 年、 2025 年陆续到期,将影响公司利润结构。从资源角 度看,伴随经济增速的下行,人口增速减缓,垃圾 分类政策推行,同区域内同类项目如雨后春笋般达 产投运,市场竞争日益激烈,产能利用不足导致资 产闲置。面对"资源为王""运营为王"时代的来临, 公司将通过"技术+管理",走好提质增效、转型 升级、改革赋能、创新驱动、合作提升之路。

如之前所披露,云南省昆明老五华垃圾发电厂现已 关停,公司仍在持续跟进关停补偿工作的推进进度。 当地政府聘请了第三方资产评估公司对昆明老五华 电厂的资产进行了整体评估,目前仍在与昆明市政 府进行进一步沟通,预计将在 2023 年底前签署关停 补偿协议。

公司着力推进稳健经营,树牢"时时放心不下"的 责任意识和"100-1=0"的底线意识,以"管理为先, 关口前移,措施在前"的事前管控要求,不断提升 安全环保管理水平和能力,持续强化风险防控意识, 进一步强化内部审计体系建设,以目标为导向,强 化监督督导职能,将审计作为风险防线,推行"调 研式监督发现问题,建议式要求提出整改",坚持 以严的基调强化正风肃纪反腐,将纪律建设摆在更 加突出位置,维护企业大局和谐稳定。



#### **Future Development**

In an era full of challenges and hopes, Zheneng Jinjiang Environment has boosted confidence exercises to its initiatives, and assists the cities where its facilities are located to achieve fast and high-quality development, while realizing its own growth in a green, low-carbon and sustainable manner. It is determined to innovate in the changing times and move forward firmly in navigating multiple tests.

In 2023, Jinghong Jiasheng WTE Facility in Yunnan Province will be put into operation as scheduled. The reconstruction projects of Tianjin Sunrise WTE Facility and Wuhan Jinjiang WTE Facility in Hubei Province and Baoding Jinhuan WTE Project in Hebei Province are all progressing in an orderly manner. At the same time, facing a gradual slow-down in the domestic WTE project market, in 2023, Zheneng Jinjiang Environment will continue to strive to make good use of the international market and foreign resources, and scientifically promote the investment and construction of Palembang Project in Indonesia and Gurgaon WTE Project in India.

In 2023, the Company will continue to focus on technology and management as the starting point, set clear goals for management and straighten out processes systematically. Leveraging on digitizationinduced transformations, the Company hopes to refine operational, managerial and organisational structures. The Company will further promote the research and development of equipment digital twins and the second phase of intelligent control and management system. The Company also plans to comprehensively strengthen the operational mindset of the management personnel by drawing from comparables and implementing strict management, to achieve "big output" with "small input" and comprehensively improve the quality of enterprise management. At the same time, the Company will continue to support the "first priority of development" with innovation. In relation to any bottlenecks in the process of production and development, the Company will conduct systematic research, explore and digest all reasonable technology applications, so as to maximise input-output efficiencies while sticking to the bottom line of environmental protection and safety. The Company will also consciously recruit technical talents to ensure long-term sustainable development.

### 未来发展

在这个充满挑战和希望的时代,浙能锦江环境提振 信心,发挥主观能动性,助力所在城市又好又快发 展的同时,实现自身绿色低碳可持续发展,于百年 变局中锐意创新,在多重考验中笃定前行。

2023 年,浙能锦江环境旗下云南省景洪垃圾焚烧发 电项目将如期投产。天津垃圾发电厂改建项目、湖 北省武汉市武昌垃圾发电厂改建项目、高碑店垃圾 发电项目等均在有序推进中。同时,面对国内增速 逐渐放缓的垃圾焚烧项目市场,浙能锦江环境正持 续发力,做好利用国际市场和国外资源的这篇大文 章,科学推进印尼巨港项目、印度古尔冈电厂项目 的投资建设,做到国内国际"两条腿"走路。

2023年,公司将继续以"技术+管理"为抓手,向 技术创新要动力,向"三精管理"要活力。系统理 顺管理,算好经济账,以数字化改革撬动经营精益 化、管理精细化、组织精健化,深入推进设备数字 孪生、智慧管控二期系统等研发实施,全面强化运 营企业管理人员经营意识,比学赶超、帮扶提升、 对标一流,强化从严管理,以"小投入"促进"大 产出",全面提升企业经营质量。同时,公司将继 续以创新支撑"发展第一要务",针对生产及发展 过程中"卡脖子"环节,系统布局研究,合理探索、 消化各类技术应用,做到"拿得来、吃得下、用得 好",在确保守牢环保安全的底线情况下,追求投 入产出最大化,进一步技术性人才储备,为公司发 展提供源头活水。

In 2023, Zheneng Jinjiang Environment will seize the further development opportunities available in these times and seek benefits from synergistic cooperations. With a primary focus on WTE facilities, the Company will expand and seek collaborations in the disposal of sludge, kitchen waste, food waste, industrial waste, construction waste and other municipal solid waste resources, and export clean power and heat sources to the surrounding areas, gradually transforming into the dual center of energy and environment for the city. The Company will prepare for the development of the Wuhua Urban Ecological Complex Project around the Kunming Wuhua WTE Facility and invest in and construct the kitchen collaborative disposal project around the Zhongwei Green Energy WTE Facility, and vigorously expand the heat supply markets in Wuchang, Tangshan, Shijiazhuang, Gaobeidian, Changchun City, etc., so as to further seize the benefits of circular economy and fully stimulate the vitality of stock assets.

In 2023, Zheneng Jinjiang Environment will continue to strive to make good use of the international market and foreign resources, and scientifically promote the investment and construction of Palembang Project in Indonesia and Gurgaon WTE Project in India. Facing a gradual slow-down in the domestic WTE project market, venturing overseas would prevent the Company from being complacent and allow the Company to keep up with the latest market trends. At the same time, in the domestic market, Zheneng Jinjiang Environment will carry out a three-year "Blueprint Action" in the Group, comprehensively revamp the assessment and incentive mechanism, determine targets based on the historical performance from the bottom up, and put forward the enhancement and development action plan. The Company will treat this as an important aspect of management selection and efficiency boosting, all of which contribute towards enterprise competitiveness.

On the new journey of the new era, Zheneng Jinjiang Environment will continue to lay a solid foundation for high-quality development, constantly stimulate aggressive reform and innovation, encourage efforts to overcome difficulties, and adopt a down-to-earth attitude and drive, to fully realize the qualitative enhancement and quantitative growth. The Company will also actively discharge its social responsibility of environmental protection enterprises, and fully cooperate with the strategic layout of the Zheneng Group's new energy sectors to meet people's aspirations for a better life.

2023年,浙能锦江环境将进一步抓住时代赋予的发展机遇,向协同要效益,以垃圾焚烧发电厂为中心, 拓展资源市场,协同处置污泥、餐厨、厨余、工业 垃圾、建筑垃圾等多种城市固体废物资源,并为周 边区域输出清洁的电力、热源,逐渐转型成为所在 城市能源与环境双中心。公司将围绕五华垃圾发电 厂,积极争取储备开发五华城市生态综合体项目, 围绕中卫垃圾发电厂投资建设餐厨协同处置项目, 同时大力拓展武昌、唐山、石家庄、高碑店、长春 等供热市场,进一步抢抓循环经济红利,全面激发 存量资产活力。

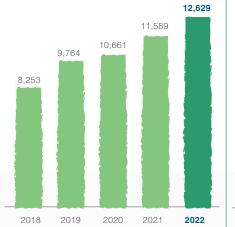
与此同时,自 2023 年开始,浙能锦江环境将在全系 统推行为期三年的"蓝图行动",自下而上结合实 际确定目标,并提出相应提升及发展行动方案,全 面深化考核、激励机制,并以此为基础,作为筛选 干部的重要手段,全面提升效益,最终汇聚成强大 的企业竞争力。

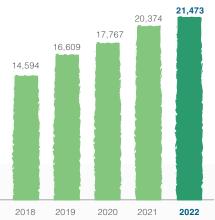
新时代新征程上,浙能锦江环境将继续"咬定青山 不放松",厚植高质量发展根基,不断激发改革创 新的闯劲,激扬攻坚克难的拼劲,铆足脚踏实地的 干劲,全面实现质的有效提升和量的合理增长,切 实发挥环保企业的社会责任,全力配合浙能集团布 局新能源板块的战略布局,在努力满足人民对美好 生活的向往中彰显新担当。



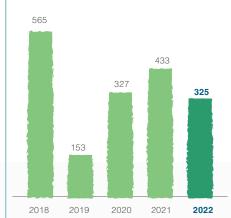


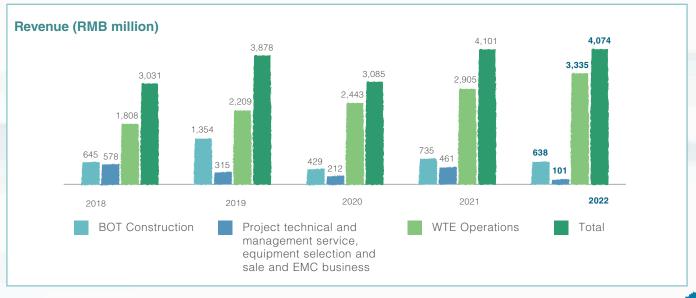
### Waste Treated ('000 tonnes)





### Net profit attributable to owners of the Company (RMB million)





## Our WTE Network in the PRC

中国垃圾焚烧发电网络

As at 31 December 2022

### **GROWING CAPABILITIES AND STRENGHTS**

With 25 WTE facilities (excluding the waste resource recycling projects and kitchen waste treatment projects) already in operation and morein the pipeline, we are steadily expanding our capacity to deliver cleaner energy. We are working to grow both breadth and depth of our business via diversifying in the WTE value chain.

### **FACILITIES IN OPERATION**



ZHENGZHOU XINGJIN 河南郑州荥阳



TIANJIN SUNRISE 天津



WUHU JINJIANG 安徽芜湖



LIANYUNGANG SUNRISE 江苏连云港



JILIN XINXIANG 吉林长春



WUHAN JINJIANG 湖北武汉武昌



ZIBO GREEN ENERGY 山东淄博淄川



SUIHUA GREEN ENERGY 黑龙江绥化



WENLING GREEN ENERGY 浙江温岭



HOHHOT NEW ENERGY 内蒙古呼和浩特



ZIBO NEW ENERGY 山东淄博临淄



TANGSHAN JIASHENG 河北唐山



HENAN LINZHOU 河南林州



## *Our WTE Network in the PRC* 中国垃圾焚烧发电网络

As at 31 December 2022



XIAOSHAN JINJIANG 浙江杭州萧山



HANKOU JINJIANG 湖北武汉汉口



ZHUJI BAFANG 浙江诸暨



YUNNAN GREEN ENERGY 云南昆明西山



KUNMING WUHUA 云南昆明五华



YINCHUAN ZHONGKE 宁夏银川



QITAIHE GREEN ENERGY 黑龙江七台河



ZHONGWEI GREEN ENERGY 宁夏中卫



BAISHAN GREEN ENERGY 吉林白山



GAOMI LILANGMINGDE 山东高密



SONGYUAN XINXIANG 吉林松原



LETING JINHUAN 河北乐亭



**BAODING JINHUA WTE FACILITY** 

武汉市绿色环保能源有限公司(改建项目)

保定锦环新能源科技有限公司

10. WUHAN JINJIANG WTE FACILITY RECONSTRUCTION PROJECT

- YAN'AN GUOJIN WTE FACILITY 延安国锦环保能源有限责任公司
- LINZHOU JIASHENG WTE FACILITY 2ND PHASE 林州市嘉盛新能源有限公司(二期项目)
- ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED

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## *Our Overseas WTE Network* 海外垃圾焚烧发电网络\*

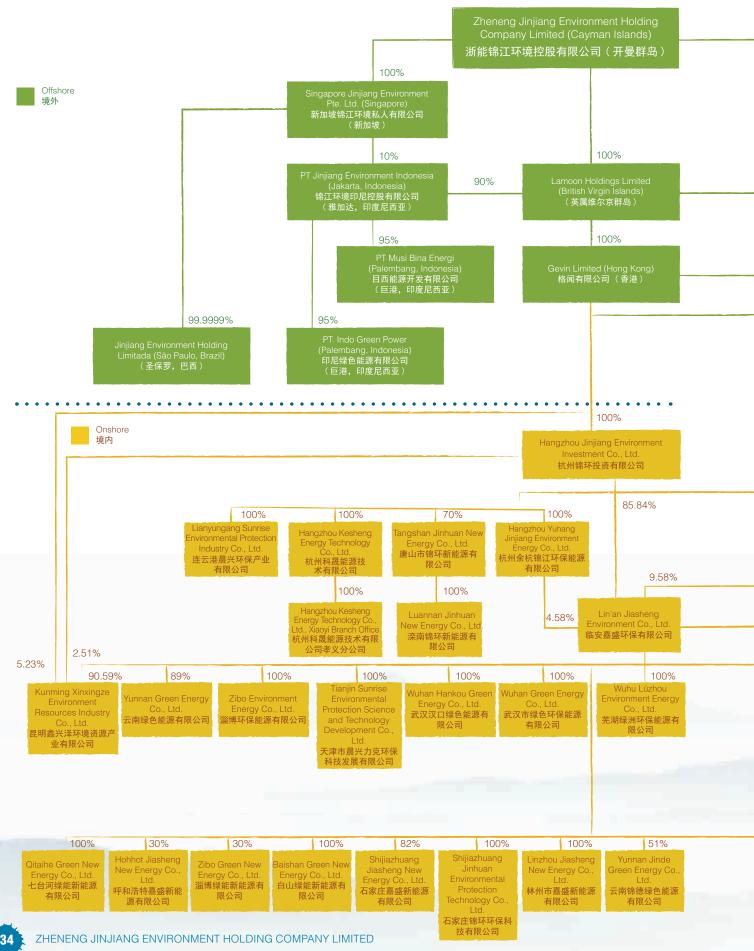
As at 31 December 2022



\* Our WTE Network in the PRC and overseas showed here exclude the waste resource recycling projects and kitchen waste treatment projects. 此处展示的中国及海外垃圾焚烧发电网络不含垃圾资源化、餐厨项目。

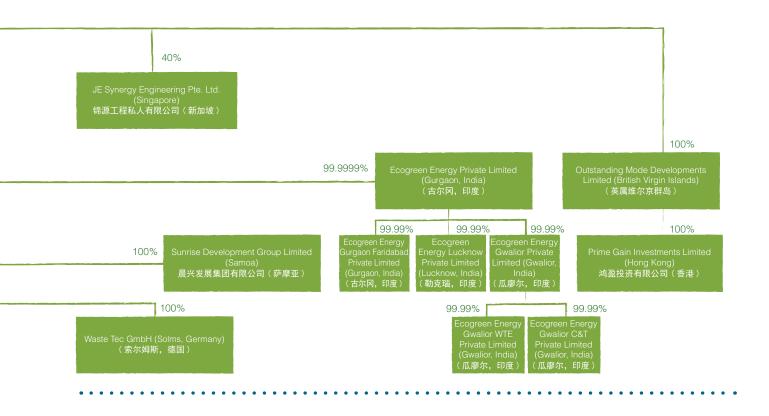


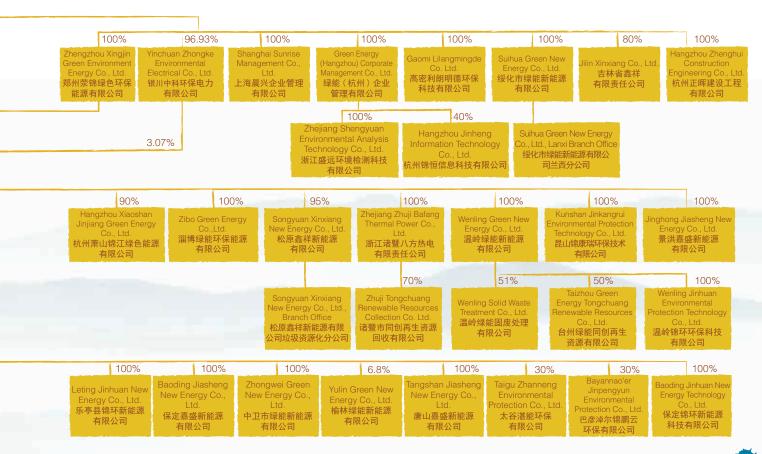
As at 31 December 2022



Corporate Structure 公司结构

As at 31 December 2022





# Board of Directors 董事会



WEI Dongliang (韦东良) Executive Chairman

WEI Dongliang (韦东良) is the Executive Chairman of our Company. Mr. Wei is responsible for the overall strategic planning and management of the Group.

Mr. Wei has more than 20 years of working experience. Prior to joining our Group, Mr. Wei was Deputy General Manager of Zhejiang Zheneng Lanxi Power Generation Co., Ltd. (浙江浙能兰溪发电有限 责任公司) from September 2006 to February 2010. From February 2010 to April 2011, Mr. Wei was Deputy General Manager of Zhejiang Water Resources and Hydropower Investment Group Co., Ltd. (浙江省水利 水电投资集团有限公司). From April 2011 to September 2016, he was Deputy Director and Director of Asset Management Department of Zhejiang Provincial Energy Group Co., Ltd. (浙江省能源集团有限公司). From September 2016 to September 2019, he served as Director and General Manager of Zheneng Capital Holdings Co., Ltd. (浙能资本控股有限公司).

Mr Wei graduated from Zhejiang University (浙江大学) with a Bachelor of Chemical Engineering (Industrial Automation) (化学工程学系工业自动化专业) in August 1996 and a Master of Business Administration (工商 管理专业硕士) in March 2004. He is also conferred Advanced Economist (Corporate Management) by the Zhejiang Province Human Resources and Social Security Department(浙江省人力资源和社会保障厅).



WANG Ruihong(王瑞红) Executive Director and Deputy General Manager

WANG Ruihong (王瑞红) is an Executive Director and Deputy General Manager of our Company and is responsible for general administrative management, market branding and legal compliance of our Group. Mr. Wang joined our Group in June 2004 and was Deputy General Manager of Green Energy Hangzhou. He was appointed as a Director of our Company in December 2010.

Mr. Wang has more than 30 years of experience in accounting and corporate finance. Prior to joining our Group, Mr. Wang took up various positions at Zhejiang Institute of Silk Textile (浙江丝绸工 学院) (currently known as Zhejiang Sci-Tech University (浙江理工 大学)) from July 1985 to March 1999, including Deputy Director of Infrastructure Construction Department (基建处), Deputy Director of Finance Department (财务处) and Director of State Owned Asset Management Office (国有资产管理办公室). From March 1999, Mr. Wang took up several positions at Jinjiang Group, including Director of Finance Department and Accounting Department, Assistant to General Manager, Deputy General Manager and Chief Officer of Inspection and Evaluation Department (稽查评估中心) and General Management Center (综合管理中心) and has been Chief Director of Office (办公室) since 2013. Mr. Wang was also Chairman of the board of directors of Zhejiang Huadong Aluminium Co., Ltd. (浙江华东铝业有限公司), a non-ferrous metal smelting and processing company and a subsidiary of Jinjiang Group, from December 2013 to June 2016.

Mr. Wang received a Bachelor's Degree in Economics (Infrastructure Construction Finance and Credit) (基建财务信用专业经济学学士学位) from the Shanghai Institution of Finance and Economics (上海财经学院) (currently known as Shanghai University of Finance and Economics (上海财经大学)) in July 1985 and is registered as an Accountant by the Zhejiang Province Department of Ministry (浙江省财政厅). He is also conferred Advanced Economist (Corporate Management) by the Zhejiang Province Human Resources and Social Security Department (浙江省人力资源和社会保障厅). From September 2009 to March 2010, Mr. Wang also attended the Environmental Protection Seminar for Senior Management organised by the Department of Environmental Science and Engineering of Tsinghua University. Mr. Wang also completed the Senior Management Research Class in Environmental Protection (环保高级职业经理人) held by All-China Environment Federation (中华环保联合会) in March 2010.

ANG Swee Tian Lead Independent Director

**Ang Swee Tian** is the Lead Independent Director of our Company. Mr. Ang is an Independent, Non-Executive Director of public listed companies, Cosco Shipping International (Singapore) Co., Ltd. and iWOW Technology Ltd. He also serves as a Non-Executive Director of a non-listed company, ICE Futures Singapore Pte. Ltd.

Mr. Ang was the President of the Singapore Exchange Ltd ("SGX") from 1999 to 2005 during which he played an active role in successfully promoting SGX as a preferred listing and capital raising venue for Chinese enterprises. Mr. Ang also played a pivotal role in establishing Asia's first financial futures exchange, the Singapore International Monetary Exchange ("SIMEX") in Singapore in 1984. Following his retirement in January 2006, Mr. Ang served as a Senior Advisor to SGX until December 2007.

In March 2007, Mr. Ang became the first person from an Asian stock and futures exchange to be inducted into the international Futures Industry Association's Futures Hall of Fame, which was established to honour and recognise outstanding individuals for their contributions to the futures and options industry. In December 2014, he was also inducted into the SIMEX Hall of Fame which was introduced by SGX to honour the pioneers who laid the foundation for the success of the Singapore futures industry.

Mr. Ang graduated from Nanyang University, Singapore with a First-Class Honours Degree in Accountancy in 1970. He was conferred a Masters in Business Administration with distinction by Northwestern University U.S.A. in 1973.

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NI Mingjiang ( 倪明江 ) Independent Director

NI Mingjiang (倪明江) is an Independent Director of our Company. Prof. Ni is currently the Vice Chairman of Develop Committee of Zhejiang University.

Prof. Ni has 30 years of experience and technical expertise in the WTE and renewable energy field. Prior to joining Zhejiang University, he was a lecturer at the Northeast Electric Power University (东北电力学院) from December 1975 to September 1979. In January 1986, he joined Zhejiang University. Before assuming his current position, Prof. Ni served successively as Deputy President and Executive Deputy President of Zhejiang University from April 1996 to December 2009.

Prof. Ni has been conferred the National Prize for Natural Sciences (国家自然科学奖) on one occasion, the National Technical Invention Award (国家技术发明奖) on two occasions and the National Prize for Progress in Science and Technology (国家科技进步奖) on two occasions.

Prof. Ni graduated from Northeast Electric Power University (东北 电力大学) in December 1975. He then successively received a Master's Degree and Doctorate in Engineering Thermal Physics in December 1981 and July 1987 from Zhejiang University.

#### KAN Yaw Kiong (Ernest) Independent Director

Kan Yaw Kiong (Ernest) is an Independent Director and the Chairman of the Audit and Risk Management Committee of our Company. Dr. Kan is appointed Justice of the Peace by the President of the Republic of Singapore since September 2015 and Board Member of Visiting Justices Board & Board of Inspection (Ministry of Home Affairs) since March 2018. He is currently an Independent Non-Executive Director of CapitaLand India Trust Management Pte Ltd (in its capacity as trustee-manager of CapitaLand India Trust, which is listed on the Mainboard of the Singapore Exchange).

With over 30 years of professional experience, Dr. Kan has vast expertise in assurance, financial advisory and consultancy, particularly in capital markets including IPOs. While serving as Chief Advisor of SGX, he was responsible for raising awareness of and promoting SGX as a capital raising platform in both equities and fixed income market. He also worked closely with SGX's equities, fixed income and international coverage teams, to deepen its relationships in China and with the Chinese business community in Singapore and Asia Pacific region.

Dr. Kan was the Deputy Managing Partner of Deloitte Singapore responsible for the firm's operation, specifically in client management and market development. He advised on the IPOs of national and multi-national companies in diverse sectors, and conducted acquisitions and due diligence reviews of companies in China, Hong Kong, Taiwan and Southeast Asia. He was also the financial advisor to several companies with operations in the Asia Pacific region, regarding their public listings on SGX, including REITs and business trusts.

Dr. Kan holds professional accountancy memberships with the Institute of Singapore Chartered Accountants (also elected President 2009-2014), Institute of Chartered Accountants in England & Wales, Association of Chartered Certified Accountants UK and CPA Australia. He also holds a PhD in Business Administration, a Master of Philosophy degree and a Bachelor of Art degree in Accountancy Studies.

### Key Management 管理层

#### WANG Wuzhong (王武忠) Deputy General Manager

WANG Wuzhong (王武忠) is a Deputy General Manager of our Company and is responsible for the environmental protection, safety, daily operation and research and development and assisting in the overall strategic planning of our Group. Mr. Wang joined Jinjiang Group in 1992 and has since been engaged in the green energy business, including as a Director of various entities within our Group.

Mr. Wang has over 30 years of industry experience. Prior to joining our Group, Mr. Wang worked as Director of Product Department in the Lin'an thermal power plant of Jinjiang Group from July 1992 to June 1995. From June 1995 to December 1995, he served as Deputy General Manager responsible for production in the Yuhang thermal power plant of Jinjiang Group. From January 1996 to February 1997, he served as Deputy Plant Manager responsible for production and operation in the Lin'an thermal power plant of Jinjiang Group. From February 1997 to September 1998, he took up various positions including Plant Manager, Deputy General Manager and Assistant to the General Manager of the Jiaxing power plant of Jinjiang Group. From September 1998 to March 2001, he took up various positions including Director of technical team, Plant Manager and General Manager of the Yuhang thermal power plant of Jinjiang Group. From March 2001 to August 2001, he served as Manager in the Operations Department of Jinjiang Group. He then served as General Manager of the Yuhang thermal power plant of Jinjiang Group from September 2001 to May 2002 and General Manager of the Qiaosi power plant of Jinjiang Group from June 2002 to June 2005. He was appointed as General Manager of Green Energy (Hangzhou) Corporate Management Co., Ltd since June 2005 and has been serving as Vice General Manager of the Company since August 2016. Mr. Wang is professor level Senior Engineer and master supervisor of the School of Energy Engineering, Zhejiang University. He completed his Executive Master of Business Administration at the Zhejiang University (浙江大学) in April 2006.

He now is a member of the National Municipal Environmental Sanitation Standardization Technical Committee (SAC/TC451) of the National Standardization Administration (国家标准化管理委员会全国城镇环 境卫生标准化技术委员会(SAC/TC451)委员), a Committee Member of Technical Committee on Urban Appearance and Sanitation of Standardization Administration of the Ministry of Housing and Urban-Rural Development (住房和城乡建设部市容环境卫生标准化技术委员 会委员), a Committee Member of Expert Committee of China Electric Power Federation (中国电力联合会专家委员会委员), Deputy Director of Environmental Protection Equipment and Technology Promotion Center of China Equipment Management Association (中国设备管 理协会环保设备与技术推广中心副主任), Expert of the Technical Committee of the Advisory Committee on the Comprehensive Utilization of Power Generation Resources of China (中国资源综合 利用发电技术咨询委员会技术委员会专家), Expert of the WTE group of the Expert Committee of the All-China Environment Federation (中 华环保联合会专家委员会垃圾焚烧发电组专家), Director of Zhejiang Environmental Monitoring Association (浙江省环境监测协会理事) and Executive Director of Zhejiang Energy Conservation Association (浙江省节能协会常务理事) and Hangzhou Energy Conservation Association (杭州市节能协会常务理事).

#### JIN Ruizhi (金睿智) Chief Financial Officer

JIN Ruizhi (金睿智) is Chief Financial Officer (CFO) of our Company and is responsible for the Group's overall finance function, including corporate finance and financial management. Mr. Jin has more than 20 years of management experience in energy field and finance. Prior to joining our Group, Mr. Jin was the Director of Finance Department of Zhejiang Zheneng Lanxi Power Generation Co., Ltd. (浙江浙能兰 溪发电有限责任公司) from July 2005 to June 2010. From June 2010 to June 2012, Mr. Jin served as Director of Finance Department of Zhejiang Zheneng Zhongmei Zhoushan Coal and Electricity Co., Ltd. (浙江浙能中煤舟山煤电有限责任公司).

From June 2012 to January 2015, he was Deputy General Manager and Chief Accountant of Huaizhe Coal and Electricity Co., Ltd. (淮浙 煤电有限责任公司) and from January 2015 to February 2019, he was Deputy General Manager of Zhejiang Zheneng Zhongmei Zhoushan Coal and Electricity Co., Ltd. (浙江浙能中煤舟山煤电有限责任公司). From February 2019 to September 2019, Mr. Jin was Deputy General Manager of Guangsha (Zhoushan) Energy Group Co., Ltd. (广厦(舟山) 能源集团有限公司) and Zhoushan Huanyu Wharf Co., Ltd. (舟山寰宇 码头有限公司). Mr. Jin is an Intermediate level Accountant as recognised by the Ministry of Finance of the People's Republic of China (中级会计师,中华人民共和国财政部) in July 1992. He is also conferred Advanced Economist (Corporate Management) by the Zhejiang Province Human Resources and Social Security Department(浙江省人力资源和社会保障厅). Mr. Jin graduated with a College Degree (Financial Accounting) from North China Electric Power University (华北电力大学, 财务会计专业) in July 1997 and a Bachelor Degree in Business Management from Zhejiang University (浙江大学工商管理专业,本科学历) in June 2004.

Key Management 管理层

#### QI Liang ( 戚亮 ) Chief Engineer

QI Liang (戚亮) is the Chief Engineer of our Company and is responsible for all engineering-related matters of the Group. Mr. Qi has more than 20 years of experience in production, technology and infrastructure. From March 2007 to August 2014, Mr. Qi was Vice Chairman of Cixi Zhongke Zhongmao Environmental Thermal Power Co., Ltd. (慈溪中科众茂环保热电有限公司).

From August 2014 to September 2019, he served as Deputy Director of the Equipment Management Department, Deputy Director of the Engineering Department and subsequently as Director of the Engineering Department, of Zhejiang Zheneng Zhenhai Power Generation Co., Ltd. (浙江浙能镇海发电有限责任公司).

Mr. Qi graduated with a College Diploma in Thermal Power conferred by Zhejiang Electric Power Workers' College (浙江省电力职工大学 热能动力专业) in September 1993 and is an Electrician recognised by the National Electric Power Company Intermediate Professional Technical Qualification Review Committee of the People's Republic of China (电力工程师,国家电力公司中级专业技术资格评审委员会) in December 2000.

#### E Hongbiao ( 鄂宏彪 ) Deputy General Manager

**E Hongbiao** (鄂宏彪) is Deputy General Manager of our Company and is responsible for all technical-related matters of the Group. He also assists in managing the sewage and waste treatment operations.

He joined our Group as Deputy General Manager of Hangzhou Yuhang Jinjiang Environmental Energy Co., Ltd. in December 1995 and served as its General Manager from July 2002 to November 2004. He served as General Manager of Kunming Xinxingze Environment Resources Industry Co., Ltd. from June 2006 to August 2008 and Yunnan Green Energy Co., Ltd from April 2010 to March 2013.

He has also been Deputy General Manager of Green Energy Hangzhou since March 2013. Mr. E has over 20 years of industry experience. Prior to joining our Group, Mr. E served as Deputy Plant Manager in production and Operations Manager at Jinjiang Lin'an Oujin Thermal Power Co., Ltd. (锦江临安欧锦热电有限公司) from July 1992 to November 1995.

From November 1995 to May 2000, Mr. E served as Deputy General Manager and General Manager at Jinjiang Yuhang Thermal Power Co., Ltd. (锦江余杭热电有限公司). He was General Manager at Jiande Jinjiang Comprehensive Coal Utilisation Co., Ltd. (建德锦江石 煤综合利用有限公司) from May 2000 to July 2002. He later served as General Manager of Jinjiang Lin'an Hengjin Thermal Power Co., Ltd. (锦江临安恒锦热电有限公司) and Jinjiang Lin'an Hengkang Thermal Power Co., Ltd. (锦江临安恒康热电有限公司) from November 2004 to May 2006.

From September 2008 to March 2010, Mr. E served as Project Manager at the Jinjiang Investment and Development Center (杭州锦 江投资发展中心). Mr. E holds the accreditation of a first-class Construction Division (Electromechanical Engineering) issued by the Ministry of Human Resources and Social Security and the Ministry of Housing and Urban- Rural Development of the People's Republic of China, an Intermediate Engineer (Energy Generation) and an Advanced Economist (Project Investment) issued by the Hangzhou Human Resources and Social Security Bureau (杭州市人力资源和社会保障局). He received a College Diploma in Business Administration from Zhejiang Gongshang University (浙江百大学) in June 2009 and a Bachelor's Degree in Business Administration from Beijing Normal University (北京师范大学) in July 2014 and an Undergraduate Diploma from Chongqing University in January 2017.

# SUSTAINABILITY REPORT

可持续性报告

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### About This Report 关于本报告

Zheneng Jinjiang Environment Holding Company Limited ("Zheneng Jinjiang Environment" or the "Company") and its subsidiaries (collectively, the "Group") adhere to the corporate mission of "Beautifying the Cities and Making the Environment more Natural" and will uphold the practice of sustainable development. The Group believes providing a clear and transparent report to its stakeholders is key to managing corporate sustainability, and therefore continues to proactively disclose its performance in environmental, social and governance ("ESG") aspects.

#### **Reporting Scope and Standard**

This Sustainability Report describes Zheneng Jinjiang Environment's sustainability practices and performance from 1 January 2022 to 31 December 2022 ("FY2022"). This report covers the listed entity, Zheneng Jinjiang Environment Holding Company Limited, and all its subsidiaries globally. As at 31 December 2022, there are 25 Waste-to-Energy ("WTE") facilities, 2 Kitchen Waste Treatment projects and 9 Waste Resource Recycling projects currently in operation, across 13 provinces, autonomous regions and municipalities in China and there are also 5 projects under construction and 19 projects in the preparatory stage in China and overseas. The sections titled "Environmental Services and Education" and "Innovation and Environmental Impact Management" focus solely on our WTE facilities currently in operation.

Due to the limited availability of data access and the lack of consistent data monitoring methods among various engineering, procurement and construction contractors, for the avoidance of doubt, the operational data involved in this report do not include the WTE facilities operated by the Group as associated companies or joint venture companies, nor the projects under construction or preparation within PRC and overseas. All data included in the report are rounded. In addition, unless otherwise stated, this report does not reflect the ESG performance of our contractors and suppliers. Looking ahead, the Group will continue to enhance its internal data collection system and, where feasible, further expand the scope of reporting.

This report has been prepared in accordance with the requirements of Rules 711A and 711B and Practice Note 7.6: "Sustainability Reporting Guide" of the Listing Manual of the Singapore Exchange Securities Trading Limited ("Listing Manual"). In addition, with a view to raising the standards of disclosure, this report also makes reference to the requirement from Singapore Exchange Limited on providing climate-related disclosures consistent with the TCFD recommendations and the GRI Standards, a globally recognised framework for reporting on sustainability issues. The GRI Content Index and TCFD Content Index are provided in the appendix section of this report. No external assurance has been sought for this report. Please forward any enquiries or feedback you may have to znjjhj@hzjj.cn. 浙能锦江环境控股有限公司("浙能锦江环境"或 "公司")及其附属公司(统称为"集团")秉承" 让城市更美丽 让环境更自然"的企业使命,坚持践 行可持续发展,相信为持份者提供透明清晰的报告 是企业实现可持续发展管理的关键,因此本集团持 续主动披露在环境、社会和管治("ESG")方面的 表现。

#### 报告范围及准则

本可持续发展报告概述了2022年1月1日至2022 年12月31日("2022财年")浙能锦江环境的主 要可持续发展实践和表现。报告涵盖了上市实体 -浙能锦江环境控股有限公司,以及包括截至2022年 12月31日浙能锦江环境在中国13个省、自治区和 直辖市拥有的25个已投入运营的垃圾焚烧发电厂, 2个已运营的餐厨垃圾处理项目,9个已运营的垃圾 资源化项目,在境内外的5个在建项目以及19个正 在筹建阶段的项目。

由于资料数据的可获得权限有限以及各工程、采购 及施工承包商之间缺乏统一的数据监控方法,为免 生疑问,本报告所涉及的运营数据暂不包括本集团 分类为联营公司或合营公司的运营中垃圾焚烧发电 厂,也不包括境内外在建及筹建项目。本报告中所 列的所有数据已作舍入调整。此外,除非另有注明, 本报告也不会反映我们承包商和供应商在 ESG 方面 的表现。展望未来,本集团将继续提升内部资料收 集系统,在可行情况下进一步扩大报告披露范围。

本报告是根据上市手册第 711A 和 711B 条规则以及 应用说明 7.6 "可持续发展报告指南"的要求编制 的。此外,为提升报告披露水平,本报告还参阅了 新加坡证券交易有限公司关于根据 TCFD 建议进行气 候相关披露的要求,以及全球报告倡议组织(GRI) 标准,该标准是一个全球公认的可持续发展问题报 告框架。本报告在附录部分提供了 GRI 内容索引和 TCFD 内容索引。本报告未寻求第三方审核,如有任 何问询或反馈,请发至电子邮箱 znjjhj@hzjj.cn。



#### **Reporting Principles**

The Group defines the ESG content to be disclosed in this Report based on the following principles:

**Materiality:** We conduct annual materiality assessments to ensure that the identified and prioritised ESG issues reliably reflect the most material concerns to us and our stakeholders.

**Sustainability Context:** This report evaluates the Group's performance within the broader context of sustainable development and, to the extent possible, considers sustainable development goals, strategies, climate risks and opportunities when discussing sustainable development issues.

**Quantitative:** We strive to quantify data with accurate and scientific standards, methodologies and assumptions and to compare with past performance where feasible.

**Consistency:** We have adopted consistent statistical methods where feasible to make meaningful comparisons.

**Clarity:** We strive to present relevant ESG information in a way that is easy to understand and accessible.

**Completeness:** This report covers issues of importance to stakeholders during the year with sufficient information and allows them to assess our performance during the reporting period.

#### **Board Statement**

In order to assess and incorporate major ESG issues into the business development strategy for sustainable development, Zheneng Jinjiang Environment has established a formal sustainability governance structure to manage these sustainability priority areas in 2018. At the top of the leadership, the Board oversees and approves the direction of sustainability management and has ultimate responsibility for the Company's sustainability reporting. Management of the Company has responsibility to ensure that the ESG factors are monitored on an ongoing basis and properly managed. In support of the Board, the Sustainability Steering Committee ("SSC"), formed by senior management, develops sustainability strategy, manages overall sustainability performance and reports to the Board. At the same time, as a useful supplement to the SSC, the ESH Management Committee (formerly known as Safety Production Management Committee) with middle-level and above staff members at the Company headquarters was established for management of health, environmental and safe production related issues.

In 2022, the Board had been briefed by management on the economic, environmental and social issues, including the related risks and opportunities, and included them in the process of defining the Group's business and strategy to ensure the effective implementation of the Group's sustainable development strategy. The Board has determined the material ESG factors as disclosed in this Report with the assistance of the SSC and overseen the management and monitoring of these defined material ESG factors and approves the disclosure of sustainability performance and targets in this report.

In addition, as prescribed by the SGX-ST pursuant to Rule 720(7) of the SGX-ST Listing Manual, all the Directors of Zheneng Jinjiang Environment have undergone the mandatory training on sustainability conducted by the Singapore Institute of Directors in FY2022, as well as additional sustainability session conducted by external auditor Pricewaterhousecoopers.

#### 报告原则

本集团根据以下原则确定了本报告披露的 ESG 内容:

重要性:我们每年都会进行重要性评估,以确保已 确定和优先考虑的 ESG 议题能够可靠地反映我们和 我们的持份者最深切关注的议题。

可持续发展背景:本报告按更广泛的可持续发展考 虑和评价集团的表现,并尽可能在讨论可持续发展 议题时,考虑可持续发展目标、战略、气候风险及 机遇等。

量化:我们努力用准确、科学的标准、计算方法和 假设设定来量化数据,并在可行情况下与过往业绩 进行比较。

一致性:为进行有意义的比较,在可行情况下,我 们采用了一致的统计方法。

清晰性:我们努力用易于理解及容易获取的方式呈现相关 ESG 信息。

完整性:本报告包含本年度对持份者重要的议题, 并提供足够资料让其评估我们在报告期内的表现。

#### 董事会声明

为评估并将重大的环境、社会及管治议题纳入业务 发展实现可持续发展战略规划,浙能锦江环境已于 2018 年建立了正式的可持续发展管理体系,由董事 会负责监督和批准可持续发展管理的方向并对公司 可持续发展报告负最终责任。公司管理层有责任确 保 ESG 因素得到持续监测和妥善管理。为支持董事 会,组建了以高级管理层为成员的可持续发展指导 委员会("SSC")制定可持续发展战略,管理整体 绩效并向董事会报告。同时,成立以公司总部中层 及以上人员为成员的 ESH 管理委员会(以前称为安 全生产管理委员会),负责健康、环境及安全生产方 面的管理工作,作为可持续发展指导委员会的有益 补充。

2022 年,董事会已听取管理层关于经济、环境和社 会议题的汇报,内容也包括与之相关的风险和机遇, 并在确定集团业务和战略中考虑这些可持续发展问 题,以确保集团的可持续发展策略得到有效执行。 董事会已确定重要 ESG 因素,并在 SSC 指导下披露 在本报告中,也已管理和监督这些已确定的重要 ESG 因素,并批准在本报告中披露可持续发展业绩和目标。

此外,根据新加坡证券交易所上市手册第720(7)条的规定,浙能锦江环境的所有董事在2022财政年度都接受了新加坡董事协会举办的强制性可持续发展培训,以及由外部审计师普华永道进行的额外可持续性会议。

### Materiality Assessment 重要因素评估

Having combined the development requirements in relation to the circular economy and environmental protection industry in the context of the 20th National Congress of the Communist Party of China (the "20th NCCPC") and Carbon Peaking and Carbon Neutrality, the SSC undertook materiality assessment to identify the most important ESG factors taking into consideration their relevance or impact to the business operations, strategy, financial planning, business model and key stakeholders.

公司可持续发展指导委员会结合中国共产党第二十次全国代表大会("党的二十大")和"碳中和、碳达峰"("双碳")背景下 对循环经济、环保产业的发展要求,考虑了与业务、战略、财务计划、业务模式和主要利益相关者的相关性和影响,评估、确定 了重要 ESG 因素。

The materiality assessment process was guided by the GRI Principles of Materiality and Stakeholder Engagement, and considered the following aspects:

重要 ESG 因素评估过程以 GRI 原则和利益相关者参与原则为指导,并考虑了以下几个方面:

- Global and local emerging sustainability trends; 全球和地方新兴的可持续发展趋势;
- Hot topics and future challenges in the WTE and green energy sectors, as identified by peers; and 固废和绿色能源行业的热门话题和未来挑战;及
- Insights gained from interactions with stakeholders. 从与利益相关者的来往中获得的见解。

Eight material factors were identified from the assessment and shown in the table below. Underpinned by these factors, we focus on five priority areas in sustainability, namely economic performance<sup>1</sup>, environmental services and impacts, workforce, corporate governance and social responsibility, to bring positive value for our key stakeholders including investors, employees, the local community and regulators.

公司在评估的过程中确定了八个重要因素,在这些因素支持下,我们专注于可持续发展的五个优先领域,即经济表现<sup>1</sup>、环境服务 和影响、人才团队、公司管治和社会责任,致力于为投资者、员工、监管机构和当地社会等主要利益相关者带来积极的价值,详 见下表。

> Table 1: Material factors for FY2022 表 1: 2022 财年重要因素

Priority Areas 优先领域	Material Factor 重要因素		
Economic Performance 经济表现	Economic Performance 经济表现		
	Environmental Services and Education 环境服务和教育		
Environmental Services and Impacts 环境服务和影响	Green Operations 绿色经营		
	Addressing Climate Changes 应对气候变化		
Warkfares 1 + ER	Talent Training and Advancement 人才培养与提升		
Workforce 人才团队	Occupational Health and Safety 职业健康和安全		
Corporate Governance 公司治理	Regulatory Compliance 监管合规		
Social Responsibility 社会责任	Local Community 当地社区		

2022年浙能锦江环境的经济表现可在本年报财务报表章节查阅。

Details of Zheneng Jinjiang Environment's financial performance in 2022 can be found in the Financial Statement section of this Annual Report.

#### *Materiality Assessment* 重要因素评估

ECONOMIC PERFORMANCE 经济表现	ENVIRONMENTAL SERVICES AND IMPACTS 环境服务和影响	<b>WORKFORCE</b> 人才团队	CORPORATE GOVERNANCE 公司治理	SOCIAL RESPONSIBILITY 社会责任
We aspire to create healthy and sustainable economic returns to our investors and shareholders. We are making steady progress in the development of existing projects, building on existing capacity, enhancing synergy and exploring new markets to capitalise on opportunities for growth. 我们希望为投资者和股东创造 健康和可持续的经济回报。我 们正稳步推进显有项目增强协同 能力,开拓新市场,把握增长 机遇。	We are committed to providing green energy and hazard-free waste treatment services to the wider community. We improve the operation capacity of WTE facilities through green technology and green production, strictly control material use and emissions to reduce resource consumption and prevent pollution. We pay attention to the risks and opportunities brought by climate change, and improve the sustainability of the Company's operation. We also actively promote public awareness of the WTE industry and environmental protection through education, which enhances the value of the Company. 我们致力于为更多国内外城市 提供绿色能源和无害化垃圾处 理服务。通过绿色技术提升 WTE 设施的运营能力,利用绿 色生产、严格把控物料使用及 排放,减少资源消耗并防止污 染,关注气候变化所带来的的 风险和机遇,提高公司运营的 可持续性;通过环境数有,增 强公众对 WTE 行业以及环保的 认识,提升公司价值。	Talent is a key contributing factor to the high-quality development of a company. We are committed to the introduction and training of talent and the establishment of a talent utilisation system. With the focus on talent recruitment, sincerity in talent appreciation, boldness in talent utilisation and the trust and flexibility offered to our talents, we build a large scale talent team with appropriate structure and excellent quality. 人才是公司高质量发展的关键 因素。我们致力于人才引进, 培养和使用体系建设, 以识才 的慧眼、爱才的诚意、用才的 胆识、容才的雅量、聚才的良 方, 构建一支规模宏大、结构 合理、素质优良的人才队伍。	Compliance is a fundamental requirement for achieving good corporate governance. We strive to comply with all applicable laws and regulations, actively raise awareness of risk prevention, identify and manage risks, and develop mitigation measures. We have zero tolerance for corruption and strive to create a favorable atmosphere. 合规经营是实现公司良好治理 的基本要求。我们始终遭守各 项适用法律法规,积极提升风 险防范意识、识别管理风险并 制定缓解措施,绝对反对腐败 行为,营造良好氛围。	We balance economic and social benefits, pay attention to the needs of different groups in society, build friendly ties with the community, actively contribute to society, and promote the comprehensive development of local communities. 我们坚持统筹经济效益和社会 效益,关注社会各群体需求, 与社区建立友好纽带,积极回 馈社会,促进当地社区综合发 展。

For 2023, the Company has set targets for defined horizons in relation to each material ESG factor identified, which are explained in further detail in the following sections of this Report. The targets are consistent with those used for the Group's strategic planning and financial reporting.

2023 年,公司已就确定的每个 ESG 重要因素设定了明确的目标范围,本报告的以下部分将进一步详细解释。目标与本集团战略规 划及财务报告所用目标一致。

**4**6

# 2022 Sustainability Highlights 2022年可持续发展重点





#### ENVIRONMENTAL SERVICES AND IMPACTS 环境服务和影响



operating WTE facilities (excluding the resource recycling projects and kitchen waste projects) across China

25 个在中国运营的 WTE设施 (不含资源化项目和餐厨项目) AROUND 72,00

visitors participated in Zheneng Jinjiang Environment's public education programme in 2022

约1.2万参观者在2022年度参与到浙能锦江环境的公共教育项目



of waste treated 垃圾处理量达 1, 262.9 万吨

12.629 MILLION 3,764,085 MWH 3.524 MILLION TONNES

of green electricity generated

发电量 3,764,085 兆瓦时



of steam supplied 供汽量 352.4 万吨

#### WORKFORCE work 述 劳动力



employee workplace fatalities and 0 workplace iniuries

员工因工伤亡事件为零

100%

of employees received a performance review

100%的员工接受了绩效考核

SOCIAL RESPONSIBILITY



aspects in which the Company fulfils its social responsibility 4 大方面履行社会责任

### *Sustainable Business of Zheneng Jinjiang Environment* 浙能锦江环境可持续业务

Zheneng Jinjiang Environment specialises in the planning, development, construction, operation and management of WTE facilities, using state-of-the-art technology to deliver environmentally sustainable waste treatment and energy solutions and realising the reduction, recycling and harmless treatment of waste. Now the Company has been shifting away from the WTE industry towards comprehensive urban solid waste solutions and focusing on deepening the efficient use and recycling of solid waste resources on an overall city scale, to implement a green living lifestyle and realize business sustainability, as well as contribute to the construction of zero-waste cities and a beautiful China.

#### Waste Resource Recycling

The basic composition of waste divided into organic, inorganic, plastic, metal and non-recyclable materials. Organic materials include kitchen waste, animal and plant waste, etc.; Inorganic materials include lime soil, brick, ceramic, glass, etc.; Plastics include plastic bottles, plastic bags, plastic packaging, etc.; Metals include iron, aluminum, copper and other metals.

Waste Resource Recycling is the pre-treatment of waste and the separation of discarded waste as recycling raw materials for conversion into renewable resources. The Company actively introduces and adopts new advanced international technology. After the collected waste is crushed, the non-combustible materials such as metal, pottery and stone are removed, and the moisture and chlorine content in the waste is reduced through drying and sorting, before it is converted into Solid Recycled Fuel ("SRF") or Refuse Derived Fuel ("RDF") for incineration, which helps to improve the heat conversion efficiency of waste, improve the waste quality and significantly reduce pollutant emissions, so as to truly achieve the comprehensive reuse of resources and energy. Focusing on the solid waste treatment market in small and medium-sized cities and towns, the Company taps on the existing enterprises as a starting point and extends its outreach to the surrounding areas to expand into potential markets.

#### Waste-to-Energy

WTE involves combusting domestic waste at high temperature to convert its combustible portion into materials like carbon dioxide and water. The residual heat generated by incineration is used for power generation, while the waste gas and fly ash generated undergo harmless treatment. WTE has the advantages of "harmlessness, reduction and recycling".

Domestic waste incineration power generation follows the national standard "Standards for Pollution Control of Domestic Waste Incineration", and there are strict requirements on the conditions of waste entering the furnace, operating parameters and pollutant discharge during the incineration process. Zheneng Jinjiang Environment uses state-of-the-art technologies and adopts best industry practices for WTE. The Company strives to reduce the input resources required, while closely monitoring the environmental outputs such as air-borne emissions, effluents and solid waste in compliance with regulatory requirements. The WTE process has three main stages, as illustrated in the diagram below.

浙能锦江环境致力于 WTE 设施的设计、开发、建设、 运营和管理,采用先进的技术,提供废弃物处理和 能源解决方案,实现垃圾的减量化、资源化、无害 化处理。当前,公司正在从单一的垃圾发电转变为 整体城市固废综合服务提供商,以城市整体层面深 化固体废弃物资源的高效利用和循环利用为核心, 践行绿色生活方式,实现业务的可持续性,为建设 无废城市、美丽中国贡献自己的力量。

#### 垃圾资源化

垃圾基本构成大体上分为有机物、无机物、塑料类、 金属类、不可回收物。有机物包括厨余、动物和植 物废弃物等;无机物包括灰土、砖瓦、陶瓷、玻璃等; 塑料类包括塑料瓶类、塑料袋类、塑料包装类等; 金属类包括铁、铝、铜等金属。

垃圾资源化,则是对垃圾进行预处理,将废弃的垃 圾分类后作为循环再利用原料,使其成为再生资源。 公司积极引进并消化吸收国际先进技术,将收集的 垃圾破碎后,通过干化、分选,去除垃圾中金属、 陶器和石块等不可燃烧物,降低垃圾中水分和氯含 量,将生活垃圾制备为垃圾衍生燃料或固体回收燃 料后再进行焚烧,有助于提高垃圾热转换效率,提 升进厂垃圾质量的同时,大幅降低污染物的排放, 真正实现资源化、能源化综合再利用。围绕中小城 镇的固废处理市场,公司以现有企业为辐射点,向 周边区域延伸,布局潜在市场。

#### 垃圾焚烧发电

垃圾焚烧发电是将生活垃圾在高温下燃烧,使生活 垃圾中的可燃废物转变为二氧化碳和水等,产生的 余热用于发电,产生的废气、飞灰进行无害化处理。 生活垃圾焚烧发电具有"无害化、减量化、资源化" 的优点。

生活垃圾焚烧发电遵循国家标准《生活垃圾焚烧污 染控制标准》, 焚烧过程中入炉废物条件、运行参 数、污染物排放均有严格的要求。浙能锦江环境采 用最先进的技术和丰富的经验, 减少生产中需要投 入的资源; 同时严格监控空气、污水和固体废物的 排放, 以达到国家监管要求。浙能锦江环境垃圾焚 烧发电过程有三个主要阶段, 如下图所示。



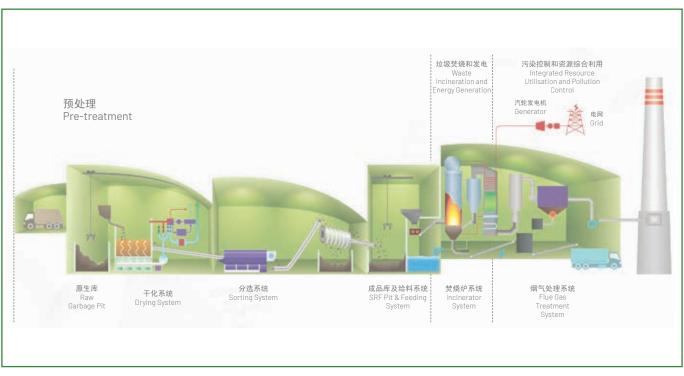


Figure 1: Overview of the WTE process 图 1 垃圾焚烧发电流程概览

The Company has integrated and developed various technologies for waste incineration power generation based on the characteristics of China's domestic waste, such as high moisture content, complex composition, and high ash content, etc. The Company is committed to becoming an integrated enhancer of fluidised bed and grate furnace waste incineration power generation technology and continuing to be a promoter and leader in localisation of waste incineration power generation technology.

The differential-density circulating fluidised bed waste incineration power generation technology is a high-efficiency clean incineration power generation technology developed in cooperation with the Company and Zhejiang University, with complete and independent intellectual property rights, and is applied in most of the Company's WTE facilities. The technology has the characteristics of wide fuel adaptability, high combustion efficiency, large regulation load ratio, fast load regulation, low nitrogen oxide emission and low-cost limestone furnace desulfurisation. It is one of the globally recognised clean burning technologies for domestic waste.

Grate furnace technology is another technical method of waste incineration which operates stably and reliably, and most of the solid waste can be directly burned into the furnace without any pretreatment. While improving and optimising the technology of circulating fluidised bed waste incineration power generation, the Company also adopts and utilises moving grate furnaces and actively collaborates with notable peers on moving grate furnace technology. The collaboration studies and analyses the incineration of municipal waste, helping to advise the appropriate furnace type according to the waste profile of different projects and how continuous technological improvements can be made. 中国生活垃圾具有水份高、组份复杂、灰分多等特 点,浙能锦江环境因此集成、发展了多种垃圾焚烧 发电技术,并致力成为流化床和炉排炉垃圾焚烧发 电技术的整合提升者,继续在国产化垃圾焚烧发电 技术方面做推广者和引领者。

异重循环流化床垃圾焚烧发电技术是公司与浙江大 学合作开发、拥有完全自主知识产权的高效清洁焚 烧发电技术,并在公司大部分电厂得到应用。该技 术具有燃料适应性广、燃烧效率高、调节负荷比大、 负荷调节快、氮氧化物排放低、低成本石灰石炉内 脱硫等特点,是全球公认的生活垃圾清洁燃烧技术 之一。

炉排炉技术是另一大垃圾焚烧技术流派,该技术运 行稳定、可靠,绝大部分固体垃圾不需要任何预处 理可直接进炉燃烧。公司在提升优化循环流化床垃 圾焚烧发电技术的同时,引进并应用了炉排炉工艺, 积极与行业内各知名企业展开炉排炉项目合作,仔 细分析并研判各地生活垃圾的焚烧情况,根据不同 的项目选择合适的炉型,不断提升技术水平。 *Sustainable Business of Zheneng Jinjiang Environment* 浙能锦江环境可持续业务

#### **Urban Ecological Complex**

The Urban Ecological Complex is designed according to the circular economy theory, through the simulation of the natural ecosystem "producer-consumer-decommissioner" circular approach to transform the industrial system, establish the "ecological chain" of the industrial system and form the industrial symbiotic network. Through the comprehensive management of energy, water, materials and other environmental resources to achieve the exchange of by-products and waste among the members of the park, the remote utilization of energy and waste water, and the sharing of infrastructure and information resources and park management system, a sustainable economic system with coordinated development of economic and environmental benefits in the park has been established to realize a multi-win of environmental, economic and social benefits.

The operation of Urban Ecological Complex is guided by the theory of sustainable development through the integration of park elements and optimization of system functions, so as to maximize the overall benefit. Zheneng Jinjiang Environment actively explores the collaborative development mode of new business, and vigorously promotes the construction of urban ecological complex. Focusing on the WTE facilities, the Company builds urban ecological complex that can efficiently and cooperatively dispose of kitchen waste, sludge and other urban wastes, and continuously delivers clean energy such as green electricity, steam and recyclable resources such as copper, aluminum and sand to the city, establishing a green and low-carbon recycling industrial system and becoming a dual center of environmental protection and energy in the city.

#### 城市生态综合体

城市生态综合体是指依据循环经济理论而设计,通 过模拟自然生态系统"生产者-消费者-分解者" 的循环途径改造产业系统,建立产业系统的"生态 链"而形成产业共生网络,通过对能源、水、材料 等环境资源的综合管理以实现园区成员之间的副产 物和废物的交换,能量和废水的远级利用,基础设 施和信息资源、园区管理系统的共享,从而建立园 区经济效益和环境方面协调发展的可持续的经济系 统,实现环境、经济及社会效益的多赢。

城市生态综合体的运行是在可持续发展理论指导下 通过对园区要素的整合以及系统功能的优化,从而 使整体效益最大化。浙能锦江环境积极探索新业务 协同发展模式,全力推进构建城市生态综合体,以 垃圾焚烧发电厂为中心,打造可高效协同处置厨余、 污泥等多种城市废弃物的城市生态综合体,源源不 断向城市输送绿色电力、蒸汽等清洁能源及铜、铝、 砂石等可回收资源,建立绿色低碳循环发展的产业 体系,成为所在城市环保能源双中心。

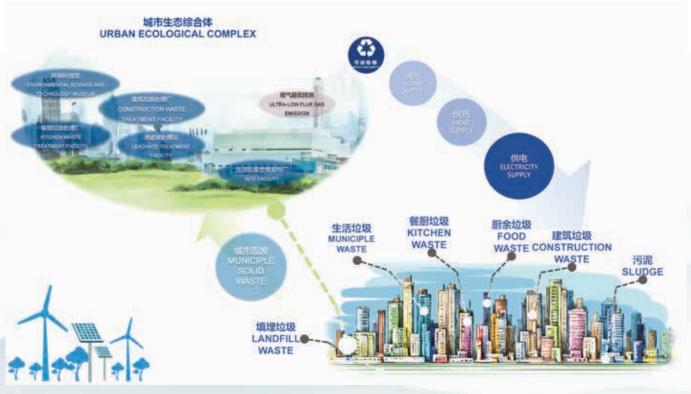


Figure 2: Overview of the Urban Ecological Complex 图 2: 城市生态综合体概览

# Environmental Services and Education 环境服务和教育

#### **Environmental Services**

In the context of Carbon Peaking and Carbon Neutrality, WTE has become an important part in the green energy revolution, and the development of low carbon with high quality is an important topic for waste power generation within the "14th Five-Year Plan". Zheneng Jinjiang Environment focuses on WTE facilities, and strives to build a center of environmental protection and renewable energy by unleashing potential and increasing efficiency with the expansion of existing capacity and collaborative circulation, to lay a solid foundation for high-quality development. At the same time, the Company continues to strengthen communication and cooperation with the government, industry peers, technical experts and scholars to promote environmental education, ameliorate the "not in my backyard" mindset, and improve public understanding of WTE.

In 2022, Zheneng Jinjiang Environment strengthened budget management and preliminary planning management, ramped up responsibility allocation at the project headquarters, focused on site control and inspection and enhanced the supervision of quality safety, thereby steadily promoting the construction of projects. During the year, two WTE projects (including reconstruction and expansion project), one Kitchen Waste Treatment project and one Resource Recycling project were put into operation, increasing the waste treatment capacity in operation by 1,545 tonnes per day.

At the same time, with a primary focus on the existing WTE projects, the Company actively extends the industry chain, expands into new markets such as heat and steam supply and other products, and sought opportunities in relation to various urban solid waste resources to strive for further development. In 2022, the Company successfully secured the Baoding Jinhuan WTE Project in Baoding City, Hebei Province, with a daily waste treatment capacity of 1,200 tonnes. It will jointly contribute to the "harmless, reduction and recycling" of local waste treatment together with the Gaobeidian Resource Recycling Project upon its completion. The Company has comprehensively studied the heating capacity of each project and conducted market research on district heating demand, and successfully expanded into the heating markets in Wuhan, Hubei Province, Xishan, Yunnan Province and Shijiazhuang, Hebei Province.

#### 环境服务

双碳背景下,垃圾焚烧发电已成为绿色能源革命的 重要一环,低碳化高质量发展是垃圾发电"十四五" 期间的重要课题。浙能锦江环境围绕垃圾焚烧发电 厂,挖潜增效,以存量拓增量,协同循环,着力打 造环保、可再生能源中心,厚植高质量发展根基。 同时,公司持续加强与政府、业内同行、技术专家 和学者的沟通与合作,加大环境教育力度,降低邻 避效应,提升公众对垃圾焚烧发电的理解。

2022 年,浙能锦江环境强化预算管理和前期策划 管理,夯实工程指挥部责任主体,狠抓现场管控, 加强稽查力度,高压监管质量安全,稳步推进各项 工程建设。公司于年内投运2个垃圾焚烧发电项目 (含改建和扩建项目)、1个餐厨垃圾处理项目和 1个垃圾资源化项目,增加运营中的垃圾处理能力 1,545 吨/天。

同时,以垃圾焚烧发电存量项目为中心,公司积极 延伸产业链,拓展供热、供汽等产品市场,争取各 类城市固废资源,谋求进一步发展。2022年,公司 成功取得河北省保定高碑店垃圾焚烧发电项目,日 处理能力1,200吨,将在建成后与高碑店资源化项 目共同为当地垃圾处置的"无害化、减量化、资源 化"做出贡献。公司全面梳理了各个项目供热能力 并开展区域供热需求市场调研,成功拓展湖北武汉、 云南西山、河北石家庄等地区的供热市场。

# Wuhu Jinjiang WTE Facility in Anhui Province Successfully Into Treatment of Decoration (Construction) Waste Resources

安徽省芜湖垃圾发电厂成功拓展装修(建筑)垃圾资源

For many years, landfill is the default treatment for decoration (construction) waste, which not only occupies a large amount of land resources but also causes huge pollution to the environment.

#### 多年来,装修(建筑)垃圾通用处理是填埋,不仅占用大量土地资源也对环境造成巨大污染。

In April 2022, witnessed by the Wuhu municipal government, Wuhu Jinjiang WTE Facility signed cooperation agreements with the leaders of 7 decoration (construction) waste transportation enterprises in Wuhu City. This signified that the harmless disposal of decoration (construction) waste in Wuhu has taken its last leap of faith and completely bid farewell to the landfill approach. After the signing of the cooperation agreements, except for the reuse of masonry resources, the rest of the decoration (construction) waste in the center of Wuhu City will be sent to the Wuhu Jinjiang WTE Facility for incineration, which greatly alleviates the long-standing problem that has plagued enterprises and regulatory authorities. From April 2022 to March 2023, the Wuhu Jinjiang WTE Facility has received and processed 15,355 tonnes of decoration (construction) waste.

2022 年4 月,在芜湖市政府部门见证下,芜湖垃圾发电厂与芜湖市7 家装修(建筑)垃圾运输企业负责人签订了合作协议。 这标志着芜湖装修(建筑)垃圾无害化处置已打通"最后一公里",彻底告别"一填了之"。合作协议签订后,芜湖市区 装修(建筑)垃圾除了砖石资源再利用外,其余将送入芜湖垃圾发电厂焚烧处理,极大缓解了长期困扰企业和监管部门的 老大难问题。2022 年 4 月 - 2023 年 3 月,芜湖垃圾发电厂已接收并处理 15,355 吨装修(建筑)垃圾。

#### **Environmental Services and Education** 环境服务和教育

As at 31 December 2022, Zheneng Jinjiang Environment operates 25 WTE facilities, 2 Kitchen Waste Treatment Facility and 9 Waste Resource Recycling projects, across 13 provinces, autonomous regions and municipalities in China with a total waste treatment capacity of 41,955 tonnes per day, and a total installed capacity of 805 MW. Taking into consideration all the projects under construction and in the planning phase, the Group's total installed waste treatment capacity is expected to reach 62,220 tonnes/day of municipal waste upon the completion of these projects. In 2022, the Company treated a total of 12.629 million tonnes of municipal solid waste, serving approximately 86.5 million people<sup>2</sup>, while generating 3,764,085 MWh of green electricity and 3,524 thousand tonnes of steam. (Refer to Table 3 for details).

#### **Environmental Education**

Ecological protection and environmental education are inseparable. Ecological protection is not a phase but a continuous journey. The development of environmental protection education directly affects ecological protection. Only by vigorously promoting environmental education and instilling a general understanding of the importance of ecological environment in the public, can ecological protection be better developed in a sustainable manner. Environmental education places more emphasis on practice, replying on communities, environmental education bases, etc. to improve the public's understanding and awareness of environmental issues, so that they can take actions to protect and improve the environment.

The Chinese government has been actively creating a green and low-carbon atmosphere, encouraging the whole society to participate in carbon emission reduction, practicing green and low-carbon habits, and exploring the establishment of multiple avenues for social participation. Zheneng Jinjiang Environment understands that public participation is an important driving force for green and low-carbon development, and continues to pioneer and innovate. Every year, the headquarters of Zheneng Jinjiang Environment actively organizes various forms to practice green and low-carbon, and calls on its subsidiaries to carry out World Environment Day theme activities, both online and offline, actively organizes and carries out publicity events to form a strong joint force and enhance public awareness of environmental protection science, and takes the initiative to fulfill the main responsibilities of corporate environmental governance. 截至 2022 年 12 月 31 日,浙能锦江环境在中国 13 个省、自治区和直辖市拥有 25 个已投入运营的垃圾 焚烧发电项目,2 个餐厨垃圾处理项目和 9 个垃圾资 源化项目,垃圾处理能力累计 41,955 吨 / 日,装机 容量达 805MW,待所有在建、筹建项目全部建成后, 垃圾处理总能力将达 62,220 吨 / 日。在 2022 年, 公司共处理了 1,262.9 万吨的城市生活垃圾,产生 了 3,764,085MWh 电力和 3,524 千吨蒸汽,相当于为 大约 8,650 万人<sup>2</sup>提供了垃圾处理服务。(详情参阅 表 3)。

#### 环境教育

生态保护和环境教育有着必不可分的联系,生态保 护不是一个阶段性过程,而是持续的过程,环保教 育的发展直接影响到生态保护,只有大力宣传进行 环保教育,让公众普遍了解生态环境的重要性,生 态环境保护才能更好的持续发展。环境教育更强调 实践性,依托社区、环境教育基地等加强实践,提 高公众对环境的理解和意识,从而采取行动去保护、 改善环境。

中国政府长期积极营造绿色低碳氛围,激励全社会 参与碳减排,践行绿色低碳行为,探索建立多元社 会化参与机制,浙能锦江环境深知公众参与是绿色 低碳发展的重要驱动力,不断开拓创新,每年总部 积极组织各种形式践行绿色低碳,同时也号召下属 企业开展世界环境日主题活动,线上线下齐发力, 积极组织开展社会宣传,形成强大合力,加大环境 保护科普宣传力度,主动履行企业环境治理主体责 任。



Figure 3: Subsidiary enterprises to carry out the June 5 Environment Day activities 图 3: 下属企业开展六五环境日活动

2 Estimated based on the assumption that on average, each urban resident in China produces 0.4 kg of municipal waste per day. 根据中国城市居民每天平均产生 0.4 千克生活垃圾来估算。 Now, all WTE facilities under Zheneng Jinjiang Environment have taken the initiative to open to the public. So far, the Company has 12 WTE facilities listed as public open facilities of China's national environmental protection facilities. The public can make an appointment to visit through various channels such as phone call and the Company's WeChat Official Account. In 2022, around 12,000 people including investors, students, non-profit organisations, public institutions and the general public have visited our facilities. The Company will continue to improve the publicity methods, guide the public to participate widely, take the initiative to speak out and act actively in the public forum on ecological environment, promote the construction of a beautiful China to make new and greater progress, and contribute to the "Lucid Waters and Lush Mountains" blueprint.

In addition, Zheneng Jinjiang Environment continues to carry out professional environmental education by actively conducting regular technical exchanges on low vacuum heating, waste storage heating, fly ash reduction and other aspects and screening for pilot studies of applicable technologies, strengthen communication and the bouncingoff of ideas with industry experts, give full play to the technical capabilities of experts and identify and promote valuable technical methods. At the same time, the Company also participated in the compilation of seven industrial standards, for which applications have been submitted, and edited one of the standards, "Evaluation of the Effect of Solid Waste Treatment Equipment with Circulating Fluidized Bed", which is still seeking public opinions, to promote the healthy development of the WTE industry with higher standards. 目前, 浙能锦江环境旗下所有电厂均主动对外开放, 且已有 12 座垃圾发电厂被列为中国国家环保设施公 众开放单位, 公众可通过电话预约、公司微信公众 号等途径进行预约参观。2022年, 已有包括投资者、 学生、公益组织、事业单位和其他群众在内的约 1.2 万余人参观我们的设施。公司将继续改进宣传方式, 引导公众广泛参与, 在生态环境舆论中主动发声、 积极作为, 推动美丽中国建设取得新的更大进展, 让山河大地绿意更浓。

此外,浙能锦江环境持续开展专业环境教育,积极 进行常态化技术交流,在低真空供暖、垃圾库采暖、 飞灰减量化等方面下功夫,筛选适用技术的试点研 究,加强与行业专家的交流与思维碰撞,充分发挥 专家的力量,挖掘好、整理好、推广好优秀的技术 方法。同时,还申报参与7项行业标准的编制工作, 主编一项标准《固废处理装备运行效果评价 循环流 化床》,仍在征求意见中,促进垃圾焚烧发电行业 以更高标准健康发展。



Figure 4: Wuhu Jinjiang WTE Facility in Anhui Province introduced the water-saving methods and processes of the facility through local media 图 4: 安徽省芜湖垃圾发电厂通过当地媒体介绍了电厂节水方式和工艺

#### Table 2: Standards completed in 2022 表 2: 2022 年完成的标准

Category 类别	Name 单位	Status 状态
	Technical Regulations of Municipal Waste Incineration Grate 《生活垃圾焚烧炉排技术规定》	Applied 已申报
	Technical Code for Prevention and Control of Odor Pollution in Municipal Waste Incineration Facility 《生活垃圾焚烧厂臭气污染防治技术规范》	Applied 已申报
	Technical Specification for Carbon Monoxide Control in Municipal Waste Incinerators 《生活垃圾焚烧厂一氧化碳控制技术规范》	Applied 已申报
<b>Co-authored standards</b> 参编标准	Technical Specification for Prevention and Control of Dioxin Pollution from Municipal Waste Incineration Facility 《生活垃圾焚烧厂二噁英污染防治技术规范》	Applied 已申报
	Technical Specification for Furnace Temperature Control of Municipal Waste Incineration Facility 《生活垃圾焚烧厂炉温控制技术规范》	Applied 已申报
	Technical Specifications for the Prevention and Control of Nitrogen Oxide Pollution in Municipal Waste Facility 《生活垃圾焚烧厂氮氧化物污染防治技术规范》	Applied 已申报
	Technical Regulations for Municipal Waste Incinerator Grate《生活垃圾焚烧炉炉排技术规定》	Applied 已申报
<b>Standards as the lead author</b> 主编标准	Evaluation of the Effect of Solid Waste Treatment Equipment with Circulating Fluidized Bed 《固废处理装备运行效果评价循环流化床》	Seeking opinions 征求意见中

In 2023, we will continue to expand the scale of our environmental services and enhance our environmental education programmes by leveraging the power of technology. We anticipate three more facilities to be launched for operation. At the same time, in the medium-term future, we will actively expand resource markets, seek collaborations in the disposal of multiple waste resources, prepare for the development of the several Urban Ecological Complex to fully stimulate the vitality of stock assets.

2023年,我们将继续扩大环保服务的规模,利用科技的力量加强环保教育计划,我们预计将有3个项目投入运营。同时,在近几年,我们将积极拓展资源市场,协同处置多种城市固体废物资源,积极争取储备开发多个城市生态综合体项目,全面激发存量资产活力。

Green operation gives assurance to the sustainable development of economy and society, and also forms an important reference point to measure the core competitiveness of enterprises. Zheneng Jinjiang Environment is determined to implement the deployment and requirements of the 20th NCCPC, promote the deep integration of scientific and technological innovation such as Internet and artificial intelligence with WTE industry, deepen the recycling and utilization of renewable resources, and collaboratively promote carbon reduction, pollution reduction, green expansion and growth, so as to prioritise ecological protection and achieve economy-intensive, green and lowcarbon development.

#### **Green Technology**

In 2022, the Company continued to focus on the main direction of green and low-carbon development, concentrate resources and collaborate on breakthroughs in green core and key technologies, and stimulate and improve the enterprise's green technology innovation capability. Seven subsidiaries were accredited as "National High-tech Enterprises" during the year, including three newly recognized WTE facilities, i.e. Yinchuan Zhongke WTE Facility, Gaomi Lilangmingde WTE Facility and Lianyungang Sunrise WTE Facility, and four WTE facilities, i.e. Wuhan Jinjiang WTE Facility, Hankou Jinjiang WTE Facility, Kunming Wuhua WTE Facility and Xishan Green Energy WTE Facility, successfully passed the review process for accreditation as National High-tech Enterprises. To date, a total of 15 subsidiaries of the Group have been accredited as National High-tech Enterprises. In addition, a total of five subsidiaries were also awarded the title of Provincial-level Specialized Enterprise. Specialized Enterprise refers to small and medium-sized enterprises which exhibit the characteristics of "professionalism, refinement, uniqueness and novelty", and which are also model enterprises that focus on market segmentation, strong innovation ability, high market share, mastery of key core technologies and excellent quality and results.

绿色经营是实现经济社会可持续发展的保证,也是 衡量企业核心竞争力的重要参考依据。浙能锦江环 境坚决贯彻落实党的二十大部署和要求,推动互联 网、人工智能等科技创新与垃圾焚烧发电行业深度 融合,深化可再生资源回收与利用,协同推进降碳、 减污、扩绿、增长,实现生态优先、节约集约、绿 色低碳发展。

Green Operations

绿色经营

#### 绿色技术

2022年,公司继续锚定绿色低碳主攻方向,集中资源、协同攻关突破绿色核心关键技术,激发提升企业绿色技术创新策源能力,7家企业于年内获得" 国家高新技术企业"称号,包括新认定的3家电厂 (银川电厂、高密电厂和连云港电厂)和复审认定的 4家电厂(武昌电厂、汉口电厂、五华电厂、西山电 厂),截止目前浙能锦江环境旗下已有15家企业获 得高新技术企业认定。另外,还有5家企业荣获省 级专精特新企业称号,专精特新企业是指具有"专 业化、精细化、特色化、新颖化"特征的中小企业, 也是专注于细分市场、创新能力强、市场占有率高、 掌握关键核心技术、质量效益优的模范企业。

#### Tangshan Jiasheng WTE Facility Obtained the R&D Institute Certificate 唐山垃圾发电厂获得研发机构证书

In July 2022, having been recognized as a provincial science and technology small and medium-sized enterprise, Tangshan Jiasheng WTE Facility was awarded the Hebei Provincial Industrial Enterprise Research and Development Institute (Grade C) Certificate by Hebei Provincial Department of Industry and Information Technology. This is the recognition of Tangshan Jiasheng WTE Facility's industry-leading research and development and innovation ability by competent government authorities, as well as the affirmation and support of the facility's technological innovation and R&D strength, which has an important influence and far-reaching significance for improving the company's scientific research level, accelerating the process of industrial upgrading, and expanding the company's comprehensive influence in the industry.

2022 年 7 月,唐山垃圾发电厂继被认定为省级科技型中小型企业后,又荣获由河北 省工业和信息化厅颁发的河北省工业企业研发机构(C 级)证书。这是政府主管部 门对唐山垃圾发电厂具备行业领先的研究开发与创新能力的认可,更是对公司技术 创新与研发实力的肯定与支持,对提升公司科研水平,加快产业升级进程,扩大公 司在业内的综合影响力具有重要影响与深远意义。



Figure 5: Tangshan Jiangsheng WTE Facility in Hebei Province obtained the R&D Institute Certificate 图 5: 河北省唐山垃圾发电厂获得研发机构 证书

# *Green Operations* 绿色经营

At the same time, the Company continues to follow the four-step system of "production-level autonomous driving, equipment-level digital twin, facility-level intelligent management and enterpriselevel business brain", comprehensively promote the construction of artificial intelligence ("AI") and intelligent management and control platform, actively organize technology research and explore energy saving space around the pain points and difficulties of subsidiaries. The promotion of AI intelligent incineration systems in 9 WTE facilities including Kunming Jinjiang, Wuhan Jinjiang and Wenling Green Energy were completed within this year. The average system utilization rate exceeded 93%, and the boiler load was increased by over 2%, reaching the expected target. Al intelligent incineration system plays an important role in improving furnace temperature stability and CO control. Compared with manual operation, the temperature stability of an AI controlled furnace increases by 36% and CO emission decreases by 25%. The commissioning of the system has reduced the operations of front-line operators by an average of approximately 85%. By the end of 2022, AI functional incineration projects have been implemented in 13 WTE facilities.

The first phase of Ali Wisdom Management and Control System was officially launched and put into use at the Company headquarters in June 2022. It includes mobile terminal data acquisition system (snapshot), data reliability evaluation system (data collection map), automatic report generation system (intelligent report), automatic report review system (daily and monthly report review), core indicator warning system, management cockpit and large screen display system, etc. A full-attribute Al operation management platform covering "field operation, power plant management and headquarters control" has been established, which breaks through the digital barriers of the Company to some extent and provides a strong guarantee for the formation of data assets of the Company. 同时,公司继续按照"生产级自动驾驶、设备级数 字孪生、电厂级智慧管理、企业级经营大脑"四步 体系,全面推进 AI、智慧管控平台建设,围绕下属 企业的痛点难点积极组织技术攻关、挖掘节能空间, 于年内完成五华、芜湖、温岭等9家垃圾发电厂 AI 智能焚烧系统的推广,平均系统投用率超过93%, 锅炉负荷提升超过2%,达到预期指标。AI 智能焚烧 系统在炉温稳定性提升和 CO 控制方面发挥了重要作 用,相比人工操作,AI 控制的条件下炉温稳定性提 升36%,CO 的排放量下降25%。该系统的投用平均降 低了一线运行人员大约85%的操作量。截至2022 年 底,已累计在13家下属企业实施 AI 智能焚烧系统。

阿里智慧管控系统一期也于 2022 年 6 月正式在公司 总部上线投入使用,包含移动端数据采集系统(随 手拍)、数据可靠性评估系统(数采地图)、报表自 动生成系统(智能报表)、报表自动审核系统(日、 月报审核)、核心指标预告警系统、经营驾驶舱及大 屏展示系统等模块,建立了涵盖"现场操作、电厂 管理、总部管控"全属性的 AI 运营管理平台,在一 定程度上打通了公司的数字化壁垒,为公司形成数 据资产提供有力保证。



Figure 6: The First Phase of Ali Wisdom Management and Control System Phase was launched 图 6: 阿里智慧管控系统一期上线

#### **Green Production**

Zheneng Jinjiang Environment is committed to higher operating standards, reducing energy consumption in the production process, strictly controlling environmental pollutant emissions, strengthening the comprehensive utilization of resources, and enhancing the intrinsic power of green production.

The Company organizes equipment maintenance and inspection regularly to ensure that the equipment is in a good state of performance, so as to ensure good energy efficiency and reduce energy consumption. At the same time, the Company has established internal "Environmental Management Classification and Assessment Regulations". According to the quarterly environmental management results such as environmental accidents, administrative penalties and online monitoring of pollutant emissions, the operational subsidiaries are divided into three grades of A, B and C, further regularising their environmental management behavior. Such classification seeks to prevent and pre-empt risks and improve the level of environmental management. In addition, the Company is also committed to changing the working habits of employees and advocating a green office, by setting suitable temperature of air conditioning, reminding employees to turn off the power when leaving the station for a long time, and other ways to reduce the energy consumption in production and office.

Each operating enterprise of Zheneng Jinjiang Environment has assigned special environmental information management personnel, who are responsible for collecting energy use data regularly and keeping track of the materials and energy injected into the furnace in detail, so that the Company can continuously improve its production and operation. In 2022, 3,764,085 MWh of green electricity and 3.524 million tonnes of steam were generated. Other materials and energy consumption are shown in the table below.

#### 绿色生产

浙能锦江环境致力于以更高的营运标准,减少生产 过程中的能源消耗,严格控制环境污染物排放,加 强资源综合利用率,提升绿色生产内在动力。

公司会定期组织设备维修、巡查和检验,确保设备 处于较好的性能状态,从而保障良好的能源利用效 率,降低能源消耗。同时,公司已建立内部《环境 管理分级评定管理规定》,根据企业每季度内环保 事故、行政处罚及污染物排放在线监控状况等环境 管理结果划分 A 类、B 类、C 类三个等级,进一步规 范下属企业环境管理行为,通过分级评定的方式实 现"事前"防范,提高环保管理水平。另外,公司 还致力于改变员工的工作习惯,倡导绿色办公,通 过设置合适的空调温度、提醒员工在长时间离开工 位时及时关闭电源等方式,减少生产、办公中消耗 的能源。

浙能锦江环境旗下各运营企业均安排了专门的环境 信息管理人员,负责定期收集能源使用数据,详细 记录入炉的物质和能量,以便公司持续改善其生 产运营。2022年公司产生了绿色电力3,764,085 WWh,蒸汽3,524千吨,其他物料和能源消耗参阅下 表。

Table 3: Material Consumption, Energy Consumption, and Green Energy Generation in FY2022 表 3 2022 年物料消耗、能源消耗和产生的绿色能源

Unit 单位	Amount 数量数量
Tonnes 吨	12,629,000
Tonnes 吨	69,577
Tonnes 吨	23,323
Tonnes 吨	3,761
Tonnes 吨	3,401
MWh 兆瓦时	13,747
Tonnes 吨	415,128
Tonnes 吨	3,132
MWh 兆瓦时	3,764,085
'000 Tonnes 千吨	3,524
	Tonnes 吨 Tonnes 吨 Tonnes 吨 Tonnes 吨 Tonnes 吨 MWh 兆瓦时 Tonnes 吨 Tonnes 吨

# *Green Operations* 绿色经营

#### Integrated Resource Utilisation and Pollution Control

Waste gas, waste water and waste slag are involved in the production process of waste incineration power generation. The Company has formulated internal "Environmental Monitoring Management Measures" and timely updated them. Its subsidiaries regularly engage qualified third-party testing companies to carry out monitoring on organized waste gas, sewage, groundwater, solidified ash, noise, slag and other monitoring items. In 2022, all subsidiaries successfully passed the requisite standards under the monitoring reports.

The Company strictly abides by relevant Chinese and local policies. In order to properly monitor emissions, we have installed Continuous Emission Monitoring System (CEMS) in all WTE facilities, and truthfully publish emission data and operation status on the electronic display screen at the gate of each facility. The pollution monitoring system of facilities is connected to the database of the Ministry of Ecology and Environment (the "MEE") of China, meeting the requirements of the MEE on "Install, Display and Connect". At the same time, the Company strengthens the management of flue gas purification process facilities in the production process and strictly abides by the relevant operating procedures to ensure that exhaust emissions meet the national emission standards and relevant laws and regulations. In 2022, Zhongwei Green Energy WTE Facility and Baishan Green Energy WTE Facility officially commenced operations, and despite the new emission sources, the Company achieved reductions in nitrogen oxide emissions of 5,242 tonnes, particulate matter (soot) emissions of 233 tonnes, down by 3 percent and 9 percent, respectively, compared to 2021.

#### 污染控制和资源综合利用

垃圾焚烧发电生产过程中涉及废气、废水及废渣, 对此公司内部已制定《环境监测管理办法》并适时 更新,下属企业定期委托有资质的第三方检测公司 分别对有组织废气、污水、地下水、固化灰、噪声、 炉渣等监测项开展委托监测,2022年所有下属企业 监测报告均合格。

公司严格遵守中国及当地相关政策,为妥善监控废 气排放,我们在所有垃圾焚烧发电厂都安装了排放 连续监测系统 (CEMS),并在厂区门口的电子显示屏 如实公布排放数据和运行状态,监测数据与生态环 境部数据库相连,符合中国生态环境部关于"装、 树、联"的要求。同时公司在生产过程中强化对烟 气净化工艺设施的管理,严格遵守相关操作规程, 确保废气排放满足国家排放标准及相关法律法规。 2022年,宁夏中卫垃圾发电厂和吉林省白山垃圾发 电厂正式投运,尽管新增了排放源,与2021年相比 公司的氮氧化物和颗粒物(烟尘)排放量仍然实现 了降低,分别达 5242吨(下降 3%)和 233吨(下降 9%)。

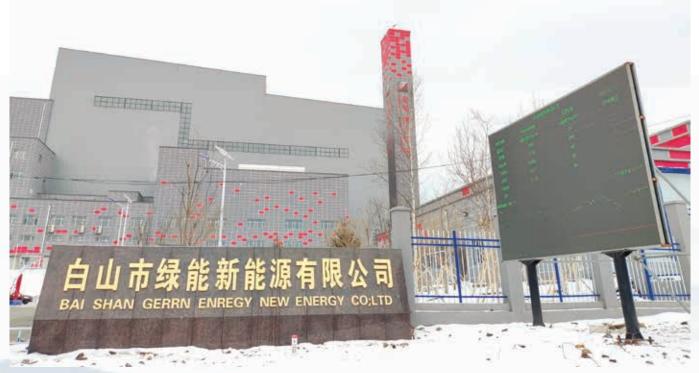


Figure 7: Emission display of Baishan Green Energy WTE Facility in Jilin Province 图 7: 吉林省白山垃圾发电厂展示的排放

The leachate produced by removing excess water from waste before incineration is disposed according to environmental protection standards. In 2022, the leachate produced reached 1.3589 million tonnes. After a series of treatments such as pretreatment, anaerobic, denitrification/nitrification, ultrafiltration, nanofiltration and reverse osmosis, water accounted for about 85%, which met the "Quality of Industrial Water for Municipal Sewage Recycling" (GB/T19923-2005) standards and was used to supplement circulating cooling water in the facility. The remaining 15% can be returned to the furnace for incineration and finally achieve zero emission recycling.

The Company adheres to the strategic policy of developing a circular economy and promoting the comprehensive utilization of resources, adopts the development strategies of expanding the resource recycling industry and implementing resource recycling, and contributes to the achievement carbon peaking and carbon neutrality as a responsible environmental enterprise. Bottom ash is the primary residue after waste incineration, which belongs to general solid waste and the Company works with downstream business partners to recycle it as building materials used in construction, roadbeds and soil restoration. As the fly ash generated is classified as hazardous waste, we strictly follow requirements of prevention and control of pollution of hazardous waste, sending it to landfill to prevent pollution after the fly ash is chelated and solidified to standards or co-processing it with cement kiln. In 2022, 737,907 tonnes of fly ash (hazardous waste) were achieved harmless treatment, while 1,481,725 tonnes of bottom ash (general solid waste) were sent for recycling. In 2023, our WTE facilities aim to continue monitoring the quality of the waste discharged in compliance with environmental legislation.

In 2023, we will further promote the research and development of equipment digital twins and the second phase of intelligent control and management system, as well as plan to comprehensively strengthen the operational mindset of the management personnel to improve the quality of enterprise management. In the medium-term future, we will also continue to promote the coordinated utilization of resources through technological innovation, intelligent technology and alternative fuels, facilitate the transformation of urban ecological complex, strive to improve the efficiency of resource utilization, and contribute to the comprehensive green transformation of the economy and society, so as to achieve the goal of carbon peaking and carbon neutrality as scheduled. Meanwhile we aim to continuously improve our information transparency and openness, improve the environment protection level to increase public participation, ameliorate the "not in my backyard" mindset, and build neighbourhood-type waste treatment facilities. 对于焚烧前去除垃圾中多余水分而产生的渗滤液 按环保要求达标处置,2022年产生的渗滤液达 135.89万吨。经过预处理、厌氧、反硝化/硝化、 超滤、纳滤以及反渗透等一系列处理后,清水占比 约85%,符合《城市污水再生利用工业用水水质》 (GB/T19923-2005),作为厂内循环冷却水补充水, 剩余15%可回炉焚烧处理,最终实现零排放回用。

公司坚持发展循环经济、推进资源综合利用的战略 方针,以拓展资源循环产业和落实资源回收利用为 发展方向,为实现碳达峰、碳中和贡献环保企业力 量。炉渣是垃圾焚烧后的首要残余物,属于一般固 体废物,公司与下游业务伙伴合作,对其进行综合 利用,可用于建筑、路基和土壤修复。而垃圾焚烧 产生的飞灰则属于危险废物,公司严格参照危险废 物污染防治要求,对飞灰进行鳌合固化满足填埋标 准后,送往填埋场填埋,或进行水泥窑协同处理, 杜绝污染。2022年,实现737,907吨飞灰(危险废 物)无害化处置,1,481,725吨的炉渣(一般固废) 被资源综合利用。2023年,我们将继续监测废弃物 排放质量以符合环境法规。

2023 年,我们将深入推进设备数字孪生、智慧管控 二期系统等研发实施,全面强化运营企业管理人员 经营意识,提升企业经营质量。接下来几年,我们 也将继续通过技术创新、智能化、替代燃料等方式 促进资源协同利用,推进城市生态综合体改造,着 力提升资源利用效率,助力经济社会全面绿色转型, 如期实现碳达峰、碳中和目标。同时,持续加强我 们的信息透明度和开放性,提高环保教育力度,以 提升公众参与度,改善邻避效应,建设"邻利型" 垃圾焚烧企业。

# *Addressing Climate Change* 应对气候变化

Climate change is a global issue related to the community of with a shared future for mankind and a major challenge to sustainable human development in the 21st century. Addressing to global climate change and achieving the goal of carbon peaking and carbon neutrality is an important part of ecological civilization construction and ecological risk management.

Driven by the policy of creating synergy from pollution management and carbon emissions reduction, the WTE industry is not only making continuous efforts in reducing pollution, but also shouldering more responsibility in reducing carbon footprint. Zheneng Jinijang Environment understands the importance of addressing climate change and is committed to improving our climate adaptability in order to achieve long-term sustainable operations. Notwithstanding that the Group does not operate in any industry identified by the Task Force on Climate-related Financial Disclosures ("TCFD") as most affected by climate change as outlined in paragraph 4.9 of Practice Note 7.6: "Sustainability Reporting Guide" of the Listing Manual, to demonstrate the Group's commitment to integrating climate change management into its sustainability framework, in this year's report, the Group has for the first time voluntarily provided climate-related information to stakeholders and the public with reference to the framework of the TCFD.

#### About TCFD

In December 2015, the Financial Stability Board under G20 established the industry-led TCFD to develop climate-related disclosures that can promote more informed investment, credit and insurance underwriting decisions, and also enable stakeholders to better understand the concentrations of carbon-related assets and the exposures to climate-related risks. The TCFD has gained widespread acceptance in international markets as a common framework to disclose climaterelated financial information.

Areas of disclosure recommended by the TCFD include governance, strategy, risk management and metrics and targets.

气候变化是关系人类命运共同体的全球性问题,是 21世纪人类可持续发展面临的重大挑战。应对全球 气候变化,实现碳达峰和碳中和的目标,是生态文明 建设的重要内容,是生态风险治理的重要组成部分。

在减污降碳协同增效政策推动下,垃圾焚烧发电行 业不仅在"减污"中持续发力,更在"降碳"领域 肩负起更多使命。浙能锦江环境深知应对气候变化 的重要性,并致力于提升我们的气候适应能力,以 求实现长期的可持续运营。尽管本集团并未在上市 手册实践说明7.6"可持续发展报告指南"第4.9段 所述的气候相关财务信息披露工作组("TCFD")确 定的受气候变化影响最大的任何行业开展业务,为 显示集团将气候变化管理纳入其可持续发展框架的 承诺,在本年度的报告中,集团第一次参照TCFD的 框架,主动为利益相关者和公众提供气候相关信息。

#### 关于气候相关财务信息披露工作组

2015 年 12 月,由 G20 辖下的金融稳定委员会成立了 由行业主导的 TCFD,以制定与气候相关的信息披露, 促进更明智的投资、信贷和保险承保决策,也能使 利益相关者更好地了解碳相关资产的集中情况,以 及对气候相关风险的敞口。TCFD 作为与气候相关的 财务信息披露的通用框架,已在国际市场上得到广 泛认可。

TCFD 建议披露的领域包括治理、策略、风险管理、 指标和目标。



#### Governance

The Board is ultimately responsible for the long-term management of the Group. Addressing climate change and the risks it entails is an important task for the Board. The Group has incorporated sustainable development governance into its corporate governance structure and established a three-level management structure of group, business and project, as shown below.

#### 治理

董事会对集团的长期管理负有最终责任。应对气候 变化及其带来的风险是董事会的重要任务。集团已 将可持续发展治理纳入公司治理架构中,建立起集 团、业务、项目三级管理架构,具体如下。

Group Level 集团层面	Board of Directors 董事会
	Consisting of two executive directors and three independent non-executive directors 由 2 名执行董事和 3 名独立非执行董事组成
	Responsible for advising, where applicable, the direction of sustainability management 负责在适用情况下为可持续性管理的方向提供建议
	Reports to 汇报  Advises 建议
	Sustainability Steering Committee 可持续发展指导委员会
	Consisting of six senior executives and is chaired by the Executive Chairman of th Company, who also reports to the Board of Directors on behalf of the SSC 由 6 名高级管理人员组成,由公司执行董事长担任主席,他也代表 SSC 向董事会报告
	Responsible for developing sustainable development strategies, providing guidance ar support for sustainable development efforts, including in relation to climate change ris management, managing overall performance and reporting to the Board 负责制定可持续发展战略,为可持续发展工作提供指导和支持(包括关于气候变化风险 理),管理整体表现并向董事会报告
	Report to 汇报 🔃 Oversees 监督
	ESH Management Committee (Formerly known as Safety Production Management Committee) ESH 管理委员会 ( 以前称为安全生产管理委员会 )
	The Executive Chairman of the Company serves as the chairman of this committe the Deputy General Managers in charge of production and engineering serve as th vice-chairmen, and 3 deputy general managers and 9 heads of functional departmen serve as members 由公司执行董事长担任委员会主任,负责生产和工程的副总经理担任副主任,3名副总经 和9名职能部门负责人担任委员
	Responsible for environmental, social, health and workplace safety manageme (including, specifically, climate change risk management) as a useful complement to th Sustainability Steering Committee 负责环境、社会、健康及安全生产方面的管理工作(包括气候变化风险管理),作为可持续

Report to 汇报 🚺 Oversees 监督

Business Level 业务层面	Enterprise Management Department ("EMD") 企业管理部	Risk Control Department 风控部
	Responsible for supervising the implementation and performance of subordinate enterprises in terms of environment, health and safety, including the implementation of climate change management measures 负责监督下属企业环境、健康及安全生产方面 的执行和表现,包括气候变化管理措施的执行	Responsible for identifying and monitoring sustainable development risks in the production process and proposing mitigation measures, developing appropriate internal monitoring and risk management systems and reviewing their effectiveness annually 负责识别、监督生产过程中存在的可持续发 展风险并提出缓解措施,制定适当的内部监 控及风险管理制度,每年定期审查其有效性
	Report to 汇报 😯	Oversees 监督

Project Level<br/>项目层面Safety and Environmental Management Department<br/>安全与环境管理部Each subsidiary has a safety and environmental management department, which is<br/>responsible for implementing the sustainable development plan and monitoring its own<br/>sustainable development performance<br/>下属企业均设有安全与环境管理部,负责落实可持续发展计划并监督自身可持续发展表现

In 2022, the Executive Chairman presented a report at each quarterly Board meeting on the challenges and new opportunities the Group was faced with, including continued use of AI technology to improve waste treatment capacity and reduce carbon emissions. The Chairman is actively involved in and responsible for the Group's strategic direction and progress on this important issue, and senior management is responsible for identifying, researching and managing market risks associated with our business (including those arising from climate change). In the face of frequent extreme weather events and continuously high temperature brought by climate change, the subsidiaries made timely reports to the EMD of the Company, and the EMD investigated and consolidated the relevant situation and reported to the management of the Company. The management will assess and evaluate the impact of the event, and make prompt decisions and call ESH meetings where necessary to discuss and study the solutions, which will be implemented top-to-bottom to ensure that the subsidiaries strictly implement the relevant solutions and ensure the health and safety of employees.

#### Strategy

As part of our business processes, we recognize that understanding and managing key climate risks and opportunities contributes to business sustainability. We have begun to adopt the TCFD's disclosure recommendations by identifying 3 physical risks, 4 transition risks and 3 opportunities that we believe are relevant to our business, specifying their potential financial impact<sup>3</sup> and impact duration<sup>4</sup>. We will add scenario analysis to our future disclosures. 2022年,执行董事长在每季度的董事会会议上提交 报告,介绍集团面临的挑战和新机遇,包括持续利 用 AI 技术,提升垃圾处理能力,减少碳排放。董事 长积极参与并负责集团在这一重要议题上的战略方向 和进展,高级管理人员负责识别、研究和管理与我们 业务相关的市场风险(包括气候变化引起的风险)。 在面对气候变化带来的恶劣天气频发和持续高温时, 下属企业及时向公司企业管理部反映,企业管理部 了解、整理相关情况并向公司领导汇报,公司领导判 断、评估事件影响程度,第一时间部署决策,必要时 召开 ESH 会议讨论、研究解决措施,层层落实,确保 下属企业严格执行相关解决方案并保证人员健康安 全。

#### 战略

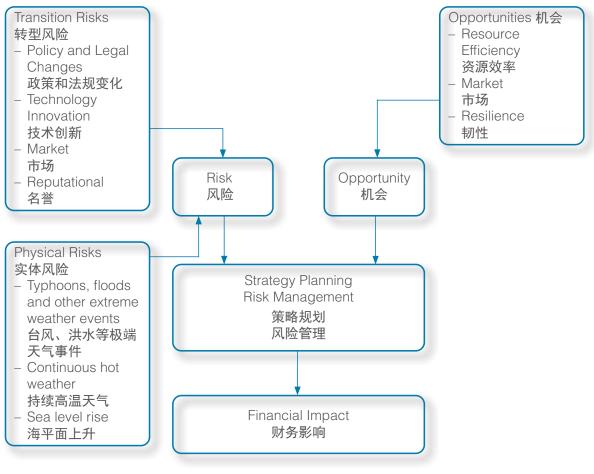
作为业务流程的一部分,我们认识到了解和管理主 要气候风险和机遇有助于实现业务的可持续发展。 我们已开始采纳 TCFD 的披露建议,识别了我们认 为和我们业务有关的 3 项物理风险、4 项转型风险和 3 项机会,明确它们的潜在财务影响<sup>3</sup>和影响时长<sup>4</sup>。 我们将在以后的披露中增加情景分析。

3 Financial impact is classified into five levels: (1) High: \$\$50 million or more; (2) Medium-high: \$\$35 million to \$\$50 million; (3) Medium: \$\$20 million to \$\$35 million; (4) Medium-low: \$\$10 million to \$\$20 million; (5) Less than \$\$10 million.

财务影响分为 5 个级别: (1) 高: 5,000 万新币或以上; (2) 中高: 3,500 万新币-5,000 万新币; (3) 中: 2,000 万新币-3,500 万新币; (4) 中低: 1,000 万新币-2,000 万新币; (5) 少于 1,000 万新币。

影响时长分为 3 个级别: (1) 短期: 不超过 2 年; (2) 中期: 2-5 年; (3) 长期: 5 年及以上。

<sup>4</sup> The impact duration is divided into three levels: (1) Short-term: no more than 2 year; (2) Middle term: 2-5 years; (3) Long-term: 5 years and above.



#### 1) Transition Risks

 Policy and Legal Changes Impact duration: Medium to long term Financial Impact degree: Medium to low

Our principal business is mainly in China, where the Chinese government has proposed the goal of achieving carbon peaking and carbon neutrality and may adopt more stringent standards or other environmental laws or regulations in the future. The regulatory policies for the WTE industry (such as emission regulation, carbon pricing, etc.) may also change, and we may have to incur additional costs or suspend operations of WTE facilities to comply with relevant new laws and regulations that apply to our operations could result in significant penalties or fines. In this event, our financial position and operations may be adversely affected.

The Company will strengthen communication with various regulatory authorities, timely comply with relevant laws and regulations adjustment, and take the initiative to implement countermeasures. At the same time, we will improve internal management, advocate the concept of sustainable development from top to bottom and practice low-carbon production and lifestyles so as to develop awareness and improve responsiveness in relation to any regulatory or policy change. Further information on the Company's track record in practicing low-carbon production and lifestyles can be found in the "Green Technology" section on page 55 of this Report.

#### 1) 转型风险

政策和法规变化
 影响时长:中长期
 财务影响程度:中低

我们的主营业务主要在中国,中国政府已提出碳达 峰、碳中和目标,未来可能采纳更严格的标准或其 他环境法律或规定,针对垃圾发电行业的监管政策 (如排放监管、碳定价等)也可能会发生变化,我们 可能要承担额外成本或暂停垃圾焚烧发电厂的经营, 以遵守相关新订法律和法规。不遵守适用我们经营 的相关行业规则及环境法律和法规可能导致严重处 罚或罚款。在这种情况下,我们的财务状况及经营 业绩可能受到不利影响。

公司将加强与各监管部门的沟通联系,及时遵守相 关法律法规调整,并主动实施应对措施。同时,提 升内部管理,自上而下倡导可持续发展理念,践行 低碳生产和生活,以提高对任何监管或政策变化的 意识和反应能力。关于公司在践行低碳生产和生活 方面的详情可参阅本报告第55页"绿色经营"部分。

### Addressing Climate Change 应对气候变化

Technology Innovation
 Impact duration: Short term
 Financial Impact degree: Low

Our business relies heavily on continuously upgrading technology, especially in a carbon peaking and carbon neutrality context where the transition to low carbon technology is even more important. Although we continue to improve our technology, there is a possibility that new technologies may not be successfully applied, which may increase our R&D expenditure and operating costs, thereby affecting our financial performance.

The Company will continue to promote technological innovation, promote the deep integration of production, education and research, introduce and train professional and technical talents, stimulate innovation vitality, gradually realize intelligent transformation and upgrading, create urban ecological complex, and build "zero-waste" and "garden-style" factories. Further information on the Company's track record in technology innovation can be found in the "Green Technology" section on page 55 of this Report.

 Market Impact duration: Short term Financial Impact degree: Low

The process of waste incineration power generation requires a certain level of input of materials. The price of materials is subject to market fluctuations, and there may be a risk of price inflation, thus increasing our operating costs.

The Company will strengthen communication with existing suppliers to promptly monitor market price changes and expand its supplier list to find better suppliers or cost-effective alternative materials. At the same time, through technology development, the Company will reduce the consumption of materials as much as possible without compromising the quality of waste treatment.

 Reputational Impact duration: Medium to long term Financial Impact degree: Medium to low

Due to concerns about environmental quality, WTE is one of the industries in China where the "not in my backyard" mindset is the most prominent and public misconceptions persist as to the nature of the industry. Increase in industry stigma or stakeholder concerns and negative feedback may increase the cost of ESG disclosure and climate risk management for the Group, as well as affecting the Group's talent recruitment and retention appeal.

The Company will strengthen communication and contact with the public and stakeholders to help them understand the social and environmental benefits of WTE business by improving the variety, outreach and frequency of environmental education, so as to eradicate misconceptions and transform the "not in my backyard" mindset into "neighborhood" mindset.

技术创新 影响时长:短期 财务影响程度:低

•

我们的业务在很大程度上依赖于不断更新的技术, 特别是在双碳背景下,低碳技术转型更为重要。尽 管我们持续进行技术提升,但新技术存在无法成功 应用的可能性,这可能会增加我们的研发支出和运 营成本,从而影响财务表现。

公司将持续推动技术创新,推进产学研深度融合, 引进、培养专业技术人才,激发创新活力,逐步实 现智能化转型升级,打造城市生态综合体,建设"无 废工厂"和"花园式工厂"。关于公司在技术创新 方面取得的成果详情可参阅本报告第55页"绿色技 术"部分。

市场
 影响时长:短期
 财务影响程度:低

垃圾焚烧发电的过程中需要投入一定的物料,而物 料价格受市场波动,可能存在物料成本上涨的风险, 从而增加我们的运营成本。

公司将加强与现有供应商的沟通,及时了解市场价 格变化;还将拓宽供应商名录,寻找更优质的供应 商或性价比高的替代物料;同时通过技术开发,在 保证垃圾处理质量的前提下尽可能减少物料的消耗。

名誉
 影响时长:中长期
 财务影响程度:中低

出于对环境质量等方面的担忧,生活垃圾焚烧发电 是中国"邻避效应"较为突出的行业,公众对该行业 的性质一直存在误解。行业污名化加剧或利益相关 者的关注与负面回馈日益增加,可能会增加集团在 ESG 披露和气候风险管理方面的成本,也会影响集 团人才招聘和留任吸引力。

公司将加强与公众和利益相关者的沟通与联系,通 过丰富环境教育形式、加大教育频次,以消除误解, 化"邻避效应"为"邻利效应"。

#### 2) Physical Risks

• Typhoons, Floods and Other Extreme Weather Events Impact duration: Short term Financial Impact degree: Medium to low

The increased frequency and intensity of extreme weather events, such as typhoons, will increase health and safety risks for employees working outdoors, may also damage our buildings, facilities and public infrastructure (such as power cables), and affect traffic and waste transport roads, which in turn can cause operational disruptions, and reduced revenues. There will also be increased capital investment in maintenance and/or the need for more climate-resilient infrastructure.

Continuous hot weather
 Impact duration: Medium term
 Financial Impact degree: Low

Continuous hot weather will increase workplace temperatures, increase health risks for employees and also lead to increased investment in on-site environmental treatment of WTE facilities.

• Sea level rise Impact duration: Medium term Financial Impact degree: Medium to low

Sea levels rise could lead to storm surges and potentially impact to facilities near coastal areas that are at greater risk, which in turn could lead to higher insurance premiums or assets becoming uninsurable, resulting in higher operating costs.

To mitigate physical risks, the Company will continue to strengthen emergency preparedness for rapid response and recovery from unexpected events, regularly conduct inspections and assessments on disaster prevention and loss prevention, test severe weather-related protection measures and emergency inventory levels, and improve employees' ability to prevent and handle accidents through training and rehearsal. At the same time, we will undertake regular maintenance of key equipment to reduce fault variation and extend operating hours, and select several strong and credible insurance companies to underwrite the insurance policies.

#### 3) **Opportunities**

 Resource Efficiency Impact duration: Medium to long term Financial Impact degree: Medium to low

Climate change will encourage the Company to make technological improvements, adopt more efficient production processes, promote resource recycling, enhance the Company's overall value chain and increase revenue. At the same time, the carbon trading market brought about by climate change is also conducive to attracting more investors to the WTE industry.

 Market Impact duration: Medium to long term Financial Impact degree: Medium to low

#### **2)** 实体风险

 台风、洪水等极端天气事件 影响时长:短期 财务影响程度:中低

台风等极端天气事件的频率和强度增加,会增加户 外工作员工的健康和安全风险,也可能会破坏我们 的建筑物、设施和公用基础设施(如电缆等),并影 响交通和垃圾运输道路,进而造成运营中断、收入 下降,也会增加维修工作的资本投资和/或需要配 备更具气候适应能力的基础设施。

 持续高温天气 影响时长:中期 财务影响程度:低

持续的高温天气将会使工作场所温度升高,增加员 工健康风险,也会造成垃圾焚烧发电厂现场环境治 理投入加大。

 海平面上升 影响时长:中期 财务影响程度:中低

海平面上升可能会导致风暴潮,并对沿海地区附近 的设施造成潜在影响,这些地区面临更大的风险, 进而导致保费提高或者资产难以承保,从而使得营 运成本增加。

为缓解实体风险,公司将继续加强针对突发事件的 快速反应和恢复的应急准备,定期进行防灾防损检 查和评估,检测恶劣天气相关保护措施和应急物资 保障,通过培训、演习提高员工事故预防和处理能 力。同时对关键设备进行定期检修,减少故障变化 并延长运行时间,选择数家保险实力强的保险公司 共同承保。

#### 3) 机会

资源效率 影响时长:中长期 财务影响程度:中低

气候变化会促使公司进行技术提升,采用更高效的生产工艺,促进资源的回收再利用,提升公司整体价值链,增加收入;同时气候变化带来的碳交易市场,也有利于吸引更多投资人看好垃圾焚烧发电行业。

市场 影响时长:中长期 财务影响程度:中低 Addressing Climate Change 应对气候变化

In response to climate change, governments may introduce incentives or regulations for energy efficiency and reduce carbon emissions, and the Company may further increase the revenue and enhance the diversification of its financial instruments (such as green bonds and asset-backed security).

Resilience Impact duration: Medium to long term Financial Impact degree: Low

Climate change will create ESG investment opportunities. Investors will look to the Company's ESG performance when investing, as well as the Company's implementation of sustainable waste treatment solutions (such as urban ecological complex), which will enhance the Group's reputation and market valuation.

Faced with new opportunities under the background of "carbon peaking and carbon neutrality", waste incineration power generation is the most important subdivision field of environmental protection to participate in carbon emission trading. The Company has launched the CCER pilot project of Kunming Wuhua WTE Facility in Yunnan Province, and is currently in the phase of emission reduction verification and certification. In addition, in order to seize the opportunities, the Company will continue to strengthen its technology development and innovation, improve its waste treatment capacity and operational efficiency, and actively explore alternative waste management models, while improving the transparency and comprehensiveness of ESG disclosure, and continuously improving its information disclosure in accordance with the highest international standards.

#### **Risk Management**

Zheneng Jinjiang Environment has developed an ongoing risk management framework to measure and manage the risks and opportunities associated with our business to ensure the Group can continue to weather the impact of climate change in its operations and development and safeguard the interests of shareholders, as shown in the chart below. Further information on the Company's identified climate change risks and the measures undertaken to manage these risks can be found in the "Strategy" section on page 62 of this Report.

为应对气候变化,政府可能会出台一些节能减碳的 奖励办法或规定,公司可进一步提高收入,并提升 金融工具的多元化(如绿色债券和资产支持证券)。

韧性 • 影响时长:中长期 财务影响程度:低

气候变化会带来 ESG 方面的投资机会,投资者在投 资时会参照公司 ESG 方面的表现,以及公司实施的 可持续的垃圾处理方案 (如城市生态综合体),均将 提高集团的声誉和市场估值。

面临着"双碳"背景下的新机遇,垃圾焚烧发电是 环保领域参与碳排放交易最重要的细分领域,公司 已启动云南省昆明五华垃圾发电厂 CCER 试点,目前 处于减排量核查和核证阶段。此外,为抓住机会, 公司将持续加强技术研发和创新,提高垃圾处理能 力和运营效率,积极探索废弃物管理替代模式,同 时提高 ESG 披露的透明度和全面性,按照国际最高 标准不断改进其信息披露。

#### 风险管理

浙能锦江环境制定了一套持续的风险管理框架, 旨 在衡量和管理与我们业务相关的风险和机遇,确保 集团在气候变化影响下能持续稳健经营发展,并维 护股东利益,具体见下图。关于公司确定的气候变 化风险和为管理这些风险采取的措施详情可参阅本 报告第 62 页"战略"部分。



ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED

At the same time, we have also developed a comprehensive internal control system for key business processes to address financial, operational, compliance and information technology risks as well as risk management issues. The Company has commenced, and is in the process, of incorporating the identified processes relating to sustainability reporting into the internal audit plan, which will cover key aspects of the sustainability report, over the next audit cycles in the coming years. The internal review will be conducted in accordance with the International Standards for the Professional Practice of Internal Auditing issued by The Institute of Internal Auditors. The Audit and Risk Management Committee reviews the risk profile at least once a year. Please refer to page 126 of the Annual Report for more information on the Company's internal controls and risk management systems.

#### **Metrics and Targets**

In December 2022, in order to further improve the quality of carbon emission data, improve the mechanism of the national carbon emission trading market system, and enhance the scientific rigor, reasonableness and feasibility of technical specifications, the Ministry of Ecology and Environment of China issued the "Guidelines on Enterprises' Greenhouse Gas Emission Accounting and Reporting for Power Generation Facilities" and the "Guidelines on Enterprises' Greenhouse Gas Emission Verification Technology for Power Generation Facilities" (the "Guidelines"), which shall take effect from 1 January 2023.

In February 2023, the Ministry of Ecology and Environment of China issued the "Notice on the Administration of Enterprises' Greenhouse Gas Emission Reporting in the Power Generation Industry for 2023 to 2025", specifying that the power generation industry will be included in the annual list of key emitters in the national carbon emission trading market. It includes power generation enterprises identified by the latest inspection results, those whose annual emissions from new operations are expected to reach 26,000 tonnes of carbon dioxide equivalent (with comprehensive energy consumption reaching 10,000 tonnes of standard coal), and biomass power generation enterprises (excluding enterprises that use pure biomass for power generation).

Except Zhuji Bafang Facility in Zhejiang Province, all the WTE facilities under the Group are pure biomass power enterprises and are not included in the above mentioned report management for the time being. The Group will consider to disclose the metrics and targets for climate change in the future years, with reference to (1) the Clean Development Mechanism (CDM) greenhouse gas emission calculation method under the "United Nations Framework Convention on Climate Change", and (2) the calculation method described in the Guidelines. We will also gradually expand the scope of greenhouse gas emissions to be included in calculations. 同时,我们也为主要业务流程制定了一套全面的内 部控制体系,以处理财务、业务、合规、信息技术 和风险管理等问题。公司已开始并正在将已确定的 与可持续发展报告有关的程序纳入内部审计计划, 该计划将在未来几年的下一个审计周期中涵盖可持 续发展报告的主要方面。内部审查将根据内部审计 师协会发布的《内部审计专业实践国际标准》进行。 审计和风险管理委员会至少每年审查一次风险概况。 有关本公司内部控制和风险管理系统的更多信息, 请参阅年报 126 页。

#### 指标和目标

2022 年 12 月,为进一步提升碳排放数据质量,完善 全国碳排放权交易市场制度机制,增强技术规范的 科学性、合理性和可操作性,中国生态环境部发布 《企业温室气体排放核算与报告指南发电设施》《企 业温室气体排放核查技术指南发电设施》("指 南"),自 2023 年 1 月 1 日起施行。

2023 年 2 月,中国生态环境部发布《关于做好 2023-2025 年发电行业企业温室气体排放报告管理 有关工作的通知》,明确发电行业纳入全国碳排放 权交易市场的年度重点排放单位名单,包括最近一 次核查结果确认以及上年度新投产预计年度排放量 达到 2.6 万吨二氧化碳当量(综合能源消费量达到 1 万吨标准煤)的发电行业企业,且生物质能发电中不 包括纯使用生物质发电的企业。

除浙江省诸暨八方电厂外,集团旗下垃圾发电厂均 为纯使用生物质发电企业,暂不纳入上述报告管理, 集团将考虑在后续参照(1)《联合国气候变化框架公 约》下的清洁发展机制(CDM)温室气体排放计算方 法,和(2)指南所述计算方法披露气候变化的指标和 目标,并逐步扩大纳入计算的温室气体排放范畴。

# *Talent Training and Advancement* 人才培养与提升

To promote high-quality development, talent is the primary resource and innovation is the primary driving force. Talent is the most vibrant and positive contributing factor to innovation activities. Zheneng Jinjiang Environment is carrying out in-depth implementation of the strategy of strengthening the enterprise with talents and adheres to the principles of trusting, respecting, and caring of talents to drive innovation at all levels and maximise talent contribution to high-quality development.

#### **Trust Talents**

Trust in talent means to actively seek, identify, recommend and utilise talents so as to better enable talents in leading and supporting the development of the Company. In 2022, the Company adhered to the principle of meritocracy and matched each candidate to an appropriate position in its recruitment efforts. Through social recruitment and campus recruitment, the Company has supplemented the talent team to ensure that all talents are deployed effectively.

In 2022, we had 384 new employees and 401 instances of employee turnover. The overall annual new hires rate was 15.6% and the annual turnover rate was 16.3%.

推动高质量发展,人才是第一资源,创新是第一动 力。人才更是创新活动中最为活跃、最为积极的根 源性要素。浙能锦江环境深入实施人才强企战略, 坚持信任人才、尊重人才、关爱人才,更好地以人 才引领驱动各层次各方面创新,为高质量发展贡献 "最大增量"。

#### 信任人才

信任人才,就是要努力做到寻觅人才求贤若渴、发现人才如获至宝、举荐人才不拘一格、使用人才各尽其能,更好发挥人才对公司发展的引领和支撑作用。2022年,公司坚持按岗择人、量能用人,通过 社会招聘和校园招聘,补充人才队伍,做到用当其 长、用当其时、用当其位,确保各类人才得到最佳 配置、发挥最大效能。

2022 年入职新员工为 384 人, 离职人员为 401 人, 整体年度员工入职率为 15.6%, 年流动率为 16.3%。

	New Hire	New Hires 新员工		Turnovers 流动	
FY2022	Number of Individuals 个人数	Proportion 占比	Number of Individuals 个人数	Proportion 占比	
By Age Group 按年龄层					
< 30 years old <b>30 岁以</b> 下	174	45.3%	170	42.4%	
30 – 50 years old <b>30-50岁</b>	196	51.0%	209	52.1%	
> 50 years old <b>50岁以上</b>	14	3.65%	22	5.5%	
By Gender 按性别					
Male <mark>男性</mark>	314	81.8%	326	81.3%	
Female女性	70	18.2%	75	18.7%	
By Region 按地区					
China中国	368	95.8%	370	92.3%	
Singapore新加坡	0	_	0	_	
India印度	16	4.2%	31	7.7%	
Germany德国	0	_	0	_	

Table 4: Employee New Hires	and Turnover by Age Group, Gender and Region in FY2022
表 4 按年龄层、	性别和地区的 2022 财年新进员工和离职员工

#### Talent Training and Advancement 人才培养与提升

As of 31 December 2022, Zheneng Jinjiang Environment has a total of five board members and 2,456 permanent employees giving full play to their strengths in different fields. The charts below provide a quantitative measure of board and employee diversity. Please also refer to page 98 of the Annual Report for more information on the Company's Board Diversity Policy and, among other things, the Company's targets to achieve diversity on its board.

截至 2022 年 12 月 31 日,浙能锦江环境共有 5 名董 事会成员和 2,456 名长期员工在不同领域发挥所长。 下面的图表提供了董事会和员工多样性的量化指标。 有关公司董事会多元化政策的更多信息,以及公司 实现董事会多元化的目标等,请参阅年度报告 98 页。



# Talent Training and Advancement 人才培养与提升



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#### **Respect Talents**

To respect talents is to respect their growth trajectory. We need to scientifically design models and paths for their development, and resolutely break away from practices and concepts that restrict their growth and give full play to their role. Our human resources policy is based on equal opportunities and fair employment, and eliminating employment discrimination based on factors such as gender, age, race, religion, nationality and education. The system consists of five plans, namely "Baby Eagle Plan", "Flying Eagle Plan", "Soaing Eagle Plan", "Strong Eagle Plan" and "Leading Eagle Plan", which together constitute the Company's strategic talent pool.

#### 尊重人才

尊重人才,就是要尊重人才成长规律,科学设计各 类人才培养模式、成长路径,坚决破除束缚人才成 长和限制人才充分发挥作用的做法和观念。我们的 人力资源政策以平等机会和公平就业为基础,不以 性别、年龄、种族、宗教、国籍、学历等作为用人 标准,公司已构建科学的战略人才培养体系,着力 培养更多适应高质量发展的各类人才,该体系主要 由"雏鹰计划"、"飞鹰计划"、"翔鹰计划"、"雄 鹰计划"和"领鹰计划"五个部分组成,共同构成 公司战略人才库。

Baby Eagle Plan started in 2015, based on the Company's strategic planning, which addresses to the Company's need for talents for its rapid development by establishing a talent reservoir, building a fresh force for the enterprise, and introducing outstanding graduates from reputable domestic and international universities through a rigorous training programme.

Employees who enrolled in the Baby Eagle Plan will undergo a 3-5 year training cycle and will be subject to three stages of evaluation.

• The first stage (first entry year)

Through the three aspects of centralized training, base rotation probation training and base internship training, employees will complete the transformation from students to enterprise personnel, develop their sense of commitment and team spirit, cultivate the ability to independently operate specific tasks and independently attend to simple contingencies in work.

• The second phase (in 2-3 years) and the third stage (in 3 to 5 years)

Through a series of programmes such as annual outreach training, online learning through online academies, project visits, management topic discussion, rotational training, competition recruitment, serving as lecturers, acting as school recruiting ambassadors, employees can develop a higher sophistication relative to a specific post to post personnel, develop their ability to think independently about problems and come up with proven solutions, develop communication skills, undergo mindset training and be exposed to basic management tools.

2022 is the eighth year of Baby Eagle Plan. As at 31 December 2022, there are 59 employees with 2 PHDs, 8 masters and 49 undergraduates, among which 2 have been promoted to middle management of the Company, 23 to middle management of subordinate enterprises and 5 to professional technical team of the Company.

雏鹰计划始于 2015 年,是基于公司战略规划,适应公司高速发展对人才的需求,建立人才蓄水池,打造企业生力军,经严格测评程序从国内外优秀学府引进优秀毕业生并进行专项培养的人才投资项目。

纳入雏鹰计划的员工将会经历 3-5 年的培养周期,并需经过三个阶段的评审考核。

• 第一阶段(入职第1年)

通过入职集中培训、基地轮岗见习培养、基地顶岗实习培养三个方面,使员工完成从大学生到企业人员的转变,开发员工艰苦创业意识及团队精神,具备独立操作特定岗位且独立解决工作中简单的突发问题。

• 第二阶段(入职 2-3 年)和第三阶段(入职 3-5 年)

通过年度拓展培训、网络学院线上学习、项目参观、管理课题研讨、轮岗培养、竞聘挂职、担任授课讲师、校招形象大 使等方式,促使员工从企业人向岗位人转变,开发员工独立思考问题的能力,并提出行之有效的解决方案;培养沟通技巧、 思维方式的训练,接触基础管理工具等。

2022 年已经是雏鹰行动的第八年,截至 2022 年 12 月 31 日有博士 2 人,硕士 8 人,本科生 49 人,共计 59 人,其中 2 名 已晋升为公司中层管理人员,23 名已晋升为下属企业中层管理人员,5 名充实到公司专业技术团队。

We also provide systematic, appropriate and ongoing training opportunities for all employees. We tailor training and development programmes to their learning needs, including career skills, leadership skills and language and communication skills. In 2022, the Company continued to deepen talent training, effectively coordinated subsidiaries to carry out on-site regional training to improve work efficiency and organizational effectiveness. At the same time, more than 500 internal enterprise courses are integrated to continuously promote the use of online academies, which aims to help new employees complete their onboarding training and meet the training needs of managers and various technical personnel, including trainees of Baby Eagle Plan. In 2022, the total training time of Zheneng Jinjiang Environment employees was 299,279 hours and the average training time per employee was 122 hours. In 2023, we will continue to provide training and career development programs with the goal of an average of at least 130 hours of training per employee per year.

我们也为所有员工提供系统、合适和持续培训的机 会,根据员工的学习需求,为其量身定制培训和发 展计划,其中包括职业技能、领导技能以及语言沟 通技巧。2022年,公司继续深化人才培训,有效统 筹下属企业开展线下区域培训,提升工作效率和组 织效能;同时整合内部企业课程500余门,持续推 动线上学院的使用,线上学院旨在帮助新员工完成 入职培训,满足包含雏鹰学员在内的管理人员及各 类技术人员的培训需求。2022年,浙能锦江环境员 工培训总时长为299,279小时,每名员工平均培训 时间为122小时。在2023年,我们将继续提供培训 和职业发展计划,目标是每位员工每年平均接受至 少130小时的培训。

# *Talent Training and Advancement* 人才培养与提升

#### Table 5: Average Hours of Training by Gender and Employee Category in FY2022 表 5:2022 年按性别和雇员类别的培训时长

FY2022 2022 年	Average Hours of Training per Permanent Employee per Year (Hours) 每位员工每年的平均培训时长(小时)
By Gender 按性别	
Female 女性	123
Male 男性	122
By Employee Category 按雇员类别	
Associate 职员	125
Middle management 中层管理	62
Senior management 高级管理	30
Overall 总计	
Overall 总计	122

# Zheneng Jinjiang Environment Carried Out Regional Training 浙能锦江环境开展区域培训

From 28 July to 29 July 2022, Zheneng Jinjiang Environment Regional Training for Zhejiang Region was held in Wuhu, Anhui Province, with the theme of "Experiential Objectives and Key Results ("OKR")". It was organized by Wuhu Jinjiang WTE Facility, with the participation of Wenling Ecological Industrial Park, Zhuji Bafang Facility and Xiaoshan Jinjiang WTE Facility. The training is an experiential activity that guides participants to complete the target tasks after two reviews by simulating a series of goals to be set upon first establishing a company, such as mission, vision and values.

2022 年7月28日-7月29日,浙能锦江环境浙江片区区域培训在安徽芜湖召开,以"体验式 OKR (Objectives and Key Results,目标与关键成果)"为主题,由芜湖垃圾发电厂承办,温岭生态产业园、诸暨八方电厂、萧山垃圾发电厂共同参与。该培训是通过模拟公司创立时需制定的使命、愿景、价值观等一系列目标,指导参与成员经过两次复盘完成目标任务的体验式活动。

Through experiential learning and group competition, the training imparts knowledge in a fun way. The trainer's lecture gave everyone a deeper understanding of the business management process. Participants improved their management skills through OKR work method, and mastered the key pointers to conduct meetings with improved efficiency through OKR follow-up and updates.

## 培训通过体验式学习与小组竞赛的方式让大家在"学"与"乐"方面都取得了收获。培训老师的讲授让大家对企业经营管理过程有了更深入的理解,通过 0KR 工作法提升管理技能,通过 0KR 的跟进与迭代掌握开会的关键方法,提升会议的效率。

After two days of training activities, the cohesion of each group has been fully stimulated, and each member of the group could actively take their own responsibilities and strive to be the excellent team. They work together for one goal to truly challenge in wisdom and grow in joy.

经过两天的培训活动,各个小组团队的凝聚力得到充分体现,小组中每位成员都能积极主动承担自身责任,为争夺优秀团 队而努力。大家围绕着一个目标群策群力,真正实现了在智慧中挑战、在快乐中成长。 We strictly abide by the "Labour Law of the People's Republic of China" and relevant local laws and regulations, to protect and respect the legitimate rights and interests of workers. The Company firmly prohibits the use of child labor and forced labor, and strictly checks personal identity documents or necessary background checks during recruitment. In 2022, there were no instances of child labour or forced labour within the Group. The Company attaches great importance to protecting the legal rights and interests of female employees and ensuring that they can enjoy equal rights to work. Our employees are entitled to maternity leave, pre-maternity leave and parental leave in accordance with relevant laws. The Company will retain positions for employees who take leave and ensure that their future career paths and salaries are not affected by the leave.

我们严格遵守《中华人民共和国劳动法》及企业所在地的相关法规,以保护和尊重劳动者的合法权益。公司坚决禁止使用童工和 强迫劳动的行为,在招聘时严格查验个人身份文件或进行必要的背景调查,2022年集团不存在使用童工或强迫劳动的事件。公司 重视保障女性员工的合法权益,确保她们能享有平等劳动的权利。我们的员工可根据相关法律要求享受产假、待产假、育儿假, 公司会为休假的员工保留职位,并确保他们的未来职业发展方向和薪酬不受休假影响。

Table 6: Statistics of employees' parental leave in 2022
表 6: 2022 年员工育儿假统计

Category 类别	Male 男	Female 女
Number of employees who can enjoy parental leave 可享受育儿假的员工人数	124	44
Number of employees who took parental leave in 2022 2022 年休育儿假的员工人数	3	2
Number of employees scheduled to return to work after parental leave in 2022 在 2022 年放育儿假后应重返岗位的员工人数	3	2
The number of employees who returned to work in 2022 after parental leave 育儿假结束后于 2022 年重返岗位的员工人数	3	2
The number of employees who returned to work after parental leave in 2021 and were still employed by the end of 2022 2021 年育儿假结束后重返工作岗位并于 2022 年底仍在职的员工 人数	0	N.A 不适用
Return to work rate <sup>5</sup> of employees on parental leave 休育儿假的员工返岗率 <sup>5</sup>	100%	100%
Retention rate <sup>6</sup> of employees on parental leave 休育儿假的员工留任率 <sup>6</sup>	0	N.A 不适用

We respect the creative contributions and innovative practice of talents. We have established and further improved the evaluation and incentive mechanism to encourage the innovation and creativity of talents, and to establish a harmonious relationship between the Company and employees. The Company's performance review management follows the principle of "strategic orientation, combination of short term and long term indicators, dynamic management and incentive drive" to reflect the actual performance of employees in an objective, fair, open and scientific manner. In 2022, 100% of employees received annual performance evaluation. In addition, we commend the deeds of outstanding talents every year, increase the publicity of role models, and promote a culture of "respecting talents, respecting labour, and respecting creativity" within the whole Group.

我们尊重人才的创造性劳动和创新性实践,建立健全鼓励人才创新创造的评价和激励机制,在公司与员工之间建立和谐的关系。 公司绩效管理遵循"战略导向、长短结合、动态管理、激励驱动"原则,客观、公正、公开、科学地反映员工的实际工作表现。 2022年,100%的员工接受了年度绩效评估。此外,我们每年度对优秀人才的先进事迹进行表彰,加大先进典型的宣传力度,推动 在全集团形成"尊重人才、尊重劳动、尊重创造"的风尚。

留任率 =2021 年育儿假结束后重返工作岗位并于 2022 年底仍在职的员工人数 /2021 年育儿假结束后重返岗位的员工人数 x100。

<sup>5</sup> Return to work rate = Number of employees who have returned to work in 2022 after parental leave/Total number of employees who should return after parental leave in 2022 x100.

返岗率 = 育儿假结束后于 2022 年重返岗位的员工人数 / 在 2022 年放育儿假后应重返岗位的员工总数 x100。

Retention rate = Number of employees returning to work after parental leave in 2021 and still in employment at the end of 2022/Number of employees returning after parental leave in 2021 x100.

### *Talent Training and Advancement* 人才培养与提升

#### **Care for Talents**

To care for talents is to create a healthy and harmonious growth environment for talents. A good environment is a "strong magnetic field" to attract talents and a " pot of gold " to gather talents. We have always given high priority to optimizing the talent development environment, making every effort to cultivate the fertile ground to retain talents and releasing the creativity of talents.

Zheneng Jinjiang Environment has a comprehensive welfare and protection system. All permanent employees are entitled to pension insurance, basic medical insurance, unemployment insurance, work injury insurance, maternity insurance and housing provident fund. In addition, the Group also provides commercial insurance, meal allowance and other benefits. During the outbreak of the COVID-19 in recent years, the Group paid attention to the health of employees from time to time according to the development of the pandemic. In addition to disinfecting the office environment, the Group provides employees with epidemic prevention materials, disseminates the correct knowledge of pandemic prevention, and arranges for employees to work at home to ensure their health and safety.

We adhere to the people-oriented approach and encourage employees to maintain a healthy lifestyle on the basis of creating a good working environment for them. The Group's subsidiaries provide employees with clean, comfortable and well-equipped dormitories with sports fields, gymnasiums and other recreational facilities, and actively organize various recreational and sports activities, such as fun sports games, basketball games, quality development, birthday celebrations, singing competitions and other team building activities to enhance team cohesion.

In 2023, we will continue to drive development through innovation and consciously recruit technical talents to ensure long-term sustainable development. Looking forward to the medium-term future, Zheneng Jinjiang Environment will adhere to the implementation of precision, diversification and systematic cultivation to build a committed and capable enterprise talent team with high integrity. We will continue to improve the working mechanism, optimize the measures and initiatives, and retain talents with strong institutions, outstanding career prospects and emotional bonds.

#### 关爱人才

关爱人才,就是要为人才营造健康向上、内外和谐的成长环境。良好的环境是吸引人才的"强磁场"、 汇聚人才的"聚宝盆"。我们始终将优化人才发展 环境摆在突出位置,全力培育"拴心留人"沃土, 释放人才的创造力。

浙能锦江环境具备完善的福利和保障制度,所有正 式员工均享有养老保险、基本医疗保险、失业保险、 工伤保险、生育保险及住房公积金。除此之外,集 团还提供商业保险、餐费津贴等福利。在近年新冠 疫情爆发期间,集团根据疫情发展态势不定期关注 员工身体健康,在做好办公环境消毒的同时,及时 为员工提供防疫物资、普及正确防疫知识,并安排 员工居家办公,保障其健康安全。

我们坚持以人为本,在为员工创造良好工作环境的 基础上,鼓励员工保持健康的生活方式。集团下属 企业为员工提供提供了、干净、舒适且配套完善的 宿舍,并设有运动场、健身房等休闲设施,同时积 极举办各项文娱及体育活动,如趣味运动会、篮球 赛、素质拓展、生日庆祝活动、歌唱比赛等团建活 动,增强团队凝聚力。

2023 年,我们将继续以创新促进发展,进一步储备 技术性人才,为公司发展提供源头活水。展望未来几 年,浙能锦江环境将坚持实施精准化、多样化、体系 化培育,打造一批信念过硬、能力过硬、作风过硬的 企业人才队伍;持续健全工作机制,优化措施举措, 用制度、用事业、用感情将人才留下来。

#### Fighting, the Youth! 战斗吧,少年!

On 18 November 2022, Zhuji Bafang Facility in Zhejiang Province organized a group bonding activity with the theme of "Fighting, the Youth!".

2022年11月18日,浙江省诸暨八方电厂组织开展了以"战斗吧,少年!"为主题的团建活动。

At the beginning of the activity, in order to further enhance cooperation and team spirit among the employees, all the members were divided into four teams to play against each other in numerical order. Then, under the leadership of each team leader, the members collectively brainstormed their team name, team logo and team song, and each team wore a uniform of a different colour.

活动伊始,为进一步提升员工之间的协作能力和互助精神,通过报数的方式将全体成员分为四队进行游戏对抗,然后在各队队长的带领下,队员们一起集思广益,商讨出各自队名、队徽和队歌,大家各自披上不同颜色的战衣。

Coaches organized a number of team activities, like "Extreme Puzzle", "Memory Password", "Mask Tug-of-War", "Pixel War", "Speed Forward", "Human Flying Chess" and other competitive or fun activities, to the thorough enjoyment of all participants. They encouraged each other and fought together, witnessing the power of a team in a joyful atmosphere and fun activities.

教练们精心组织了多项团队活动,从"极限拼图"到"记忆密码",从"假面拔河"到"像素大战",从"极速前行"到"人体飞行棋"等丰富多彩的活动,或轻松、或紧张,员工们沉浸其中,彼此鼓励、智慧碰撞、相互鼓舞、共同战斗,在欢乐的氛围、有趣的活动中见证和感受团队的力量。





Figure 8: Zhuji Bafang Facility in Zhejiang Province Launched a Group Building Activity 图 8: 浙江省诸暨八方电厂开展团建活动

### *Occupational Health and Safety* 职业健康和安全

We follow the safety principle of "Life First" and aim to achieve "zero work-related death and zero occupational disease". We are committed to providing employees and contractors with a safe and healthy workplace, prevent work-related injuries and health damage, effectively controlling the occupational health and safety risks related to production and operation, and continuing to improve occupational health and safety performance to bring health and well-being to our employees, contractors and the communities in which our projects operate.

Adhering to the principle of "safety first, prevention as main focus and comprehensive treatment", we have established the Production Safety Management Measures, set up the ESH Management Committee (formerly known as Safety Production Management Committee) at the headquarters, and the Safety Production Leading Group in each operating enterprise to ensure the personal safety of employees in the production process. The ESH Management Committee meeting was held every quarter to in depth analyse the Company's safety production situation and existing gaps, to deploy safety and environmental protection work in the next quarter, continuously consolidate the basic work of operating enterprise safety production management, and continuing to improve management effectively.

We abide by the relevant Occupational Health and Safety ("OHS") laws and regulations and uphold the "Three Concurrent" principle, ensuring safety design and establishment during new project implementation. Zheneng Jinjiang Environment has either set up or is in the process of setting up OHS systems in each WTE facility in accordance with the internationally recognised OHSAS 18001 Standards. This establishes a robust system to identify, manage and monitor OHS-related risks. The management system sets out responsibilities and contingency plans in preparation of potential crisis. The operation teams on the ground conduct regular maintenance of equipment and enhance safety precaution features. All new employees, on-duty personnel, outsourcing team and visitors should receive safety education and training. In 2022, the Company continued to promote employee responsibility evaluation based on the checklists of "key problems and major hazards" and "key places and major risks" to implement the dynamic management of environmental risk information, enhance the awareness of risk prevention and control, and formulate inspection standards and requirements for seasonal risks, operational risks, fire management, environmental supervision, etc. We carried out self-inspection and self-rectification activities for enterprises to enhance the internal robustness of enterprise self-management, and ensured the safety and environmental stability in key periods such as flood season, typhoon season, the 20th NCCPC and the Central Inspection of Ecological and Environmental Protection.

我们遵循"生命第一"的安全理念,把实现"零工亡、 零职业病"作为工作目标,致力于为员工、承包商 提供安全健康的工作场所,预防与工作有关的伤害 和健康损害,切实管控与生产经营相关的职业健康 安全风险,并持续提升职业健康安全绩效,为我们 的员工、承包商和项目运营所在的社区带来健康和 福祉。

我们坚持"安全第一、预防为主、综合治理"的方 针,已建立《安全生产管理办法》并在总部设立 ESH 管理委员会(以前称为安全生产管理委员会)、在各 运行企业设立安全生产领导小组,层层落实、保障 员工在生产过程中人身安全。ESH 管理委员会每季度 召开会议,深入分析公司安全生产形势及存在的不 足并对下一季度安全环保工作进行部署,不断夯实 运行企业安全生产管理基础工作,并持续有效地进 行管理提升。

我们遵守相关的职业健康安全("OHS")法律法规. 坚持"三同时"原则,确保在新项目实施过程中的 安全设计和建立。浙能锦江环境已按照国际公认的 OHSAS 18001 标准在每个垃圾发电厂建立或拟建立 OHS 系统,来识别、管理和监控 OHS 相关风险,管理 系统制定责任和应急计划,以应对潜在的危机;当 地的运营团队定期维护设备并增强安全预防功能, 所有新员工、在岗人员、外包队伍、参观人员均要 接受安全教育培训。2022年,公司持续推动企业落 实"重点问题、重大隐患""重点场所、重大风险" 清单化管理, 落实环保风险信息动态管理, 提升风 险防控意识,制定相关季节性风险、风险作业、消 防管理、环保监督等检查标准及检查要求,开展企 业自查自纠活动,提升企业自主管理的内生动力, 保障了汛期、台风季、二十大及中央环保督察期间 等重点时段的安全环保形势稳定。

In 2022, focusing on the new Production Safety Law and the main responsibility of the enterprise, the Company prepared the "Learning Materials of Production Safety Knowledge and Management Ability of the Main Persons-in-charge and Safety Management Personnel of Operation Enterprises of Hangzhou Jinjiang Environment Investment" and the test assessment outline. We arranged for the main person in charge of safety and safety management personnel of all subsidiaries to study and sit for the examination. It has enhanced the awareness of the main person in charge of safety of each enterprise, and improved the knowledge and mastery of relevant personnel on laws and regulations and management philosophy on production safety. In addition, the Company also organized various safety publicity and education activities during its Occupational Disease Prevention and Control Law Publicity Week, Disaster Prevention and Reduction Week, Safe Production Month, Environmental Day, Safety and Environmental Protection Warning Month, Fire Safety Publicity Month and Safety Production Law Publicity Month, and carried out a wider range of safety and environmental protection knowledge competitions, involving 12,000 participants. It has formed a good enterprise safety culture, promoted the advanced concept of safety production management, improved the participation of employees in safety production management, and promoted the organic integration of safety production management and enterprise production and operation.

2022 年,围绕新安全生产法、企业主体责任,公司 编制了《锦环投运行企业主要负责人和安全管理人 员安全生产知识和管理能力学习材料》和测试考核 大纲,组织各企业安全主要负责人和安全管理人员 进行学习并开展考试,提升了各企业主要负责人安 全生产第一责任人意识,提高了相关人员对安全生 产法律法规和管理理念的认知和掌握。此外,公司 还组织企业开展了职业病防治法宣传周、防灾减灾 周、安全生产月、"六五"环境日、安全环保警示月、 消防安全宣传月及安全生产法宣传月等丰富多彩的 安全宣传教育活动,开展了更广泛的安全环保知识 竞赛活动,参与答题 12,000 人次,形成了良好的企 业安全文化,宣扬了安全生产管理先进理念,提高 了安全生产管理的员工参与度,促进了安全生产管 理与企业生产经营的有机融合。



Figure 9: Zhuji Bafang Facility in Zhejiang Province conducted emergency rescue drills 图 9: 浙江省诸暨八方电厂开展应急救援演练

### Yunnan Green Energy WTE Facility Carries Out Activities During Occupational Disease Prevention Publicity Week

西山垃圾发电厂开展职业病防治宣传周活动

25 April to 1 May 2022 was the 20th National Publicity Week of the "Law on Prevention and Control of Occupational Diseases". In order to further protect the rights and interests of workers' occupational health, popularize the knowledge of prevention and control of occupational diseases, and establish a philosophy of occupational health, during the Workers' Day, Yunnan Green Energy WTE Facility in Kunming City, Yunnan Province, organized an occupational disease prevention activity under the theme of "Controlling Occupational Hazards, Building Strong Health Barriers".

2022 年 4 月 25 日至 5 月 1 日是全国第 20 个《职业病防治法》宣传周,为进一步保障劳动者职业健康权益,普及职业病防治知识,树立职业健康理念,五一劳动节期间,云南省昆明市西山垃圾发电厂围绕"治理职业危害,筑牢健康屏障"活动主题开展了职业病防治周宣传活动。

Yunnan Green Energy WTE Facility organized employees in groups to watch occupational disease-related educational videos, and explained the common occupational hazards and prevention measures. By carrying out the Occupational Disease Prevention Publicity Week activity, the employees' awareness of occupational disease prevention is further strengthened, their awareness of self-protection and self-help ability is improved, and the legitimate rights and interests of the workers are effectively protected.

西山垃圾发电厂分批组织员工观看了职业病相关教育视频,并为大家讲解了常见的职业病危害和防治措施。通过开展职业 病防治宣传周活动,进一步强化了员工的职业病防范意识,提高了自我保护意识与自救能力,切实保障劳动者合法权益。



Figure 10: Yunnan Green Energy WTE Facility in Kunming City, Yunnan Province Carries Out Activities During Occupational Disease Prevention Publicity Week

图 10: 云南省昆明市西山垃圾发电厂开展职业病防治宣传周活动

We value the health and safety of our employees. The Company offers all employees complimentary health check-ups and provides Employer Liability Insurance and Group Accident Insurance. Technical operation employees will also receive regular complimentary screenings for occupational diseases, enabling early identification of potential health-related hazards as early as possible. In 2022, the COVID-19 prevention and control regime has experienced a series of changes, from strict control to regular polymerase chain reaction testing to optimize and improve prevention and control measures, Zheneng Jinjiang Environment has always closely followed the prevailing joint prevention and control mechanism of the State Council and relevant regulations of local governments at each stage, strictly implemented the prevention and control measures, continuously refined the precision of control measures, and minimized the impact of the pandemic on the Company's production. In the event of an outbreak, we immediately followed up and provided specific guidance to the pandemic prevention situation at affected enterprises, and supervised the disposal of pandemic-related waste, ensuring that there were no COVID-related deaths amongst our employees during the year. The subsidiaries can also assist the local government to complete the task of harmless disposal of pandemic-related waste in a standardised and safe manner.

In 2022, Zheneng Jinjiang Environment did not experience any instances of employee workplace injuries or fatalities in the course of its operations. In 2022, we aim to continue to maintain a good record of safe and environmentally friendly production.

员工的身体健康以及安全一直是我们所重视的。公 司为所有员工提供免费健康检查,并投保雇主责任 险和团体意外险。企业实际操作的技术人员还将获 得长久免费的职业病健康体检,以便尽早识别潜在 的疾病危害。2022年,新冠疫情防控经历了从严管 控、常态核酸到逐步放开,浙能锦江环境始终紧跟 国务院联防联控机制和当地政府相关规定,严格落 实防控措施,持续提高防控的科学精准水平,最大 限度减少疫情对公司生产的影响。在疫情发生时, 第一时间对涉疫企业防疫情况进行跟踪和专项指导, 监督涉疫垃圾处置情况,确保了全年我们员工无一 人因新冠死亡,下属企业也能规范和安全地协助当 地政府完成涉疫垃圾无害化处置任务。

2022 年,浙能锦江环境在运营过程中无员工伤亡, 2023 年我们旨在继续保持良好的安全、环保生产记录。

### Tangshan Jiasheng WTE Facility Assisted the Local Government to Dispose the Pandemic-Related Waste During the COVID-19 Outbreak 唐山垃圾发电厂在疫情爆发期间协助当地政府处理涉疫垃圾

On 19 March 2022, a new wave of COVID-19 cases broke out in Tangshan City, Hebei Province, and strict lockdown and control measures were implemented in many locations. Tangshan Jiasheng WTE Facility (the "Facility") in Hebei Province made emergency deployments overnight and mobilized all employees who were not isolated at home to return to the Facility for closed-loop management, which not only ensured the normal operation of the Facility, but also ensured the safety of employees. The employees who received the notice responded positively without a complaint. They packed up their daily necessities and immediately rushed back to the facility. In recognition of the urgency and severity of the pandemic situation, employees demonstrated utmost respect and obedience to pandemic control directions. Not only did they safeguard urban environmental health, but they also fearlessly braved against the coronavirus risk for the greater good.

2022 年 3 月 19 日,河北省唐山市爆发新冠疫情,多地实施严格封控管理措施,位于河北省的唐山垃圾发电厂连夜紧急部 署工作并动员未封闭在家员工全部回厂进行封闭式管理,既保证电厂正常运行,也确保了员工自身安全。收到通知的员工 们,一呼百应,积极响应,没有一句抱怨,纷纷收拾好生活用品,马不停蹄地赶回电厂。"疫情如火,军令如山"。他们 既是城市环卫的"清道夫",也是可敬无畏的"逆行者",用实际行动践行初心使命。

When Tangshan Jiasheng WTE Facility received the notice from the government of Fengrun District to receive and dispose of medical waste in Fengrun District, the Facility immediately made deployment, promptly initiated the first-level response procedure, set up a medical waste emergency disposal team, and rehearsed pandemic protocols such as the entry route for medical waste to enter the Facility, disinfection process, disposal area, staff protection measures, etc., in accordance with the established emergency management plan. Operating under a tight schedule and faced with demanding tasks and heightened risks, the Facility gave top priority to strict prevention and control, ensuring health and stabilizing production. On the evening of 26 March 2022, the first transfer truck containing medical waste slowly entered the Facility, and the vehicle was fully disinfected by special personnel, and the unloading site was cleared to make room for the vehicle. After the medical waste transfer truck entered the unloading platform, personnel wearing full protective equipment unloaded the packed medical waste from the vehicle and disposed of it into the specially reserved feeding port. The waste was immediately dropped into the incinerator through the grab bucket, and the whole incineration process was under supervision.

当唐山垃圾发电厂接到丰润区政府通知,准备接收处置丰润区医疗废弃物时,电厂第一时间进行部署,火速启动一级响应 程序,成立医疗废物应急处置小组,按照既定的应急管理预案,预演医疗废物转运车进厂路线、消杀流程、投料区、工作 人员防护措施等,在时间紧、任务重、危险系数高的情况下,坚持将严防控、保健康、稳生产放在首位。2022 年 3 月 26 日晚,第一台载有医疗废物的转运车缓缓开进电厂厂区,由专人进行车辆全面消杀,并清空了卸料现场为其腾出专属预留 通道。医疗废物转运车进入卸料平台后,现场由身着全套防护装备的人员,从车上卸下打包好的医疗废物,投入专门预留 的投料口,通过抓斗即时投入焚烧炉,并对焚烧炉进行全程监控。



Figure 11: Tangshan Jiasheng WTE Facility in Hebei Province Disposed the Pandemic-Related Waste 图 11: 河北省唐山垃圾发电厂处理涉疫垃圾

### Regulatory Compliance 监管合规

In 2022, Zheneng Jinjiang Environment adhered to the idea of rule of law and continuously promoted the systematization, institutionalization and standardization of rule of law compliance. The Company promoted the establishment of risk management system by "identifying and preventing enterprise risks, establishing and improving management mechanism, strictly maintaining the bottom line of compliance". The Company strengthened three lines of defence: first, it continuously improved the risk awareness of business managers; second, it concretised the responsibilities of business subjects and consolidated the management efficiency of functional departments; and third, it relied on audit to exercise the supervision function, and improve the quality and efficiency of the Company.

Zheneng Jinjiang Environment has always focused on high-quality development, competitiveness enhancement, governance system modernization, and all-round improvement of innovation, control, influence and risk resistance. In 2022, the Company adhered to relevant environmental and social laws concerning issues like emissions and waste, air emissions, environmental disclosure requirements, labour practices and occupational health and safety practices. We also continue to take the initiative to adapt to the changing regulatory environment and actively manage our compliance risks, focusing on risk prevention and control in high-risk areas such as listing regulations, compliance procedures, material procurement, contract signing and labour disputes, and organized special risk warning meetings and related legal training to raise overall awareness of risk prevention. 2022 年,浙能锦江环境始终坚持法治思想,不断推 进法治合规的体系化、制度化、规范化,以"识别 预防企业风险、建立健全管理机制、严守牢筑合规 底线"助推风险体系建设,持续提升业务岗位管理 者的风险意识,强化第一道风险防线,发挥业务主 体担当职责,落实第二道风险防线,巩固职能部门 管理效能,将审计作为第三道风险防线,增强监督 督导职能,为公司提质增效。

浙能锦江环境始终聚焦聚力高质量发展、竞争力提 升、治理体系现代化建设,全方位提高创新力、控 制力、影响力和抗风险能力。2022年,公司遵守废 物排放、环境披露、劳工实践和职业健康安全实践 等相关方面的法律法规,也持续主动适应不断变化 的监管环境,并积极管理合规风险,关注上市规范、 合规手续、物资采购、合同签订、劳动纠纷等高风 险领域的风险防控,组织召开风险警示专题会及相 关法律培训,全面提高风险防范意识。

#### Zheneng Jinjiang Environment Held a Special Meeting on Risk Warning 浙能锦江环境组织召开风险警示专题会

On 30 March 2022, Zheneng Jinjiang Environment held a special meeting on risk warning with the theme of "Comprehensive Risk Re-evaluation from Case Study", aiming to use the case study to alert and encourage the enterprise to comprehensively investigate risks, and promote a re-evaluation and refinement of understanding of risk prevention capabilities, especially for safety, environment, clean government, legal compliance and other major risks related to the survival and development of enterprises.

2022 年 3 月 30 日,浙能锦江环境召开以"以案为鉴强警示,全面风险再认识"为主题的风险警示专题会,旨在以案例作为 警醒,推动企业全面排查风险,促进风险防范能力再认识、再提升、再深入,尤其是针对安全、环境、廉政及合法合规等 事关企业生存发展的重特大风险隐患。

The meeting stressed the need to tighten the spring from top to bottom, convey the urgency, keenly focus on the risk awareness of the "key minority" personnel, learn from the lessons, take active actions, and take the initiative to prevent, discover and eliminate risks, illegal actions and crimes. The meeting noted that the Company must increase necessary inputs in a timely manner, resolutely avoid environmental risks, and refuse to accept any acts that damage the environment. To deal with the risks of corruption, we need to apply the right solution, strengthen the management oversight process of enterprises through interviews and targeted rectification, and sanction corruption through supervision, punishment and even transfer to legal enforcement. For legal compliance risks comprehensive and practical regulations must be established to ensure that proactive actions can be taken to strengthen compliance.

会议强调公司要从上到下拧紧发条、传导压力,切实抓好"关键少数"人员的风险意识,汲取教训,积极作为,并主动防范、 发现、消除风险,杜绝违法犯罪;要及时增加必须的投入,坚决避免环保风险,不接受任何形式的破坏环境行为。对于廉 政风险,要对症下药、分类施策,通过约谈、整改等手段强化企业规范管理流程,通过监察、处罚甚至移送司法等手段惩 治腐败问题。对于企业合法合规风险,务必整章建制、实战实用,保障企业合规经营,做到主动作为、勇于出击。

### Regulatory Compliance 监管合规

Zheneng Jinjiang Environment has always been problem-oriented, identifying issues with close supervision whilst proposing rectification steps with a facilitative attitude. The Company led implementation of rectification measures in various areas of strategic development, legal compliance procedures, engineering construction, safety and environmental protection, internal control and other aspects and closely followed up with review and testing, so as to form a closed loop of management and boost development and progress. We understand that institutionalisation is the fundamental guarantee to realize the normalised and long-term development of corporate lifestyle and identity. In 2022, based on the current status of the work, we re-examined the inapplicable provisions under the existing framework and revised and improved them, refined the institutional design and completed the compilation of 112 regulations and the revision of 20 regulations, so as to enhance the effectiveness of institution-building as a measurer of enterprise governance.

Zheneng Jinjiang Environment has always been firm and steadfast in refining its institutional design and regularising the use of power to promote the strategic goal of "not daring, not able and not wanting to corrupt" by enhancing education and public awareness and integrating education with appropriate sanctions and institutional measures. In 2022, the "Supervision and Management Measures" was issued to establish a working mechanism for anti-corruption efforts, to strengthen the supervision and regulation function, clarify the red line and bottom line requirements, and create a clean and corruption-free working environment for the Company. We maintained the official account of Zheneng Jinjiang Environment Reporting and Complaint channel, where all complaints are tracked and handled to ensure an open information feedback channel. At the same time, the Company continued to deepen and promote the ideological and understanding of incorrupt practices by arranging for new employees to sign a letter of commitment and declaring conflicts of interest of key positions. In 2022, there were no confirmed incidents of corruption. In 2023, Zheneng Jinjiang Environment aims to maintain zero incidents of confirmed corruption.

In 2023, we will continue to be goal-oriented, and plan to gradually build a "big risk control" system with five underlying pillars of legal affairs, compliance, risk, internal control and audit to ensure the achievement of the Company's strategic goals. 浙能锦江环境始终以问题为导向,推行"调研式监督发现问题,建议式要求提出整改",从战略发展、 合法合规手续、工程施工、安全环保、内部控制等 多角度,落实整改要求,并持续推进复核检验,从 而形成管理闭环,助推公司发展进程。公司深知制 度建设是实现公司作风建设常态化、长效化的根本 保障。2022 年根据工作现状,重新审视现有制度中 不适用的规定并加以修订与完善,细化制度设计, 完成制度汇编 112 项,修订制度 20 项,推动制度优 势更好转化为治企效能。

浙能锦江环境始终坚定信心、保持定力,扎牢制度 笼子、规范权力运行,通过教育提高思想觉悟,把 惩治、制度和教育贯通起来,一体推进不敢腐、不 能腐、不想腐的战略目标。2022年出台廉政建设工 作机制《监察管理办法》,强化监督监管职能,明 确红线底线要求,营造公司风清气正的工作环境。 公司持续维护浙能锦江环境举报投诉公众号,100% 跟踪处理投诉事项以确保信息反馈渠道畅通。同时, 通过签署廉洁自律承诺书、申报重点岗位利益冲突, 持续深化和提高员工对于廉洁从业的思想认识。 2022年,公司没有发生腐败事件。2023年,浙能锦 江环境的目标是继续保持零确认腐败事件。

2023 年,将持续以目标为导向,计划逐步构建起浙 能锦江环境特色法务、合规、风险、内控、审计"五 位一体"的"大风控"体系,保障公司战略目标达成。



We continue to work on integrating corporate social responsibility into the daily operation and management of the Company and furthermore into the daily work of employees. In 2022, Zheneng Jinjiang Environment not only created job opportunities, promoted the development of local economy and environmental protection, but also practiced social responsibility and devoted ourselves to public welfare undertakings. We actively act and take the initiative to make contributions in environmental protection education, government-enterprise collaborations, community care and anti-pandemic front line assistance.

我们坚持将企业社会责任融入到公司的日常运营和管理,并进一步融入到员工的日常工作中。2022年,浙能锦江环境在创造就业 机会、促进地方经济和环保发展的同时,践行社会责任、投身公益事业,我们积极作为、主动担当,在环保教育、政企联动、社 区关怀、抗疫抗灾前线等方面作出贡献。

# **1** A Visit to the Environmental Protection Education Base to Appreciate the Low Carbon Environmental Protection

走进环保教育基地,共赴低碳环保之约

In August 2022, Xiaoshan Jinjiang Green Energy WTE Facility in Hangzhou City, Zhejiang Province, as the environment protection educational base of Hangzhou City and the National WTE facility with AAA rank, welcomed a group of 22 teachers and students from the Hubin Primary School in Xiaoshan District for public visit. The students understood the importance of waste classification and the significant of waste to energy through communication and explanation on waste classification and recycling and harmless waste treatment. 2022 年 8 月,作为浙江省杭州市环保教育基地和国家 AAA 级垃圾发电厂的浙能锦江环境萧山垃圾发电厂,迎来了来自萧山区湖滨小学师生一行 22 人到访参观。通过互动和对垃圾分类、资源化、无害化的讲解,让孩子们明白了垃圾分类的重要性和垃圾变废为宝发电的作用。



Figure 12: Xiaoshan Jinjiang WTE Facility in Zhejiang Province hosts local students 图 12: 浙江省杭州萧山垃圾发电厂接待当地学生

### Local Community 当地社区

# **2** Extra-Curricular Research Enables Close Understanding of Waste-to-Energy 课外研学零距离了解垃圾发电

On 12 March 2022, the extracurricular research trip of 2020 liberal arts class of Linzhou No. 1 Middle School was carried out in Linzhou Jiasheng WTE Facility in Henan Province. The students talked with the general manager, consulted engineers, listened to the explanation and visited the site in person. The students appreciated that WTE facilities can not only effectively relieve the pressure brought by the increasing urban solid waste, but also create certain social value, environmental protection benefits and economic benefits for the city.

2022 年 3 月 12 日,林州一中 2020 级文科班课外研 学之旅在河南省林州垃圾发电厂开展,同学们对话 总经理、咨询工程师,听讲解、看现场,了解了基 本生产流程、发电原理、"超低排放"技术等知识, 零距离、全方位了解了生活垃圾焚烧发电全过程, 明白垃圾焚烧发电厂不仅能够有效的缓解日益增长 的城市生活垃圾带来的压力,为城市"保电"续航, 又创造了一定的社会价值、环保效益及经济效益。



Figure 13: The extracurricular research trip of Linzhou No. 1 Middle School was carried out in Linzhou Jiasheng WTE Facility in Henan Province. 图 13: 林州一中课外研学之旅在河南省林州垃圾发电厂开 展

#### **3** Government-Enterprise Collaboration Helps the Development of Red Culture 政企联建助力红色文化发展

On 31 May 2022, Wuhan Solid Waste Treatment Center and Hankou Jinjiang WTE Facility in of Hubei Province jointly held the inauguration ceremony of the joint establishment of the "Red and Orange Pioneers" and the poetry reciting of "Our Festival, Poetic Dragon Boat Festival", aimed at extending the concept of the Red and Orange Pioneers to enterprises, allowing the red culture to take root at the grassroots level, and creating heritage in government-enterprise collaborations.

2022 年 5 月 31 日,湖北省武汉市固体废物处理中心 与汉口垃圾发电厂联合举办了红橙先锋队联建揭牌 仪式暨《我们的节日・诗意端午》诗歌朗诵会,旨 在让红橙先锋队理念向企业延伸,红色文化在基层 生根,让传承在政企联建中开花结果。



Figure 14: Hankou Jinjiang WTE Facility launched an unveiling ceremony and poetry reciting activity with the local government.

图 14: 湖北省汉口垃圾发电厂与政府联合举办揭牌仪式 及诗歌朗诵会

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# Assist in Cracking Down on Counterfeit Trafficking and to regulate market order 协助打击贩假贩私活动,规范市场秩序

On 29 June 2022, Yinchuan Zhongke WTE Facility in Ningxia Hui Autonomous Region cooperated with Yinchuan Municipal Tobacco Monopoly Bureau in a crackdown on counterfeit cigarettes. In order to practice the ecological concept of "green, low-carbon and environmental protection", over 3.1 million counterfeit cigarettes were destroyed through incineration and used for power generation. Under the joint supervision of the Municipal Public Security Bureau, the Anti-Smuggling Bureau of the Customs and other units, the counterfeit cigarettes were sent to the high temperature incinerator for treatment by the waste grab after being decomposed in the pre-treatment workshop. The realization of "turning waste into treasure" not only prevents pollution, but also saves energy.



2022 年 6 月 29 日,宁夏银川垃圾发电厂配合银川市 烟草专卖局开展假私烟销毁活动,为践行"绿色、 低碳、环保"的生态理念,310 余万支假私烟通过焚 烧发电方式被集中销毁。在市公安局、海关缉私局 等单位的联合监督下,待销卷烟在预处理车间经过 装载机碾压后,由垃圾抓斗送进高温焚烧炉里处理, 实现"变废为宝",既防止了污染,又节约了能源。

Figure 15: Yinchuan Zhongke WTE Facility in Ningxia Hui Autonomous Region helped local authorities destroy counterfeit cigarettes. 图 15: 宁夏银川垃圾发电厂协助当地政府销毁假私烟

# 了 Charitable Donation to Build a Beautiful Community 爱心捐赠,共建美丽家园

In anticipation of the successful opening of the 20th NCCPC, to further improve the living environment of residents in the area, and solve the problem of waste disposal, a waste container donation ceremony was held in Zhengdian Street, Jiangxia District, Wuhan City. Wuhan Jinjiang WTE Facility in Hubei Province donated 20 swing-box boxes and 500 trash cans worth RMB160,000 as a warm gift for the residents so as to make practical contributions to the building of a sanitary city. This batch of new waste containers "on duty" will not only facilitate the collection and transportation of waste in the community, but also fully mobilize the enthusiasm and initiative of the residents to participate in the initiatives to improve the sanitation of the living environment, support the development of environmental protection, help with waste classification, and build a harmonious and beautiful community.



为喜迎党的二十大的顺利召开,进一步改善辖区居 民生活环境,解决困扰居民生活的垃圾投放问题, 武汉市江夏区郑店街道召开垃圾容器捐赠仪式,湖 北省武昌垃圾发电厂捐赠价值 16 万元的 20 个勾臂 箱和 500 个垃圾桶,以实际行动为创建文明城市加 油助力,为居民献上一份温馨礼物。这批新垃圾容 器"上岗"后,在方便了社区收集和清运垃圾的同 时,也将充分调动群众参与人居环境卫生整治的积 极性和主动性,支持环保事业,助力垃圾分类,共 建和谐美丽街道。

Figure 16: Wuhan Jinjiang WTE Facility in Hubei Province donated swing-box boxes and trash cans. 图 16: 湖北省武昌垃圾发电厂捐赠勾臂箱和垃圾桶

### Local Community 当地社区

# Care and Company for Special Children for Happiness and Growth 关爱特殊儿童,相伴快乐成长

Upon the opening of the Winter Paralympic Games, Gaomi Lilangmingde WTE Facility in Shandong Province organized an activity of "Promoting the Spirit of Lei Feng and Caring for Special Children" to bring rice, noodles, oil and other food to the children of Xingyi Rehabilitation and Education Center ("Xingyi Center") in Gaomi City. Under the leadership of the staff of Xingyi Center, the volunteers had close contact with the children, visited the classroom, and appreciated their handicraft and painting works. The children's hardworking, lively, cheerful and positive attitude towards life also taught the volunteers a valuable lesson. 在冬残奥会开幕之际,山东省高密垃圾发电厂组织 开展了"弘扬雷锋精神,关爱特殊儿童"活动,为 高密市星熠康复教育中心的孩子们送去米、面、油 等食品。在星熠中心工作人员的带领下,志愿者们 和孩子们零距离接触,参观教室、欣赏手工及绘画 作品,孩子们刻苦努力、活泼开朗、积极向上的生 活态度,也给志愿者们上了一堂生动的成长课。



Figure 17: Gaomi Lilangmingde WTE Facility in Shandong Province cares for special children. 图 17: 山东省高密垃圾发电厂关爱特殊儿童

#### **Volunteering and Serving the Community** 争做志愿,服务社区

Xingjin Green Energy WTE Facility in Zhengzhou City, Henan Province actively responded to the call of the local government, organized and mobilized its employees who are party members or membership applicants as volunteers to help at the front line of COVID-19 pandemic control. Volunteers tried their best assist in tasks such as temperature measurement and disinfection, household investigation and household education. They strive to lead by example, and act as the "red fortress" to safeguard people's life safety and health. 河南省郑州市荥锦垃圾发电厂积极响应当地政府号 召,组织动员公司党员及入党积极分子作为志愿者, 奔赴新冠疫情防控最前线。志愿者们尽己所能,化 身"红马甲",到社区、卡口参与测温消毒、登记 排查、入户宣传等,大家争先锋、作表率,积极构 建守护人民群众生命 安全和身体健康的"红色堡 垒"。



Figure 18: Xingjin Green Energy WTE Facility in Zhengzhou City, Henan Province became the volunteers for fighting against pandemic. 图 18: 河南省郑州市荥锦垃圾发电厂成为疫情防控志愿者

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#### Handling Pandemic Waste and Fulfilling Corporate Responsibilities 处理涉疫垃圾,履行企业责任

Tianjin Municipal Urban Management Commission awarded a letter of commendation to Tianjin Sunrise WTE Facility for its strong support in pandemic prevention and control. Tianjin Sunrise WTE Facility, as an emergency disposal unit, actively responded to the pandemic prevention and control policy and firmly undertook corporate responsibility by swiftly responding to prevailing control measures, optimizing emergency plans and the disposal process, strengthening personnel supervision by setting up "three zones and two lines" and implementing staggered working hours two-way disinfection measures, so as to strictly prevent cross infection. The Facility also completed the harmless emergency disposal of pandemic-related waste within the municipality. 天津市城市管理委员会向天津垃圾发电厂授予表扬 信,感谢其在疫情防控工作中给予的大力支持。天 津垃圾发电厂作为应急处置单位,积极响应疫情防 控政策,坚决扛起企业责任,迅速进入应战状态, 优化应急预案和处置流程,通过设置"三区两线" 加强人员防控,车辆错峰进厂、实施双向消杀等措 施,严防交叉感染,完成了涉疫生活垃圾的无害化 应急处置工作。



#### 表扬信

天津市最兴力克环保科技发展有限公司:

新年伊始,疫情突发,全市打响"硬制" 奥密克或阻击战。 按照线一部署,天津市展兴力克环保科技发展有限公司作为应急 处置单位,积极响应疫情防控政策,坚决杠起政治责任,迅速进 入应战状态,制定应急预案,优化处置这程,通过设置"三区两 线",加强人员防控,车辆循峰进厂,实施双向消杀等措施,严 防交叉感染,完成了涉及生活垃圾的无害化应急处置工作。

市政府主要领导同志高度评价和充分肯定城市管理行业的 工作成绩,在《关于集中隔离点生活垃圾较运处置工作情况的损 合》上作出重要抵示:"此谈工作体现了跨常一步担当作为和大 局意识,"现得批示精神转达费单位,对奋战在生活垃圾收运处 置一线的单位和个人提出表悟,感谢大家的手動付出和无私奉 敏.

下一步,請貴単位继续发扬抗疫精神,再接再历,國滿完成 各項疫情防控任务,积极稳妥做好生活垃圾收运计量,确保 城市安全稳定运行。

特发北信,以资鼓励!



抄送: 北极区政府

Figure 19: Tianjin Sunrise WTE Facility received a letter of commendation. 图 19: 天津垃圾发电厂收到表扬信

### Local Community 当地社区

In 2022, a number of subsidiaries under Zheneng Jinjiang Environment received commendations from the local governments for their outstanding contributions, mainly listed as follows:

#### 2022年,浙能锦江环境旗下多家企业因其出色的贡献获得当地政府授予的荣誉,主要列示如下:

In November, Baishan Green Energy WTE Facility was recognised by the Baishan City Administration and Law Enforcement Bureau as a Pandemic Prevention and Control Cooperation Unit.	11 月,白山垃圾发电厂获得白山市城市管理行 政执法局授予的疫情防控协同单位表彰
In October, Jilin Xinxiang WTE Facility and its employees were awarded "Top Ten Sanitation Workers", "Excellent Sanitation Workers", "Excellent Sanitation Manager" and "Excellent Sanitation Operation Team" by Changchun Urban Management Bureau.	10 月,长春垃圾发电厂及其员工获得长春市城 管局授予的长春市"十佳环卫工人"、"优秀 环卫工人"、"优秀环卫管理者"、"优秀环 卫作业班组"等荣誉
Mr. You Haihui, deputy manager of Biotechnology Department of Zhuji Bafang Facility, won the title of Excellent Urban Beautician of Zhuji City.	八方电厂生技部副经理尤海辉荣获"诸暨市优秀 城市美容师"称号
Wenling Ecological Industrial Park was recognised by Taizhou Comprehensive Law Enforcement Bureau as Outstanding Collective for Taizhou City Appearance and Environmental Sanitation Work.	温岭生态产业园被台州市综合执法局评为台州 市市容环境卫生工作成绩突出集体
In August, Yunnan Green Energy WTE Facility was awarded the title of "Outstanding Enterprise on Intellectual Property of Yunnan Province" jointly issued by Yunnan Provincial Market Supervision Administration and Yunnan Provincial Intellectual Property Office.	8 月,西山垃圾发电厂荣获云南省市场监督管 理局、云南省知识产权局联合授予的"云南省 知识产权优势企业"称号
In July, Songyuan Xinxiang WTE Facility was awarded the title of "Songyuan Youth Social Practice Base".	7月,松原垃圾发电厂被授予"松原市青少年 社会实践基地"称号
In May, Houzui Street Office of Lianyungang Economic and Technological Development Zone awarded the banner of "Unity of Strength Against the Pandemic, Great Love Shows Great Responsibility" to thank them for actively fulfilling its social responsibility during the pandemic.	5月,连云港经济技术开发区猴嘴街道办事处 授予"众志成城战疫情大爱无疆显担当"锦 旗,感谢其在疫情期间积极履行社会责任。
Wenling Green Energy WTE Facility was awarded the title of "Zero-Waste Factory" by Taizhou Municipal "Zero-Waste City" Construction Task Force.	温岭垃圾发电厂入选台州市全域"无废城市" 建设工作专班授予的"无废工厂"称号
In April, Wuhan Jinjiang WTE Facility won the title of Wuhan Excellent Labor Production Team in Wuhan City for FY2021, issued by Wuhan Federation of Trade Unions.	4月,武昌垃圾发电厂荣获武汉市总工会颁发 的"2021年度武汉市劳动生产优秀班组"称号
In February, Zibo Green Energy WTE Facility won the the title of "Outstanding Quality Contribution Enterprise in Zibo City".	2月,淄川垃圾发电厂荣获淄博市城市品质突 出贡献企业
In January, Zhuji Bafang Facility won the title of "Leading Unit for Water Saving in Zhejiang Provincial for FY2021".	1 月,浙江诸暨八方电厂荣获"浙江省 2021 年 度节水标杆单位"称号

Moving forward, in 2023 and the medium-term future, the Company will continue to support environmental education, community, care, social welfare and other activities, actively devote our efforts and leverage our capital advantages to strengthen the connections with local communities, and contribute to building a better society.

展望未来,在 2023 年和近几年,公司将继续支持环境教育、社区关怀、社会福利等活动,积极投入和利用我们的资本优势,加强与当地社区的联系,为建设更美好的社会贡献力量。

## GRI CONTENT INDEX GRI 内容索引

Statement of use 使用说明	The information cited in this GRI Content Index is reported by Zheneng Jinjiang Environment for the period 1 January 2022 to 31 December 2022 with reference to GRI standards. 浙能锦江环境在 2022 年 1 月 1 日至 2022 年 12 月 31 日参照 GRI 标准报告了在此份 GRI 内容索引中引用 的信息。
<b>GRI 1 used</b>	GRI 1: Foundation 2021
使用的 GRI 1	GRI 1: 基础 2021

GRI Standards <sub>GRI</sub> 标准	<b>Disclosure</b> 披露项	Page reference 页码位置
GRI 3-3 (2021)	Management of material topics 实质性议题的管理	Sustainability Report – Materiality Assessment, pages 45 to 46 可持续性报告 - 重要因素评估,第 45 至 46 页
GRI 201-1 (2016)	Direct economic value generated and distribution 直接产生和分配的经济价值	Consolidated Statement of Comprehensive Income, page 140; Statements of Financial Position, page 141 综合收益合并报表, 第 140 页; 财务状况报表, 第 141 页
GRI 201-2 (2016)	Financial implications and other risks and opportunities due to climate change 气候变化带来的财务影响以及其他风险和机遇	Sustainability Report - Addressing Climate Change, pages 60 to 67 可持续性报告 - 应对气候变化,第 60 至 67 页
GRI 202-2 (2016)	Proportion of senior management hired from the local community 从当地社区雇用高管的比例	Sustainability Report - Talent Training and Advancement, Pages 68 to 70 可持续性报告 - 人才培养与提升,第 68 至 70 页
GRI 205-3 (2016)	Confirmed incidents of corruption and actions taken 经确认的腐败事件和采取的行动	Sustainability Report – Regulatory Compliance, page 82 可持续性报告 - 监管合规,第 82 页
GRI 301-1 (2016)	Materials used by weight or volume 所用物料的重量或体积	Sustainability Report - Green Operations, page 57 可持续性报告 - 绿色经营,第 57 页
GRI 302-1 (2016)	Energy consumption within the organization 组织内部的能源消耗量	Sustainability Report - Green Operations, page 57 可持续性报告 - 绿色经营, 第 57 页
GRI 306-2 (2020)	Management of significant waste 废弃物相关重大影响的管理	Sustainability Report – Sustainable Business of Zheneng Jinjiang Environment, pages 48 to 50 – Green Operations, pages 55 to 59 可持续性报告 - 浙能锦江环境可持续业务,第 48 至 50 页 - 绿色经营,第 55 至 59 页
GRI 401-1 (2016)	New employee hires and employee turnover 新进员工雇佣率和员工流动率	Sustainability Report - Talent Training and Advancement, page 68 可持续性报告 - 人才培养与提升,第 68 页
GRI 401-2 (2016)	Benefits provided to full-time employees that are not provided to temporary or part-time employees 提供给全职员工(不包括临时或兼职员工)的福 利	Sustainability Report - Talent Training and Advancement, page 74 可持续性报告 - 人才培养与提升,第 74 页
GRI 401-3 (2016)	Parental leave 育儿假	Sustainability Report - Talent Training and Advancement, page 73 可持续性报告 - 人才培养与提升,第 73 页

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### GRI CONTENT INDEX GRI GRI 内容索引

<b>GRI Standards</b> <sub>GRI</sub> 标准	<b>Disclosure</b> 披露项	Page reference 页码位置
GRI 403-1 (2018)	Occupational health and safety management system 职业健康安全管理体系	Sustainability Report – Occupational Health and Safety, pages 76 to 77 可持续性报告 – 职业健康和安全,第76至 77页
GRI 403-9 (a) (i) 2018	Work-related injuries: 工伤: (a) For all employees: (a) 对于所有员工: i. The number and rate of fatalities as a result of work-related injury; i. 工伤导致的死亡数量和死亡率;	Sustainability Report - Occupational Health and Safety, page 79 可持续性报告 - 职业健康和安全,第79页
GRI 404-1(2016)	Average hours of training per year per employee 每名员工每年接受培训的平均小时数	Sustainability Report - Talent Training and Advancement, page 71 可持续性报告 - 人才培养与提升,第 71 页
GRI 404-3 (2016)	Percentage of employees receiving regular performance and career development reviews 接受定期绩效和职业发展考核的员工百分比	Sustainability Report - Talent Training and Advancement, page 73 可持续性报告 - 人才培养与提升,第 73 页
GRI 405-1 (2016)	Diversity of governance bodies and employees 管治机构与员工的多元化	Sustainability Report - Talent Training and Advancement, pages 69 to 70 可持续性报告 - 人才培养与提升,第 69-70 页

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## TCFD CONTENT INDEX TCFD 内容索引

	TCFD Recommendation TCFD 建议	Page Reference and Remarks 页码位置和备注
Dis	<b>vernance</b> 治理: close the organization's governance around climate-relatec <sup></sup> 暑组织围绕气候相关风险和机遇的治理。	risks and opportunities.
A)	Describe the board's oversight of climate-related risks and opportunities. 描述董事会对气候相关风险和机遇的监督	Addressing Climate Change, pages 60 to 62 应对气候变化,第 60 至 62 页
B)	Describe management's role in assessing and managing risks and opportunities. 描述管理层在评估和管理风险和机遇方面的作用	Addressing Climate Change, pages 60 to 62 应对气候变化,第 60 至 62 页
Dis stra	<b>ategy</b> 战略 : close the actual and potential impacts of climate-relate ategy, and financial planning where such information is mat 霍与气候相关的风险和机遇对组织业务、战略和财务规划的实	
A)	Describe the climate-related risks and opportunities the organization has identified over the short, medium, and long term. 描述组织在短期、中期和长期内确定的与气候相关的风险和机遇	Addressing Climate Change, pages 62 to 66 应对气候变化,第 62 至 66 页
B)	Describe the impact of climate-related risks and opportunities on the organization's businesses, strategy, and financial planning. 描述气候相关风险和机遇对组织业务、战略和财务规划的 影响	Addressing Climate Change, pages 62 to 66 应对气候变化,第 62 至 66 页
C)	Describe the resilience of the organisation's strategy, taking into consideration different climate-related scenarios, including a 2°C or lower scenario. 描述组织战略的弹性,同时考虑不同的气候相关情景,包 括 2℃或更低的情景	Zheneng Jinjiang Environment is adopting a progressive strategy towards managing climate related risks. Scenario analysis will be carried out in subsequent sustainability reports. 浙能锦江环境正在采取渐进式的战略来管理与气候相关的风 险。情景分析将在后续的报告中进行。
Dis	<b>k Management</b> 风险管理 <b>:</b> close how the organization identifies, assesses, and manag 霤组织如何识别、评估和管理气候相关风险。	ges climate-related risks.
A)	Describe the organization's processes for identifying and assessing climate-related risks. 描述组织识别和评估气候相关风险的流程	Addressing Climate Change, pages 66 to 67 应对气候变化,第 66 至 67 页
B)	Describe the organization's processes for managing climate-related risks. 描述组织管理气候相关风险的流程	Addressing Climate Change, pages 66 to 67 应对气候变化,第 66 至 67 页
C)	Describe how processes for identifying, assessing, and managing climate-related risks are integrated into the organization's overall risk management. 描述如何将识别、评估和管理气候相关风险的过程整合到 组织的整体风险管理中	Addressing Climate Change, pages 66 to 67 应对气候变化,第 66 至 67 页

*TCFD CONTENT INDEX* TCFD 内容索引

	TCFD Recommendation TCFD 建议	Page Reference and Remarks 页码位置和备注			
Dis info	<b>Metrics and Targets</b> 指标和目标: Disclose the metrics and targets used to assess and manage relevant climate-related risks and opportunities where such information is material. 披露用于评估和管理相关气候相关风险和机遇的指标和目标(如果此类信息很重要)。				
A)	Disclose the metrics used by the organization to assess climate-related risks and opportunities in line with its strategy and risk management process. 根据其战略和风险管理流程,披露组织用于评估气候相关 风险和机遇的指标	Addressing Climate Change, page 67 应对气候变化, 第 67 页 Zheneng Jinjiang Environment is adopting a progressive strategy towards managing climate related risks. Identification and disclosure of appropriate metrics will be carried out in subsequent sustainability reports. 浙能锦江环境正在采取渐进式的战略来管理与气候相关的风 险。确定和披露适当的衡量标准将在后续报告中进行。			
B)	Disclose Scope 1, Scope 2, and, if appropriate, Scope 3 greenhouse gas (GHG) emissions, and the related risks. 披露范围 1、范围 2 和(如适用)范围 3 温室气体 (GHG) 排放和相关风险	Zheneng Jinjiang Environment is adopting a progressive strategy towards managing climate related risks. GHG emissions will be measured and disclosed in subsequent sustainability reports. 浙能锦江环境正在采取渐进式的战略来管理与气候相关的风 险。温室气体排放将在后续的报告中进行测量和披露。			
C)	Describe the targets used by the organization to manage climate-related risks and opportunities and performance against targets. 描述组织用于管理气候相关风险和机遇的目标,以及针对 目标的绩效	Zheneng Jinjiang Environment is adopting a progressive strategy towards managing climate related risks. Appropriate targets will be set and disclosed in subsequent sustainability reports. 浙能锦江环境正在采取渐进式的战略来管理与气候相关的风 险。适当的目标将被设定并在后续的报告中披露。			

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Zheneng Jinjiang Environment Holding Company Limited (the "**Company**" or "**Zheneng Jinjiang Environment**") and its subsidiaries (collectively referred to as the "**Group**") is committed to maintaining good corporate governance in all its business activities.

This report sets out Zheneng Jinjiang Environment's corporate governance practices with reference to the Principles and Provisions of the Code of Corporate Governance 2018 (the "**CG Code**"). Where the Company's practices differ from the Provisions under the CG Code, comprehensive and meaningful explanations on how such practices it had adopted are consistent with the aim, intent and philosophy of the relevant Principle have been included in this report.

#### **Board Matters**

#### Principle 1: The Board's Conduct of Affairs

#### **Role of the Board**

The Board oversees the Group's business and its performance. It is collectively responsible and works with management for the long-term success of the Company. The Board's principal roles include guiding and establishing strategic and business objectives. The Board considers sustainability issues, including environmental and social factors, as part of its strategic formulation. Executives of the Board are tasked to execute these by setting direction and goals for management and staff and ensuring that the business of the Group is effectively managed and properly conducted day to day towards these ends. The Board reviews the Group's performance and satisfies itself on the adequacy and effectiveness of the framework and processes for internal controls. The Board also sets the tone for the Group in respects of ethics, values and desired organisational culture, and ensures proper accountability within the Group. The Board assumes the overall responsibility for good corporate governance.

The Group's key stakeholders include its shareholders, customers, suppliers, business partners, employees and the community. The Group has put in place a code of business and ethical conduct for its employees to ensure that obligations to these key stakeholders are understood and met.

#### **Independent Judgement**

All Directors are fiduciaries of the Company who act objectively in the best interests of the Company and hold management accountable for performance. In determining the independence of the Directors, please refer to "Board Independence" under Principle 2 in this Corporate Governance Report. Also, Directors who face conflicts of interest or are directly or indirectly interested in a transaction or proposed transaction recuse themselves from discussions and decisions involving the issues of conflict. The Board has established a Nominating Committee (the "**NC**") which makes recommendations to the Board on the appointments and re-appointments of the Directors and assesses their independence annually and as and when circumstances require. When assessing their independence, the NC takes into account the Director's independence in conduct, character and judgment and any relationships between the Director and the Company, its related corporations, its substantial shareholders or its officers that could interfere, or be reasonably perceived to interfere, with the exercise of his independent business judgment in the best interests of the Company.

#### Delegation by the Board

To assist in the execution of its responsibilities as a listed company, the Board has established an Audit and Risk Management Committee (the "**ARMC**"), a Remuneration Committee (the "**RC**") and an NC. These Committees function within clearly defined written terms of references setting out their compositions, authorities and duties including reporting back to the Board, which are reviewed on a periodic basis to ensure their continued relevance. The composition and effectiveness of each Committee is also periodically reviewed by the Board. The delegation of authority by the Board to the Committees enables the Board to achieve operational efficiency by empowering the Committees to decide on matters within their respective terms of reference, and yet without abdicating its responsibility. Please refer to Principles 10, 6 and 4 in this Corporate Governance Report for further information on the activities of the ARMC, the RC and the NC respectively.

The Committees are predominantly made up of Non-Executive Independent Directors (also referred to as "**Independent Directors**") and are each chaired by an Independent Director. The details of the membership in the Committees are set out as follows:

	ARMC	NC	RC
Wei Dongliang	_	Member	_
Ang Swee Tian	Member	Chairman	Chairman <sup>(1)</sup>
Ni Mingjiang	Member <sup>(2)</sup>	Member	Member
Kan Yaw Kiong (Ernest) <sup>(3)</sup>	Chairman	_	Member

#### Notes:

(1) Mr. Ang Swee Tian was appointed as the Chairman of the RC on 22 July 2022 (in place of Mr. Hee Theng Fong who retired at the conclusion of the Annual General Meeting ("AGM") of the Company held on 25 April 2022 and concurrently ceased to be the Chairman of the RC).

(2) Prof. Ni Mingjiang was appointed as a member of the ARMC on 22 July 2022.

(3) Dr. Kan Yaw Kiong (Ernest) was appointed as an Independent Director of the Company, Chairman of the ARMC (in place of Mr Tan Huay Lim who retired at the conclusion of the AGM and concurrently ceased to be the Chairman of the ARMC) and a member of the RC on 22 July 2022.

#### **Board Processes**

The Board meets at least quarterly and whenever necessary to address any specific significant matters that may arise. Records of such meetings, including key deliberations and decisions taken, are maintained by the Joint Company Secretaries. The Company's Articles of Association allow a Board meeting to be conducted by way of telephonic or video-conference. Board approval may be obtained by circulation via written resolutions.

The number of Board and Committee meetings held for the financial year ended 31 December 2022 ("**FY2022**") (for the avoidance of doubt, for the period from 1 January 2022 to 31 December 2022) and the attendance of each Director where relevant are as follows:

	Board	AGM	EGM	ARMC	NC	RC
Number of meetings held in FY2022	4	1	_	3	3	1
Name of Director		Number of meetings attended in FY2022				
Wei Dongliang	4	1	_	3^	3	1^
Wang Ruihong	4	1	_	3^	3^	1^
Ang Swee Tian	4	1	-	3	3	1
Hee Theng Fong <sup>(1)</sup>	1	1	-	1	1^	1
Tan Huay Lim <sup>(2)</sup>	1	1	_	1	1	1^
Ni Mingjiang <sup>(3)</sup>	4	1	-	1^+2	1	1
Kan Yaw Kiong (Ernest) <sup>(4)</sup>	2	_	_	2	_	-

#### Notes:

- by invitation
- (1) : Mr. Hee Theng Fong retired as an Independent Director of the Company at the conclusion of the AGM held on 25 April 2022 and accordingly ceased as the Chairman of the RC and a member of the ARMC. His attendance at the meetings held during FY2022 were recorded up to the date of his retirement thereof.
- (2) : Mr. Tan Huay Lim retired as an Independent Director of the Company at the conclusion of the AGM held on 25 April 2022 and accordingly ceased as the Chairman of the ARMC and a member of the NC. His attendance at the meetings held during FY2022 were recorded up to the date of his retirement thereof.

(3) : Prof. Ni Mingjiang was appointed as a member of the ARMC on 22 July 2022.

(4): Dr. Kan Yaw Kiong (Ernest) was appointed as an Independent Director of the Company, Chairman of the ARMC and a member of the RC on 22 July 2022. His attendance at the meetings held during FY2022 was recorded from the date of his appointment thereof.

Despite the above disclosure, the Board is of the view that the contribution of each Director should not only be focused on the attendance at Board and Board Committee meetings but should extend beyond attendance at meetings. A Director may share his or her opinion, advice and experience with other Directors and management and doing so can also further the interest of the Group. Directors with multiple board representations have ensured that sufficient time and attention are given to the affairs of the Company.

#### **Board Approval**

The Board has identified certain key matters that are specifically reserved for approval by the Board, including:

- the Group's long-term objectives and commercial strategy, and the annual operating and capital expenditure budgets;
- material investments and acquisitions and disposal of assets or projects above certain specified thresholds;
- major corporate or financial restructuring, changes to the Group's capital structure, debt financing which results in the Group's gearing ratio exceeding certain limits specified in the Group's annual budget and provision of intra-Group guarantees for which the Board's approval is requested by the financial institutions;

- dividend policy and any changes thereto, and the declaration or recommendation of dividends;
- the results of the Company, the annual report, significant changes in accounting policies or practices, transactions whereby there is a conflict of interest involving a substantial shareholder or director, and the Group's risk and control processes and corporate governance arrangements; and
- resolutions and documentation to be put forth to Shareholders at a general meeting.

The ARMC, the NC and the RC evaluate and report to the Board on other specific matters including but not limited to, compliance with the provisions of the non-competition agreement entered into by the Company with certain of its controlling shareholders, interested person transactions and any general mandate for interested person transactions, management's remuneration packages and the Jinjiang Environment Performance Share Plan ("**Jinjiang Environment PSP**").

The Board has formally refined the above matters to facilitate execution and also incorporated approval limits that require Board or management approval. The above was clearly communicated by the Board to management in writing.

#### **Orientation and Training**

The Board recognises the importance of appropriate induction and training for its Directors. Newly appointed Directors will be given an orientation program which includes presentations and briefings by the CEO and management. Physical or virtual site visits to overseas plants may also be conducted to facilitate a better understanding of the Group's operations, processes, internal controls and governance practices. Meetings with various key executives allow the Directors to be acquainted with the management team and ensure that the Directors have direct independent access to the management team in future. All newly appointed Directors will be briefed on the general duties and obligations as a Director, pursuant to the relevant legislation and regulations.

In addition to the above, all Directors and management are encouraged to undergo relevant training to enhance their skills and knowledge, particularly on new laws and regulations affecting the Group's business and governance practices. Directors who have no prior experience as a director of an issuer listed on the Singapore Exchange Securities Trading Limited ("SGX-ST") are required to attend the Listed Entity Directors Programme conducted by the Singapore Institute of Directors within the prescribed timelines under the Listing Manual of the SGX-ST ("SGX-ST Listing Manual") to acquire the relevant knowledge on the roles and responsibilities of a listed company director. The Joint Company Secretaries coordinate with such Director to complete such training, subject to the training schedule and the Director's availability. The Directors are also provided with updates periodically by the Company's compliance adviser, Joint Company Secretaries, external and internal auditors and other professionals relating to directors' duties, relevant laws, regulations and codes, financial reporting standards, internal controls, corporate governance and risk management. All the orientation and training expenses are fully funded by the Group.

All the Directors have undergone the mandatory training on sustainability conducted by the Singapore Institute of Directors in FY2022, as prescribed by the SGX-ST pursuant to Rule 720(7) of the SGX-ST Listing Manual, and the same has been disclosed in the Company's sustainability report for FY2022 enclosed herein.

#### **Complete, Adequate and Timely Information**

The Board and Board Committees are provided with a meeting agenda and the relevant papers prior to the meetings. Complete, adequate and timely information are provided prior to meetings and on an on-going basis to allow proper deliberation on issues. Draft agenda are circulated in advance to the Board and Board Committees for review and additional items can be added where necessary. Management, external and internal auditors, the compliance adviser and other professionals are invited to the meetings when necessary to provide additional inputs on the matters for discussion. The minutes of meetings are circulated to all Board members for comments and confirmation.

The Directors may request for additional information of the Company's operations or business from the management to make informed decisions. Necessary arrangements will be made to provide such information. The Board has separate and independent access to management.

#### **Joint Company Secretaries**

At least one of the Joint Company Secretaries will attend all Board and Board Committee meetings and ensure that all Board and Board Committee procedures are followed. Together with the management, the Joint Company Secretaries assist the Company in complying with all the applicable laws and regulations. The Joint Company Secretaries also advise on all corporate governance matters, ensure good information flows within the Board and between management and Directors, facilitate orientation for newly appointed Directors and assist with continuing professional training and development for the Directors. On an ongoing basis, the Directors have separate and independent access to the Joint Company Secretaries at the expense of the Company, whose duties and responsibilities are clearly defined. The appointment or the removal of the Joint Company Secretaries is a decision of the Board as a whole.

#### **Independent Professional Advice**

The Directors, whether individually or as a group, are entitled to obtain independent professional advice at the expense of the Company, in the furtherance of their duties and when circumstances warrant the advice.

#### Principle 2: Board Composition and Guidance

#### **Board of Directors**

The Board comprises 5 Directors: 1 Executive Chairman, 1 Executive Director and 3 Independent Directors. Accordingly, non-executive directors make up a majority of the Board. As at the date of this Report, the Board comprises the following members:

Name of Director	Age	Date of first appointment	Position(s)
Wei Dongliang	48	26 September 2019	Executive Chairman
Wang Ruihong	57	23 December 2010	Executive Director and Deputy General Manager
Ang Swee Tian	74	29 June 2016	Lead Independent Director
Ni Mingjiang	73	29 June 2016	Independent Director
Kan Yaw Kiong (Ernest)	65	22 July 2022	Independent Director

#### **Board Independence**

The NC conducts an annual review of each director's independence in accordance with Rule 210(5)(d) of the SGX-ST Listing Manual and Provision 2.1 of the CG Code. Rule 210(5)(d)(iv) of the SGX-ST Listing Manual is not applicable as none of the Independent Directors have been a director of the Company for an aggregate period of more than nine years (whether before or after listing).

For FY2022, the Board, taking into account the views of the NC, has determined that the three Independent Directors of the Company are independent in character and judgement and that there are no relationships or circumstances with the Company, its related corporations, its substantial shareholders (as defined in the SGX-ST Listing Manual) or its officers that could interfere, or be reasonably perceived to interfere, with the exercise of these Directors' objective business judgment in the best interests of the Company, thus providing a strong and independent element on the Board. No individual or small group of individuals dominate the Board's decision making. Given that the Chairman of the Board is not an independent director, independent directors make up a majority of the Board. Each of the Independent Directors had recused himself from the NC's and Board's deliberations on his own independence.

#### Board Composition and Size, and Board Diversity

The NC reviews the size and composition of the Board and each Board Committee annually to ensure they are of an appropriate size and comprise Directors who as a group provide an appropriate balance and mix of skills, knowledge, experience, and other aspects of diversity such as gender and age, so as to avoid groupthink and foster constructive debate. The Board is committed to achieve an appropriate level of independence and diversity of thought and background in its composition to enable it to make decisions in the best interests of the Company. The Board recognises that a diverse Board of an appropriate size is an important element which will better support the Company's achievement of its strategic objectives for sustainable development, avoid groupthink and foster constructive debate. A diverse Board also enhances decision-making process through the perspectives derived from various skills, business experience, industry discipline, gender, age, ethnicity and culture, geographical background and nationalities, tenure of service and other distinguishing qualities of the Directors.

The current Board comprises persons with ages ranging from the 40s to the 70s who have served on the Board for different tenures with diverse expertise and experience in accounting, audit, business and management, finance, risk management and sustainable energy who as a group provide core competencies necessary to meet the Company's requirements. The Directors' objective judgment on corporate affairs and collective experience and knowledge are invaluable to the Group and allows for the useful exchange of ideas and views. Accordingly, the combination of skills, talents, experience and diversity of the Directors serves the needs and plans of the Company.

Pursuant to Rule 710A of the SGX-ST Listing Manual and Provision 2.4 of the CG Code, the Board has also adopted a Board Diversity Policy that addresses gender, skills and experience, and any other relevant aspects of diversity. Under the Board Diversity Policy, the NC will, in reviewing the Board's composition, rotation and retirement of Directors and succession planning, consider a number of aspects, including but not limited to gender, age, nationalities, ethnicity, cultural background, educational background, experience, skills, knowledge, independence and length of service. In this respect, the NC considers gender to be an important aspect of diversity and strives to ensure that there is an adequate gender mix on the Board. The Board Diversity Policy has been discussed and a target of having at least one female representative on the Board by 2026, has been established. In addition, with the departure of two Independent Directors from the Board in April 2022 and the appointment of one new Independent Director to the Board in July 2022, the NC considers that the appointment of one additional Independent Director who is resident in Singapore will be beneficial to add diversity in nationalities, cultural background and knowledge to the Board and similarly strives to achieve such target by 2026.

The NC will take into account the Board Diversity Policy targets as a key criterion in its identification and evaluation of suitable candidates to ensure there is diversity (including gender diversity) on the Board. Any external search consultants, if required, engaged to assist the Board or the NC to search for candidates for appointment to the Board will be specifically directed to include diverse candidates and female candidates. Following assessment of the candidates, the NC will interview short-listed candidates and thereafter make its recommendations to the Board including appointments to the appropriate Board committees after matching the candidates' skills-set to the needs of each Board committee. The ultimate decision on the selection of Director(s) to be appointed on the Board will be based on merit, and candidates will be considered against objective criteria, having due regard for the benefits of diversity and needs on the Board.

While the current Board does not have a mixed gender diversity, consistent with the intent of Principle 2 of the CG Code, the Board currently comprises suitably qualified Directors with a good balance of expertise and experience, complemented by sound industry knowledge. Taking into account the mix of skills, talents, experience and diversity possessed by the members of the Board and the Board Committees, the Board, taking into consideration the views of the NC, considers that its Directors meet the criteria under its Board Diversity Policy and the Board possesses the necessary diversity of thought and background in its composition to enable it to make decisions in the best interests of the Company.

The NC will monitor the implementation of the Board Diversity Policy and review the Board Diversity Policy from time to time as appropriate, to ensure its effectiveness, and will recommend appropriate revisions to the Board for consideration and approval. The NC will also continue its identification and evaluation of suitable candidates to ensure there is diversity (including gender diversity) on the Board. Any further progress made towards the implementation of such policy will be disclosed in future Corporate Governance Reports, as appropriate.

The Independent Directors are kept informed of the Group's business and performance through quarterly Board meetings and have unrestricted access to management. They are encouraged to participate actively in Board meetings to provide constructive input, help develop proposals on strategy and review the performance of the Group. The Independent Directors are encouraged to meet regularly without the presence of management, and the chairman of such meetings provides feedback to the Board and/or Chairman as appropriate.

#### Principle 3: Chairman and Chief Executive Officer ("CEO")

#### Chairman and CEO

Mr. Wei Dongliang is the Executive Chairman of the Group. Mr. Wei Dongliang is responsible for the overall strategic planning and management of the Group, and is responsible for leading the Board to ensure its effectiveness on all aspects of its role, setting and allocating time for discussion on all agenda items, promoting an open environment for constructive debate at the Board, encouraging non-executive Directors to speak and contribute constructively and ensuring quality, quantity and timeliness of information flow between the Board and management. He also leads the Group in its commitment to achieve and maintain good corporate governance and facilitates dialogue between shareholders, the Board and management during shareholders' meetings.

For FY2022, there was no CEO of the Company. Mr. Wei Dongliang is responsible for overseeing the day-to-day operations of the Group.

Although the roles and responsibilities of both the Executive Chairman and the CEO are vested in Mr. Wei Dongliang, being a deviation from the Provision 3.1 of the CG Code, the Board believes that vesting the roles of both Executive Chairman and CEO in the same person who is knowledgeable in the business of the Group provides the Group with a strong and consistent leadership and thus allows for effective planning and execution of long-term business strategies.

Nonetheless, any major decisions made by Mr. Wei Dongliang are required to be reviewed and approved by the Board. Should Mr. Wei Dongliang face any conflict of interest in the proposed transaction, he is required to recuse himself from discussions and decisions involving the issues of conflict. He is also required to avoid situations in which his own personal or business interests directly or indirectly conflict, or appear to conflict, with the interests of the Group. In addition, the Independent Directors of the Company make up a majority of the Board. As such, consistent with the intent of Principle 3 of the CG Code, the Board believes that there are adequate safeguards and checks in place to ensure that the process of decision-making by the Board is independent and based on collective decision without any individual exercising any considerable concentration of power of influence. Accordingly, there is a balance of power and authority and, therefore, no one individual has unfettered powers and can control/dominate the decision-making process of the Company. The Board is not considering separating the roles of the Executive Chairman and the CEO at this moment. The NC will review the need to separate these roles from time to time and make its recommendations when necessary.

#### Lead Independent Director

Given that the Chairman is not independent, Mr. Ang Swee Tian ("**Mr. Ang**") has been appointed as the Lead Independent Director ("**Lead ID**"). The Board is of the view that the process of decision making by the Board is independent and based on collective decision-making without any individuals exercising any considerable concentration of power or influence. All major decisions made by the Group will be subject to review by the Board. The Lead ID is available to shareholders where they have concerns and for which contact through the normal channels of communication with the Chairman of the Board or management are inappropriate or inadequate. The Lead ID has also held discussions with the other independent Directors without the presence of the Executive Chairman or management.

#### Principle 4: Board Membership

#### **NC Composition and Role**

The NC comprises three directors namely:

- 1. Ang Swee Tian (NC Chairman and Lead Independent Director)
- 2. Wei Dongliang (Executive Chairman)
- 3. Ni Mingjiang (Independent Director)

Two out of three members of the NC are independent. The NC Chairman is also the Lead ID. Mr. Tan Huay Lim was a member of the NC from 1 January 2022 until his cessation as an Independent Director at the conclusion of AGM of the Company held on 25 April 2022.

The NC's key terms of reference, approved by the Board, include the following:

- making recommendations to the Board on relevant matters relating to:
  - (a) the review of structure, size and composition of the Board;
  - (b) the review of succession plans for the chairman of the Board, Directors, CEO and other key management personnel;



- (c) the development of a transparent process for evaluating the performance of the Board, its Board committees and Directors, including assessing whether Directors are able to commit enough time to discharge their responsibilities and the maximum number of listed company directorships a Director may hold;
- (d) the review of training and professional development programmes for the Board and its Directors;
- (e) the appointment and re-appointment of all Directors (including any alternate directors); and
- (f) the annual review and confirmation of the independence of each Director
- to have a regular and strategic review of the structure, size and composition (including the skills, gender, age, qualification, experience and diversity) of the Board and Board committees. The NC will then recommend changes, if any, to the Board to ensure that the Board retains an appropriate balance of skills and diversity;
- to identity and nominate candidates to fill Board vacancies as they occur;
- reviewing other directorships and principal commitments held by each Director and decide whether a Director is able to carry out, and has been adequately carrying out, his/her duties as a Director, taking into consideration the number of listed company directorships held by the Director and his/her principal commitments;
- to disclose the process for selection, appointment and re-appointment of directors to the Board, including the criteria used to identify and evaluate potential new directors and channels used in searching for appropriate candidates; and
- reviewing and determining annually (or whenever necessary), the independent status of Directors (and that of the alternate Directors (if applicable)), having regard to the Code and the SGX-ST Listing Manual.

Based on the NC and the Board evaluation checklists completed by the NC and the Directors respectively, the NC believes that it has fulfilled its responsibilities and discharged its duties as set out in its written terms of reference. The Joint Company Secretaries maintain records of all NC meetings and these checklists. For more information on these checklists, please refer to Principle 5 of this Corporate Governance Report.

#### Selection, Nomination and Appointment of New Directors

In the selection and nomination for new Directors, the NC identifies the key attributes that an incoming Director should possess based on the requirements of the Group. The NC taps on the Directors, management and external parties for recommendations of potential candidates. The NC meets with the potential candidates to assess their suitability before formally recommending them for appointment to the Board for further evaluation.

In the selection process, the NC considers:

- the candidate's track record, experience and expertise, age, gender and other attributes that the Board identifies;
- the independence of the candidate, in the case of the appointment of an independent director;
- competing time commitments if the candidate has multiple listed company board representations and other principal commitments; and
- the composition requirements of the Board and Board Committees.



#### **Re-appointment of Directors**

The NC reviews the nomination of relevant Directors for re-election and appointment, including their independence as a director, if applicable. When considering the nomination for re-appointment, the NC siders the composition and progressive renewal of the Board and each Director's contribution and performance (e.g. attendance, preparedness, participation and candour).

The NC also decides if a Director is able to and has been adequately carrying out his or her duties as a Director of the Company. The NC reviews annually the directorships held by each Director as well as principal commitments, if any. Where a Director holds a significant number of listed company directorships and principal commitments, the NC and the Board will make a reasoned assessment of the ability of the Director to diligently discharge his or her duties. Each Director is also required to confirm annually to the NC whether he has any issue with competing time commitments which may impact his ability to provide sufficient time and attention to his duties as a Director of the Company. The NC and the Board will also take into consideration whether a Director had previously served on the board of a company with an adverse track record or with a history of irregularities or is or was under investigation by regulators. The NC and the Board will also assess whether a Director's resignation from the board of any such company casts any doubt on the director's qualification and ability to act as a Director of the Company. Based on the analysis, the confirmation from the Directors, the number of listed company directorships and principal commitments of each Director and their contribution to the Company, the NC is of the view that all the Directors are able to and have adequately carried out their duties as Directors of the Company.

Although Practice Guidance 4 of the CG Code recommends the Board to determine the maximum number of listed company board representations which any Director may hold, the NC does not recommend setting this limit. The Board considers several factors as described above to be a more effective assessment of a Director's commitment rather than to prescribe a limit. Suitable candidates who have multiple board representations may still have the capacity to participate and contribute as members of the Board. Currently, the number of directorships in other listed companies, excluding the Company, held by the Directors ranges from nil to three.

The Board requires a Director to inform the Board when accepting any new principal commitment or listed company board appointment. The Director will be required to confirm that the new commitment or appointment will not affect his ability to adequately carry out his duties as a Director of the Company. Directors are also required to disclose to the Board details of any relationships with the Company, its related corporations, its substantial shareholders or its officers, if any, which may affect their independence<sup>1</sup>, including business relationships which a Director, his or her immediate family member, or an organisation which the Director, or his or her immediate family member is a substantial shareholder, partner (with 5% or more stake), executive officer or director in has with the Company or any of its related corporations, and the Director's direct association with a substantial shareholder of the Company, in the current and immediate past financial year. No Director or his or her immediate family member, or a company that he, she or they are a substantial shareholder in, provides to or receives from the company or its subsidiaries any significant payments or material services.

The Company's Articles of Association provide that each Director shall retire at least once every three years and a retiring Director shall be eligible for re-election. The Company's Articles of Association further provide that where the Directors at any time appoint a natural person as a Director either to fill a casual vacancy or as an additional Director, any such person shall hold office only until the next AGM. At the forthcoming AGM, Mr. Wei Dongliang (who was appointed by the Directors on 26 September 2019 and subsequently re-elected at the AGM of the Company for the financial year ended 31 December 2019 held on 24 June 2020) and Dr. Kan Yaw Kiong (Ernest) (who was appointed by the Directors on 22 July 2022), will be retiring. Mr. Wei Dongliang and Dr. Kan Yaw Kiong (Ernest) have offered themselves for re-election. Mr. Wei Dongliang, being a member of the NC, has abstained from the deliberation in respect of his re-nomination as a Director. The NC recommended that Mr. Wei Dongliang and Dr. Kan Yaw Kiong (Ernest) be nominated for re-election at the forthcoming AGM.

<sup>1 &</sup>quot;independence" has the same meaning as defined in the CG Code and Rule 210(5)(d) of the SGX-ST Listing Manual.



#### **Succession Planning**

In reviewing succession plans, the NC considers the Company's strategic priorities and the factors affecting the long-term success of the Company. In relation to succession plans for Directors, the NC aims to maintain an optimal Board composition by considering the trends affecting the Company, reviewing the skills needed, and identifying gaps (including considering whether there is an appropriate level of diversity of thought). In relation to succession plans for key management personnel, the NC takes an active interest in how key talent is managed within the Group and reviews the mechanisms for identifying strong candidates and developing them to take on senior positions in the future. The NC considers different time horizons for succession planning as follows: (1) long-term planning, to identify competencies needed for the Company's strategy and objectives, (2) medium-term planning, for the orderly replacement of Board members and key management personnel, and (3) contingency planning, for preparedness against sudden and unforeseen changes.

# The present and past (at least for the past five years) listed company directorships and principal commitments of each Director

Name	Present Directorships	Past Directorships
Wei Dongliang	Group Companies	Group Companies
	Hangzhou Jinjiang Environment Investment Co., Ltd.	-
	(杭州锦环投资有限公司)	Other Companies
	Singapore Jinjiang Environment Pte. Ltd. (新加坡锦江环境私人有限公司)	Zhejiang Fuzhe Investment Co., Ltd. (浙江富浙投资有限公司)
	Lamoon Holding Limited	Zhejiang Provincial Energy Group Venture Capital Co., Ltd.
	Outstanding Mode Developments Limited	(浙江浙能创业投资有限公司)
	Sunrise Development Group Limited (晨兴发展集团有限公司)	Zhejiang Zheneng Beilun Power Generation Co., Ltd. (浙江浙能北仑发电有限公司)
	Gevin Limited (格闻有限公司)	Zhejiang Zheneng Changxing Power
	Prime Gain Investments Limited (鸿盈投资有限公司)	Generation Co., Ltd. (浙江浙能长兴发电有限公司)
	(临安嘉盛环保有限公司)	(浙能股权投资基金管理有限公司)
	Other Companies	Zhejiang Zheneng Investment Management Co., Ltd.
	-	(浙江浙能投资管理有限公司)

Zheneng Capital Holdings Co., Ltd. (浙能资本控股有限公司)



Name	Present Directorships	Past Directorships
Wang Ruihong	Group Companies	Group Companies
	Lin'an Jiasheng Environmental Protection Co., Ltd. (临安嘉盛环保有限公司)	Hohhot Jiasheng New Energy Co., Ltd. (呼和浩特嘉盛新能源有限公司)
	Green Energy (Hangzhou) Enterprise Management Co., Ltd.	Baishan Green New Energy Co., Ltd. (白山绿能新能源有限公司)
	(绿能(杭州)企业管理有限公司)	Hunchun Green New Energy Co., Ltd. (珲春绿能新能源有限公司)
	Hangzhou Jinjiang Environment Investment Co., Ltd. (杭州锦环投资有限公司)	Linzhou Jiasheng New Energy Co., Ltd. (林州市嘉盛新能源有限公司)
	Hangzhou Xiaoshan Jinjiang Green Energy Co., Ltd. (杭州萧山锦江绿色能源有限公司)	Zhongwei Green New Energy Co., Ltd (中卫市绿能新能源有限公司)
	Hangzhou Yuhang Jinjiang Environmental Energy Co., Ltd.	Tangshan Jiasheng New Energy Co., Ltd. (唐山嘉盛新能源有限公司)
	(杭州余杭锦江环保能源有限公司)	Lüliang Green New Energy Co., Ltd (吕梁绿能新能源有限公司)
	Wenling Green New Energy Co., Ltd. (温岭绿能新能源有限公司)	Zibo Green New Energy Co., Ltd. (淄博绿能新能源有限公司)
	Wuhan Green Energy Co., Ltd. (武汉市绿色环保能源有限公司)	Other Companies
	Wuhan Hankou Green Energy Co., Ltd. (武汉汉口绿色能源有限公司)	_
	Kunming Xinxingze Environmental Resource Industry Co., Ltd. (昆明鑫兴泽环境资源产业有限公司)	es
	Yunnan Green Energy Co., Ltd. (云南绿色能源有限公司)	
	Zibo Environmental Energy Co., Ltd. (淄博环保能源有限公司)	
	Zibo Green Environmental Energy Co., Ltd. (淄博绿能环保能源有限公司)	
	Gaomi Lilangmingde Environmental Protect Technology Co., Ltd. (高密利朗明德环保科技有限公司)	ion

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Name	Present Directorships	Past Directorships
	Jilin Xinxiang Co., Ltd. (吉林省鑫祥有限责任公司)	
	Songyuan Xinxiang New Energy Co., Ltd. (松原鑫祥新能源有限公司)	
	Suihua Green New Energy Co., Ltd. (绥化市绿能新能源有限公司)	
	Qitaihe Green New Energy Co., Ltd. (七台河绿能新能源有限公司)	
	Lianyungang Sunrise Environmental Protection Industry Co., Ltd. (连云港晨兴环保产业有限公司)	
	Zhengzhou Xingjin Green Environmental Energy Co., Ltd. (郑州荥锦绿色环保能源有限公司)	
	Yinchuan Zhongke Environmental Electrical Co., Ltd. (银川中科环保电力有限公司)	
	Zhejiang Zhuji Bafang Thermal Power Co., Ltd (浙江诸暨八方热电有限责任公司)	
	Wuhu Lüzhou Environmental Protection Energy Co., Ltd. (芜湖绿洲环保能源有限公司)	
	Tianjin Sunrise Environmental Protection Science and Technology Development Co., Ltd. (天津市晨兴力克环保科技发展有限公司)	
	Shanghai Sunrise Management Co., Ltd. (上海晨兴企业管理有限公司)	
	Shijiazhuang Jiasheng New Energy Co., Ltd (石家庄嘉盛新能源有限公司)	
	Tangshan Jinhuan New Energy Co., Ltd (唐山市锦环新能源有限公司)	
	Ecogreen Energy Private Limited	
	Ecogreen Energy Gurgaon Faridabad Private Limited	



Name	Present Directorships	Past Directorships
	Ecogreen Energy Lucknow Private Limited	
	Ecogreen Energy Gwalior Private Limited	
	PT Jinjiang Environment Indonesia	
	PT. Indo Green Power	
	Singapore Jinjiang Environment Pte. Ltd. (新加坡锦江环境控股有限公司)	
	Other Companies	
	-	
Ang Swee Tian	Group Companies	Group Companies
	_	_
	Other Companies	Other Companies
	* Cosco Shipping International (Singapore) Co., Ltd.	* China Aviation Oil (Singapore) Corporation Ltd
	ICE Singapore Holdings Pte. Ltd.	Tuas Power Ltd
	ICE Futures Singapore Pte. Ltd.	Tuas Power Generation Pte. Ltd.
	ICE Clear Singapore Pte. Ltd.	TP Utilities Pte. Ltd.
	* IWOW Technology Limited	Amare-Greenland Hospitality Investments (AGHI) Pte. Ltd.
Ni Mingjiang	Group Companies	Group Companies
	_	_
	Other Companies	Other Companies
	_	_
Kan Yaw Kiong (Ernest)	Group Companies	Group Companies
	_	-
	Other Companies	Other Companies
	* CapitaLand India Trust	_

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\* : denotes public listed companies listed on the SGX-ST

The principal commitments, working experience, academic and professional qualifications and shareholding in the Company and its related corporations (if any) of the Directors can be found in the sections entitled "Board of Directors" and "Directors' Statement" of this Annual Report.

Pursuant to the composite approach to analysing a Director's effectiveness outlined above, although some of the Directors hold multiple directorships in other listed companies, the NC and the Board believe that such multiple board representations do not hinder each Non-Executive Director from carrying out his duties as a Director of the Company, and they have been able to and will continue to adequately discharge their duties diligently.

## Supplemental Information on Directors pursuant to Rule 720(6) of the Listing Manual of the SGX-ST

The information required under Rule 720(6) of the SGX-ST Listing Manual relating to the Directors being proposed for re-election, namely, Mr. Wei Dongliang and Dr. Kan Yaw Kiong (Ernest), are set out below:

Name of Director	Wei Dongliang	Kan Yaw Kiong (Ernest)
Date of Appointment	26 September 2019	22 July 2022
Date of Last Re-Appointment (if applicable)	24 June 2020	-
Age	48	65
Country of Principal Residence	People's Republic of China	Singapore
The Board's comments on this appointment (including rationale, selection criteria, and the search and nomination process)	The re-election of Mr. Wei Dongliang as Director was recommended by the NC and the Board has accepted the recommendation, after taking into consideration his qualifications, expertise, past experience and overall contributions since he was appointed as a Director of the Company. Mr. Wei Dongliang has abstained from the deliberation of the NC and the Board pertaining to his re-election.	The re-election of Dr Kan Yaw Kiong (Ernest) as Director was recommended by the NC and the Board has accepted the recommendation, after taking into consideration his qualifications, expertise, past experience and overall contributions since he was appointed as a Director of the Company. Dr. Kan Yaw Kiong (Ernest) has abstained from the deliberation of the Board pertaining to his re-election.
Whether appointment is executive, and if so, the area of responsibility	Executive Mr. Wei Dongliang is responsible for the overall strategic planning and management of the Group.	Non-Executive
Job Title (e.g. Lead ID, AC Chairman, AC Member etc.)	Executive Chairman and Member of NC	Independent Director, Chairman of ARMC and Member of RC
Professional Qualifications	Please refer to the "Board of Directors" section	
Working experience and occupation(s) during the past 10 years	Please refer to the "Board of Directors" section	
Shareholding interest in the listed issuer and its subsidiaries	None	None



Name of Director	Wei Dongliang	Kan Yaw Kiong (Ernest)
Any relationship (including immediate family relationships) with any existing director, existing executive officer, the issuer and/or substantial shareholder of the listed issuer or of any of its principal subsidiaries	None	None
Conflict of interest (including any competing business)	None	None
Undertaking (in the format set out in Appendix 7.7 under Rule 720(1) has been submitted to the listed issuer	Yes	Yes
Other Principal Commitments <sup>2</sup> including Directorships – Past (for the last 5 years)	<ul> <li>Director of:</li> <li>Zhejiang Fuzhe Investment Co., Ltd. (浙江富浙投资有限公司)</li> <li>Zhejiang Provincial Energy Group Venture Capital Co., Ltd. (浙江浙能创业投资有限公司)</li> <li>Zhejiang Zheneng Beilun Power Generation Co., Ltd. (浙江浙能北仑发电有限公司)</li> <li>Zhejiang Zheneng Changxing Power Generation Co., Ltd. (浙江浙能长兴发电有限公司)</li> <li>Zheneng Equity Investment Fund Management Co., Ltd. (浙能股权投资基金管理有限公司)</li> <li>Zhejiang Zheneng Investment Management Co., Ltd. (浙江浙能投资管理有限公司)</li> <li>Zhejiang Zheneng Investment Management Co., Ltd. (浙江浙能投资管理有限公司)</li> <li>Zhejiang Zheneng Ningbo Natural Gas Technology Development Limited Liability Company (now known as Cnooc Lvneng Port and Zhejiang Ningbo Energy Co. Ltd) (浙江浙能宁波天然气科技开发有限 责任公司,现名称为中海油绿能港 浙江宁波能源有限公司)</li> <li>Zheneng Capital Holdings Co., Ltd. (浙能资本控股有限公司)</li> </ul>	Deloitte & Touche Management Services Pte Ltd (Board Member)

2 Principal Commitments has the same meaning as defined in the CG Code.



Name of Director	Wei Dongliang	Kan Yaw Kiong (Ernest)
Name of Director Other Principal Commitments* including Directorships – Present	<ul> <li>Wei Dongliang</li> <li>Director of:-</li> <li>Hangzhou Jinjiang Environment Investment Co., Ltd. 杭州锦环投资有限公司</li> <li>Singapore Jinjiang Environment Pte. Ltd. 新加坡锦江环境私人有限公司</li> <li>Lamoon Holding Limited</li> <li>Outstanding Mode Developments Limited</li> <li>Sunrise Development Group Limited</li> </ul>	<ul> <li>Kan Yaw Kiong (Ernest)</li> <li>Director of:-</li> <li>ITE Education Services Pte. Ltd.</li> <li>YR Industries Pte Ltd</li> <li>CapitaLand India Trust</li> </ul>
	<ul> <li>是兴发展集团有限公司</li> <li>Gevin Limited 格闻有限公司</li> <li>Prime Gain Investments Limited 鸿盈投资有限公司</li> <li>Lin'an Jiasheng Environment Co., Ltd. 临安嘉盛环保有限公司</li> </ul>	

\* The term "principal commitments" shall include all commitments which involve significant time commitment such as full-time occupation, consultancy work, committee work, non-listed company board representations and directorships and involvement in non-profit organisations. Where a director sits on the boards of non-active related corporations, those appointments should not normally be considered principal commitments.

The Company confirms that the responses to declaration items (a) to (k) of Appendix 7.4.1 of the SGX-ST Listing Manual concerning the Directors to be re-elected, which are a "no".

Additional information on the Directors of the Company can be found under the "Board of Directors".



## Principle 5: Board Performance

## **Board Evaluation Process**

The Board has a process in place for undertaking a formal annual assessment of the effectiveness of the Board as a whole, each of its Board Committees and for assessing the contribution by each Director to the effectiveness of the Board. No external facilitator was used. The NC assesses performance using objective performance criteria and processes, which were recommended by the NC and approved by the Board, for the evaluation of the effectiveness of the Board as a whole, and of each Board Committee separately, as well as the contribution by the Executive Chairman and each Director to the Board. The overall evaluation and recommendations for improvement are presented to the Board.

## Board Evaluation and Board Committees Evaluation Criteria

The NC evaluates the overall Board performance based on various factors including the Board composition, its roles and responsibilities, financial performance, the access to information and its conduct of meetings. Financial performance includes the quarterly and full year performance against the prior corresponding period and against the budget.

For the financial year under review, Directors were requested to complete a board evaluation checklist to assess the overall effectiveness of the Board and Board Committees. In addition, the Chairmen of the respective Board Committees are also required to complete a questionnaire on the effectiveness of the Board Committees, which would be tabled at the NC meeting for further discussion. The results of these checklists were considered by the NC in its assessment of the Board's and the Board Committees' performance.

## Individual Director Evaluation Criteria

In the assessment of a Director's performance, the NC evaluates the Director's expertise and competencies, attendance records and the level of constructive participation at Board meetings and the contribution to the Board processes and the Group's strategy and performance. When deliberating the performance of a Director who is also an NC member, that member abstains from the discussions to avoid any potential conflict of interest.

The evaluation results of each Director are used by the NC in consultation with the Executive Chairman, in the review of the Board and Board Committees composition as well as recommendations for the re-appointment and re-election of retiring Directors. Any comments from Directors relating to the Board and its performance are also presented to the Board.

## **Remuneration Matters**

# Principle 6: Procedures for Developing Remuneration Policies

# **RC** Composition and Role

The RC comprises three directors namely:

- 1. Ang Swee Tian (RC Chairman and Lead Independent Director)
- 2. Ni Mingjiang (Independent Director)
- 3. Kan Yaw Kiong (Ernest) (Independent Director)
- ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED



The RC comprises three non-executive Directors, all of whom including the Chairman of the RC (who is also the Lead ID) are independent. Mr. Hee Theng Fong was the Chairman of the RC from 1 January 2022 until his cessation as an Independent Director at the conclusion of AGM of the Company held on 25 April 2022. Mr. Ang Swee Tian and Dr. Kan Yaw Kiong (Ernest) were appointed as the Chairman of the RC and a member of the RC, respectively, on 22 July 2022.

The RC's key terms of reference, approved by the Board, includes the following:

- reviewing and making recommendations to the Board on all aspects of remuneration, including Directors' fees and the Company's remuneration policies;
- reviewing and making recommendations to the Board on the framework of remuneration for the Board chairman, the Directors, the CEO and other key management personnel;
- reviewing and making recommendations to the Board on the specific remuneration packages for each Director, the CEO and other key management personnel;
- reviewing the remuneration of any employees who are immediate family members of the Directors, CEO or substantial shareholders;
- reviewing and making recommendations to the Board on the talent management and remuneration framework for the Group, including staff development and succession planning;
- monitoring the level and structure of remuneration for key management personnel relative to internal and external peers and competitors;
- ensuring that the contractual terms and any termination payments are fair to the individual and the Company; and
- administering the Jinjiang Environment PSP in accordance with the respective rules adopted (if applicable).

The Company has in place a remuneration framework for the executive Directors and Key Management Personnel. The RC has reviewed the contracts for executive Directors and Key Management Personnel. Overall, the RC considers all aspects of remuneration, including termination terms, to ensure that they are fair. In doing so, the RC has not engaged any remuneration consultants. No Director is involved in deciding his own remuneration.

The RC oversees and administers the Jinjiang Environment PSP. It has the power to make or vary arrangements or guidelines for the implementation and administration of the Jinjiang Environment PSP. There were no share awards granted under the Jinjiang Environment PSP during FY2022. No shares were issued and allotted pursuant to the Jinjiang Environment PSP during FY2022.

Based on the RC and the Board evaluation checklists completed by the RC and the Directors respectively, the RC believes that it has fulfilled its responsibilities and discharged its duties as set out in its terms of reference. The Joint Company Secretaries maintain records of all RC meetings and these checklists. For more information on these checklists, please refer to Principle 5 of this Corporate Governance Report.



## Principle 7: Level and Mix of Remuneration

## **Remuneration of Directors and Management**

The RC periodically considers and reviews the remuneration packages in order to maintain their attractiveness, to attract, retain and motivate the Directors to provide good stewardship of the Company and Key Management Personnel to successfully manage the Company for the long term, and to ensure that the level and structure of remuneration of the Board and Key Management Personnel are appropriate and proportionate to the sustained performance and value creation of the Company, taking into account the strategic objectives, and the long-term interests and risk policies of the Company.

The Company adopts a performance-based remuneration system for employees, including its executive Directors and Key Management Personnel. A significant and appropriate proportion of executive Directors' and Key Management Personnel's remuneration is structured so as to link rewards with the achievement of corporate and individual performance targets in an objective and equitable way and reflects the degree of responsibility held by each employee. The Group seeks to ensure that the variable component is aligned with the interests of shareholders and other stakeholders and promotes the long-term success of the Company. To ensure that the level and structure of remuneration is proportionate to the sustained performance and value creation of the Group, the Company has put in place a framework of remuneration for its executive directors and key management personnel. The key areas of focus of the remuneration framework and details of the implementation within the Group are set out below:

Key Areas of Focus	Details
Pay for performance	Instil and drive a pay-for-performance culture
	• Ensure that remuneration is closely linked to annual and long-term business objectives
	• Set, communicate and monitor key performance targets and indicators
	• Adjust the proportion of fixed and variable remuneration to emphasise sustainable performance that is aligned with the Group's strategic objectives, considering qualitative and quantitative factors
Competitive remuneration	Benchmark total remuneration against other organisations of similar size     and standing in the Group's industry
Accountability and Risk-taking	• Focus on achieving risk-adjusted returns that are consistent with prudent risk taking and capital management as well as emphasis on long-term sustainable outcomes
	• Design remuneration structure to align incentive payments with the long- term performance of the Group through deferred vesting of incentives



The remuneration package is made up of both fixed and variable components. The fixed component is essentially base salary and fixed allowances. The variable component is determined based on the performance of the individual employee as well as the Group's performance. It is made up of year-end bonus and other benefits. The variable component, annual increments and adjustments to remuneration are reviewed and approved taking into account the results of the annual review made by the executive Directors and the various heads of department. The Group seeks to ensure that the variable component is aligned with the interests of shareholders and other stakeholders and promotes the long-term success of the Company.

All the Executive Directors have entered into service agreements with the Company. The service agreements are for a term of three years and thereafter continue from year to year, unless terminated. The service agreements set out the salary, bonus and other benefits that the executive Directors are entitled to. The Independent Directors receive Directors' fees, which are appropriate to their level of contribution and determined after taking into account factors such as time and effort spent, frequencies of meetings, roles and responsibilities of the Directors, and the need to pay competitive fees to attract and retain the Directors. Directors' fees are subject to shareholders' approval at the AGM. The Company does not discourage the Directors from holding shares in the Company. There is no requirement under the Company's Articles of Association for Directors to hold shares in order to qualify to act as a Director of the Company.

The Jinjiang Environment PSP is a longer-term incentive plan in the form of share awards granted by the Company. The plan increases the Group's effectiveness and flexibility in its efforts to recruit, reward and motivate employees to exceed the key financial and operational goals of the Group and to strive for long-term shareholder value. Shares allotted and issued to employees pursuant to the vesting of share awards granted under the Jinjiang Environment PSP are subject to a moratorium on trading for a period of one year. The Group encourages but does not require the employees to hold on to the shares upon expiry of the moratorium period.

## Principle 8: Disclosure on Remuneration

## **Disclosure on Remuneration**

The remuneration package for Directors and Key Management Personnel is made up of a fixed component (base salary and fixed allowances) and a variable component (year-end bonus and other benefits), and may also include longer-term incentives. There were no termination, retirement and post-employment benefits granted to Directors and Key Management Personnel in FY2022.

The policy and criteria for setting remuneration and the link between remuneration paid to Directors and Key Management Personnel and performance is set out under Principle 7 above. Information on the Jinjiang Environment PSP can be found under "Share Options and Performance Shares" in the Directors' Statement.



## Remuneration for Directors, CEO and Key Management Personnel

The remuneration for the Directors and the CEO of the Company for FY2022 is set out below:

Name	Base/Fixed Salary	Variable Bonus	Directors' Fees <sup>1</sup>	Awards of Shares under the Jinjiang Environment PSP	Total
	%	%	%	%	%
Wei Dongliang	67	33	_	_	100
Wang Ruihong	67	33	_	_	100
Ang Swee Tian	_	_	100	_	100
Hee Theng Fong <sup>2</sup>	_	_	100	_	100
Tan Huay Lim <sup>2</sup>	-	-	100	-	100
Ni Mingjiang	-	-	100	-	100
Kan Yaw Kiong (Ernest) <sup>3</sup>	-	-	100	-	100

#### Notes:

1 The Directors' fees for FY2022 are subject to approval by shareholders as a lump sum at the AGM.

2 The Directors' fees are pro-rated for FY2022 for each of Mr. Hee Theng Fong and Mr. Tan Huay Lim until their cessation as Independent Directors at the conclusion of the AGM held on 25 April 2022.

3 The Directors' fees for FY2022 for Dr. Kan Yaw Kiong (Ernest) are pro-rated from his date of appointment as an Independent Director on 22 July 2022.

The remuneration for the top 4 Key Management Personnel (who are not Directors or the CEO) of the Company for FY2022 is set out below:

Name	Base/Fixed Salary	Variable Bonus	Allowances	Awards of Shares under the Jinjiang Environment PSP	Total
	%	%	%	%	%
Wang Wuzhong	66	33	1	_	100
Jin Ruizhi	66	33	1	_	100
Qi Liang	61	38	1	_	100
E Hongbiao	81	17	2	_	100

The Board believes that it is not in the best interest of the Company to fully disclose the precise remuneration for each individual Director and the CEO given the highly competitive industry conditions for the waste-to-energy sector particularly in the People's Republic of China.



Notwithstanding provision 8.1(b) of the CG Code, as there were only four Key Management Personnel (who are not Directors or the CEO) during FY2022, disclosure is only made in respect of the remuneration of these four Key Management Personnel.

Due to the confidentiality and commercial sensitivity attached to remuneration matters, in particular those of our Key Management Personnel, given the highly competitive environment the Group operates in, the Company does not fully disclose the remuneration of each individual Director and the Key Management Personnel or the aggregate remuneration paid to these four Key Management Personnel. However, disclosures had been provided as above, with a breakdown in percentage of the remuneration earned through base/fixed salary, variable bonus, allowances, and/or awards of Shares under the Jinjiang Environment PSP. Despite having varied from Provision 8.1(a) of the Code, the Board believes that consistent with the intent of Principle 8 of the Code, there is sufficient transparency on the Company's remuneration, performance and value creation, details of which are further set out under Principle 7 above, which provides reasonable amount of information on the Company's remuneration framework to enable shareholders to have an adequate appreciation of the remuneration of its Directors and Key Management Personnel and to understand the link between the Company's performance and the remuneration of the CEO and other top four Key Management Personnel. The fees to the Independent Directors are put forward to shareholders for approval on an annual basis at the Company's AGM. Accordingly, the Board believes that the existing practices adopted by the Company are consistent with the intent of Principle 8 of the CG Code.

## Employees who are Substantial Shareholders/Immediate Family Member of Directors/CEO/Substantial Shareholders

The Group does not have any employee who is a substantial shareholder of the Company or an immediate family member of a Director, the CEO or a substantial shareholder of the Company, and whose remuneration exceeded S\$100,000 during FY2022.

## Accountability and Audit

## Principle 9: Risk Management and Internal Controls

The Directors recognise that they have overall responsibility for the governance of risk and ensuring that management maintains a sound system of risk management and internal controls including financial, operational, compliance and information technology controls, to safeguard the interests of the Company and its shareholders.

The management has put in place an Enterprise Risk Management Framework. The Framework seeks to formalise and document the internal processes to enable significant strategic, financial, operational, compliance and information technology risks within the Group to be identified, assessed, managed and monitored. The Board determines the nature and extent of the significant risks which the Company is willing to take in achieving its strategic objectives and value creation, and oversees management in the design, implementation and monitoring of the risk management and internal control systems. Management reviews the Group's business operations to identify key risk areas and risk mitigating strategies to ensure that risks are adequately managed within the Group's risk tolerance limits.

Management has designed and put in place the Group's internal controls structure to provide reasonable assurance against material financial misstatements or loss, for safeguarding Company's assets, for maintenance and provision of reliable and relevant accounting, financial and other information, and in compliance with the applicable laws and regulations. However, the Board notes that no internal controls system can provide absolute assurance in view of inherent limitations of any internal controls system against the occurrence of human and system errors, poor judgment in decision making, losses, fraud or other irregularities.

For the financial year under review, the Executive Chairman and the Chief Financial Officer ("**CFO**") provided assurance to the Board on the integrity of the first quarter, half year, third quarter and the full year unaudited financial statements. The Board in turn provided a negative assurance confirmation in respect of the unaudited financial statements for the first quarter, half year, third quarter and the full year for FY2022 to the shareholders in accordance with the regulatory requirements. The Executive Chairman and other Key Management Personnel also provided the Board with such information and explanations as the Board may require from time to time.

The Executive Chairman and the CFO provided written assurances to the Board that the Group's financial records have been properly maintained and the financial statements give a true and fair view of the Company's operations and finances. The Executive Chairman and other Key Management Personnel who are responsible also provided written assurances to the Board that the internal controls and risk management systems in place are adequate and effective to address in all material aspects, the financial, operational, compliance and information technology risks within the current scope of the Group's business.

The ARMC reviews the adequacy and effectiveness of the Group's key internal controls and risk management systems with the assistance of management and external and internal auditors. The internal audit identified some control weaknesses at some of the Group's subsidiaries in China and provided recommendations for improvements. Management has adopted the recommendations to address these weaknesses and the internal audit will follow up to ensure that the recommendations were properly implemented. The external auditors, PricewaterhouseCoopers LLP ("**PwC**"), during the course of the audit of the Group's financial statements, identified several possible improvements to the relevant procedures, controls and other aspects, which were presented to the ARMC for consideration. Management action plans are initiated to address the weaknesses identified. Management has assessed and determined that these weaknesses do not have significant financial impact on the financial statements for the Group for FY2022. For the avoidance of doubt, PwC's recommendations do not in any way modify their audit opinion. The Company's management has noted PwC's observations and recommendations and is taking the necessary steps to implement PwC's recommendations.

Based on the above audits and the written assurance from management, the Board and the ARMC are of the opinion that the system of internal controls and risk management to address the financial, operational, compliance and information technology risks of the Company, are adequate and effective as at 31 December 2022.

Management will continue to periodically review and strengthen the Group's control environment and further refine its internal policies and procedures. Management continues to devote resources and expertise to maintain a high level of governance and internal controls for the Group.



#### Principle 10: Audit Committee

#### **Composition of ARMC**

The ARMC comprises three directors namely:

- 1. Kan Yaw Kiong (Ernest) (ARMC Chairman and Independent Director)
- 2. Ang Swee Tian (Lead Independent Director)
- 3. Ni Mingjiang (Independent Director)

The ARMC comprises three non-executive Directors, all of whom including the Chairman of the ARMC are independent. Mr. Tan Huay Lim was the Chairman of the ARMC from 1 January 2022 until his cessation as an Independent Director at the conclusion of AGM of the Company held on 25 April 2022. Dr. Kan Yaw Kiong (Ernest) and Prof. Ni Mingjiang were appointed as the Chairman of the ARMC and a member of the ARMC, respectively, on 22 July 2022. At least two members of the ARMC, including the ARMC Chairman, possess recent and relevant accounting or related financial management expertise and experience. With the current composition, the ARMC believes that it has the relevant accounting or related financial management expertise and experience to discharge its functions within its written terms of reference which has been approved by the Board. None of the ARMC members is a former partner or director of the Group's existing auditing firms within the last 24 months and none of the ARMC members has any financial interest in the Group's existing auditing firms.

## Powers and Duties of the ARMC

The ARMC is authorised by the Board to review and investigate any matters it deems appropriate within its terms of reference. The ARMC had full access to and co-operation of the management and external auditors. To facilitate discussions, the ARMC can invite any Director or management of the Group and external and internal auditors to attend its meetings. In addition, the ARMC can engage any firm of accountants, lawyers or other professionals as it deems fit to provide independent advice, at the Company's expense.

The key responsibility of the ARMC is to assist the Board in maintaining a high standard of corporate governance. The ARMC provides an independent review of the Group's financial reporting processes, including the review of accounting policies and practices, and the key internal controls, covering financial, operational, compliance, information technology and risk management controls. The ARMC's key terms of reference are as follows:

- reviewing the significant financial reporting issues and judgements so as to ensure the integrity of the financial statements of the Company and any announcements relating to the Group's financial performance;
- reviewing at least annually the adequacy and effectiveness of the Group's internal controls and risk management systems. The ARMC also reviews the Board's comments regarding the adequacy and effectiveness of the Group's internal controls and risk management systems and states whether it concurs with the Board's comments received. The ARMC may commission an independent audit on the internal controls and risk management systems for its assurance, or where it is not satisfied with the internal controls and risk management systems;
- reviewing the assurance from the Group CEO and the CFO on the financial records and financial statements;



- reviewing the adequacy, effectiveness, independence, scope and results of the Company's external audit function and making recommendations to the Board on the appointment, re-appointment or removal of the Company's external auditors as well as the remuneration and terms of engagement of the Company's external auditors;
- reviewing the adequacy, effectiveness, independence, scope and results of the Company's internal audit function, being the primary reporting line of the internal audit function and deciding on the appointment, termination and remuneration of the internal audit function;
- ensuring that the Group complies with the applicable laws and regulations and to ensure that the Company has
  programmes and policies in place to identify and prevent fraud or irregularity, and discussing with the Company's
  external auditors, and at an appropriate time report to the Board, if the ARMC becomes aware of any suspected
  fraud or irregularity or suspected infringement of any law, rule or regulation which has or is likely to have a material
  impact on the Group's operating results and/or financial position, and commission and review the findings of
  internal investigations into such matters;
- reviewing and ensuring that policies and arrangements are in place for concerns about possible improprieties in financial reporting or other matters to be safely raised, independently investigated and appropriately followed up on, and to ensure that the Company publicly discloses, and clearly communicates to employees of the Company, the existence and operation of a whistle-blowing policy and procedures for raising their concerns;
- reviewing all interested person transactions and related party transactions to ensure that they are on normal commercial terms, and that they do not prejudice the interests of the Company or its minority shareholders;
- monitoring and approving the exercise of any of the rights under the Non-Competition Agreement by the Group;
- monitoring entrusted loan arrangements entered into by the Group (whether as borrower or lender);
- monitoring and approving any lending by the Group to third parties which are not subsidiaries or associated companies of the Company;
- reviewing and monitoring the measures the Group has put in place in respect of the legal representatives of all its PRC-incorporated subsidiaries;
- reviewing the adequacy of and approving procedures put in place related to the Group's policy for entering into any future hedging transactions; and
- undertaking generally such other functions and duties as may be required by law or the Listing Manual, and by amendments made thereto from time to time.

The ARMC is scheduled to meet at least four times a year, but due to the intervening time between Mr. Tan Huay Lim and Mr. Hee Theng Fong ceasing to be chairman and a member of the ARMC on 25 April 2022 and the appointment of Dr. Kan Yaw Kiong (Ernest) as ARMC chairman and Prof. Ni Mingjiang as a member of the ARMC on 22 July 2022, only three meetings of the ARMC were held during FY2022. During FY2022, the ARMC reviewed the quarterly, half-yearly and annual financial statements and announcements (save for the first quarter financial statements and announcement which was reviewed by the Board without the assistance of a functioning ARMC, which comprised only Mr. Ang Swee Tian at the material time due to the aforementioned time lapse), the financial reporting and compliance procedures, the report of the internal auditor on the Company's internal controls, and the re-appointment of the external auditors. It held informal meetings and discussions with management from time to time. The ARMC meets with the external and internal auditors without the presence of management at least once a year and holds discussions as and when necessary.



Based on the ARMC and the Board evaluation checklists completed by the ARMC and the Directors respectively, the ARMC believes that it has fulfilled its responsibilities and discharged its duties as set out in its terms of reference. The Joint Company Secretaries maintain records of all ARMC meetings and these checklists. For more information on these checklists, please refer to Principle 5 of this Corporate Governance Report.

## **External Auditors**

The ARMC undertook a review of the independence of PwC and gave careful consideration to the Group's relationship with PwC for FY2022. In determining the independence, the ARMC reviewed the Group's relationship with PwC and considered the nature and fees of non-audit services supplied by PwC. The ARMC is of the opinion that the nature and amount of such non-audit services did not impair PwC's position as an independent external auditor. Based on the review, the ARMC is of the opinion that PwC is, and is perceived to be, independent for the purpose of the Group's statutory financial audit.

During the year under review, the Company has paid an aggregate of approximately RMB4,260,000 to the external auditor for its audit services. There were no non-audit fees paid to the external auditor.

In reviewing the nomination of PwC for re-appointment in respect of the financial year ending 31 December 2023, the ARMC has considered the adequacy of the resources, experience and competence of PwC. The consideration includes the experience of the audit partner and key team members in handling the audit of the Group in different jurisdictions. The audit fees, the size and complexity of the audit of the Group as well as the number and experience of the supervisory and professional staff assigned to the Group were taken into account. The ARMC had also considered the audit team's ability to work in a co-operative manner with management while maintaining integrity and objectivity.

PwC has confirmed that they are registered with the Accounting and Corporate Regulatory Authority. The Company is therefore in compliance with Rule 712 and Rule 715 (read together with Rule 716) of the SGX-ST Listing Manual in relation to the appointment of the Group's auditors.

On the basis of the above, the Board has accepted the ARMC's recommendation to nominate PwC for re-appointment as external auditors of the Company at the forthcoming AGM.

## **ARMC's Commentary on Significant Financial Reporting Matters**

The ARMC considered the following financial reporting matters as significant based on their potential impact on the Group's results, or based on the level of complexity, judgement, or estimation involved in their application.

#### **Going Concern Basis of Preparation of Financial Statements**

The application of the going concern basis for the preparation of the financial statements requires the Directors to consider whether the Group can meet its payment obligations as and when they fall due in the foreseeable future. The ARMC conducted an assessment as part of its supporting role given the inherent judgements required to be made in relation to the review of the cashflow forecast and compliance with debt financial covenants.

As of 31 December 2022, the current liabilities of the Group and of the Company exceeded the current assets by approximately RMB2,043,381,000 and RMB2,605,422,000 respectively. This is mainly due to borrowings due for repayment within the next 12 months and the reclassification of non-current borrowings of approximately RMB147,955,000 from the Group to current borrowings as at 31 December 2022, owing to non-compliance of a Financial Covenant (as explained in Note 28 to the financial statements) and the consequential cross default in relation to other borrowings.



Notwithstanding the above, the Board believes that the Company and the Group will be able to continue as a going concern, and have prepared the financial statements on a going concern basis, after considering the following:

- (A) the lenders of the borrowings have not called on the repayment of the borrowings mentioned above;
- (B) the Group's ability to finalise and obtain additional financing subsequent to 31 December 2022 including;
  - (i) additional credit facilities from financial institutions; and
  - (ii) as at the date of Company's announcement of the results for the full year ended 31 December 2022, new short-term borrowings of RMB180,000,000 were obtained.
- (C) the Group has continued to generate profits in the full year ended 31 December 2022 and has been able to generate positive cash flows from its operations;
- (D) as at the date of Company's announcement of the results for the full year ended 31 December 2022, the Group has RMB3,860 million of undrawn credit facilities;
- (E) the Company had on 23 December 2022 received a no-objection letter from Shenzhen Stock Exchange ("SZSE") for the establishment of an asset-backed securities ("ABS") scheme under which up to RMB1 billion in aggregate principal amount of ABS will be issued. The Company intends to submit the application for the listing of the ABS to the SZSE within 12 months from the date of the no-objection letter, the proceeds from the issuance of the ABS will be mainly used for the repayment of the current borrowings, enhance working capital and others, and will help optimize the Group's financing structure;
- (F) the Group has continued to receive financial support, credit support and loans from its largest controlling shareholder, Zhejiang Provincial Energy Group Co., Ltd. ("**Zheneng Group**"), as follows:
  - (i) as of 31 December 2022, the Group has obtained and re-financed working capital loan of RMB540 million (drawn down from the credit line of RMB900 million obtained from Zhejiang Provincial Energy Group Finance Co., Ltd., as announced by the Company on 24 May 2021 and 17 May 2022), from Zheneng Group. RMB540 million has been included in current liabilities as at 31 December 2022;
  - (ii) the credit assessment and credit approval process of the Group's bankers generally involves the relevant banks assessing the Group's credit based on their credit assessment of Zheneng Group, and the relevant banks would typically earmark credit lines to be extended to the Group out of the overall credit lines and limits extended to Zheneng Group; and
  - (iii) Management will continue to actively seek an even greater degree of support from Zheneng Group, which is a state-owned provincial energy enterprise with great financial strength and good credit standing that can enhance the stability of the Group's capital structure. This will help to improve broadening the Group's financing channels and reduce financing costs in relation to the Group's future fund-raising plans, so as to strengthen the working capital position and the relevant financial ratios of the Group.
- (G) Management has reviewed the Group's cash flow projection, which covers a period of at least twelve months from 31 December 2022, and are of the opinion that, taking into account the above-mentioned plans and measures, the Group will have sufficient funds to finance its operations and to meet its financial obligations as and when they fall due within twelve months from 31 December 2022.



The ARMC had the discussions with the external auditors on their audit procedures to test the cashflow forecast. The ARMC also noted the assessment of the ability of the Company and the Group to continue as a going concern by the external auditors and the relevant disclosures made in Note 2.2 to the financial statements.

In view of the foregoing, the ARMC is of the view that the Group is a going concern and the financial statements of the Company and the Group have been drawn up on this basis.

## Recognition of revenue from construction services provided under service concession arrangements

The recognition of revenue from Build-Operate-Transfer ("**BOT**") service concession agreements with the local government for the construction of waste-to-energy ("**WTE**") plants which are within the scope of International Financial Reporting Interpretations Committee 12 Service Concession Arrangements requires a significant degree of management judgement and estimates of the projected construction costs and the gross profit margin. The construction revenue is accounted by reference to the fair value of the construction services delivered in the construction phase in accordance with International Financial Reporting Standard 15 Revenue from Contracts with Customer. The fair value of such services is estimated on a cost-plus basis with reference to the prevailing market rate of gross margin at the date of the agreement applicable to similar construction services rendered. In addition, the determination of the fair values of the consideration receivables and allocation of the consideration between service concession receivables and intangible assets involve the forecasting and discounting of future cash flows.

Based on the discussion with the management and the external auditors in conjunction with the annual audit, the ARMC is satisfied that the revenue has been appropriately recognized in accordance with the Group's accounting policies and the gross profit margin is within a reasonable range of market rates applicable to construction services rendered by comparable companies.

## Impairment of Property, Plant and Equipment

The ARMC considered the appropriateness of the methodology and processes applied by the management to review for indicators of impairment of property, plant and equipment ("**Assets**"). In addition, if required, the ARMC will hold discussion with the management and review the reasonableness of the key assumptions and the significant judgement made by the management in determining the recoverable amount of the Assets or the amount of impairment losses required to be recorded.

As at 31 December 2022, the carrying value of the Group's Assets amounted to RMB10,402 million, accounting for 48% of the Group's total assets. These assets are predominantly made up of buildings which the Group's WTE plants operate in and the plant and machinery used in the day-to-day business. The Group has carried out impairment assessment on Assets' carrying amounts to identify whether there are indicators for impairment. Where there are indicators of impairment, management assess the recoverable amount based on the higher of value in use and fair value less costs to sell.

As disclosed in the Company's announcement on the results for the full year ended 31 December 2022, the Group is continuing to follow up on the progress of the compensation for the closure of the Old Kunming Wuhua WTE Facility in Kunming, Yunnan Province. The local government has engaged a third-party asset appraisal company to conduct an overall appraisal of the assets of the Old Kunming Wuhua WTE Facility. The Group is still in negotiation with the local government on the compensation for the closure of the Old Kunming Wuhua WTE Facility, and the compensation agreement is currently expected to be signed by the end of 2023.



In 2022, for certain WTE plants with impairment indicators, management performed assessment on impairment of the assets at cash generating unit level. Based on the impairment assessment carried out by management, no impairment loss was recorded.

In view of the foregoing, no additional impairment charge has been recognized in the statement of profit and loss.

## **Interested Person Transactions**

On 20 July 2016, the Company obtained shareholders' approval for the Company, its subsidiaries and its associated companies not listed on the SGX-ST or an approved exchange, over which the Company, its subsidiaries and/or interested persons have control, to enter into transactions within the categories of Interested Person Transactions ("**IPTs**") set out in the Company's prospectus dated 25 July 2016, with such persons within the class or classes of Interested Persons as described in the said prospectus, provided that such transactions are entered into in accordance with the review procedures set out in the said prospectus (the "**IPT Mandate**"). At the extraordinary general meeting of the Company ("**EGM**") held on 30 April 2018, shareholders had approved certain modifications to the IPT Mandate. At the EGMs held on 31 December 2018 and on 25 November 2019, shareholders had approved certain further modifications to the IPT Mandate. As such, Interested Persons Transactions may occur at any time, and to allow the Group to undertake such transactions in an expeditious manner, shareholders' approval will be sought at the forthcoming AGM for the renewal of the IPT Mandate.

The ARMC has confirmed that an independent financial advisor's opinion is not required for the renewal of the IPT Mandate as the methods and procedures for determining the transaction prices of the IPTs conducted under the IPT Mandate have not changed since the IPT Mandate was last approved by shareholders, and such methods and procedures continue to be sufficient to ensure that these IPTs will be carried out on normal commercial terms and will not be prejudicial to the interests of the Company and its minority shareholders.



The following table summarises the IPTs to be disclosed under Rule 907 of the SGX-ST Listing Manual:

Name of interested person	Nature of Relationship	Aggregate value of all interested person transactions during the financial period under review (excluding transactions less than \$\$100,000 and transactions conducted under shareholders' mandate pursuant to Rule 920) RMB'000	Aggregate value of all interested person transactions conducted under shareholders' mandate pursuant to Rule 920 (excluding transactions less than S\$100,000) RMB'000
Energy management contracting services provided to:			
Cayman Shanxian Energy Comprehensive Utilisation Co., Ltd.	Associate of Mr. Dou Zhenggang, a controlling shareholder of the Company (" <b>Mr. Dou</b> ")	_	3,037
Jilin Shuangjia Environmental Protection Energy Utilization Co., Ltd.*	Associate of Mr. Dou	_	1,315
Purchases of materials from:			
Hangzhou Jinjiang Group Environment Technology Co., Ltd.	Associate of Mr. Dou	-	2,800
Zhejiang Petroleum Integrated Energy Sales Co., Ltd	Associate of Zheneng Group	-	6,008
Zhejiang Zheneng Oil New Energy Co., Ltd.	Associate of Zheneng Group	-	3,269
Purchases of coal from:			
Zhejiang Zheneng Fuxing Fuel Co., Ltd.	Associate of Zheneng Group	_	63,137
Hangzhou Huawang Shiye Group Co., Ltd.	Associate of Mr. Dou	_	12,608
Purchase of equipment from:			
Zhejiang Zheneng Hicom Technology Co., Ltd.	Associate of Zheneng Group	2,540	_



Name of interested person	Nature of Relationship	Aggregate value of all interested person transactions during the financial period under review (excluding transactions less than \$\$100,000 and transactions conducted under shareholders' mandate pursuant to Rule 920) RMB'000	Aggregate value of all interested person transactions conducted under shareholders' mandate pursuant to Rule 920 (excluding transactions less than S\$100,000) RMB'000
Interest expenses to:			
Zhejiang Provincial Energy Group Finance Co., Ltd.	Associate of Zheneng Group	22,680	_
Rental income from:			
Cayman Shanxian Energy Comprehensive Utilisation Co., Ltd.	Associate of Mr. Dou	2,987	-
Operations and maintenance services to:			
Hangzhou Jinjiang Group Environment Technology Co., Ltd.	Associate of Mr. Dou	-	499
WTE project consulting services:			
Hangzhou Deyi Investment Management Co., Ltd.	Associate of Mr. Dou	3,600	_
Total		31,807	92,673

Due to subsequent changes in shareholding, Jilin Shuangjia Environmental Protection Energy Utilization Co., Ltd. has ceased to be an associate of Mr. Dou since 31 March 2022.

**Note:** For purchases of coal, the framework agreement signed between the parties only indicates the unit price of coal and the value of each transaction is determined only when orders are placed. For energy management contracting services, the aggregate value of each project can be determined only after the service has been provided and the Group's share of the energy savings for that particular project has been computed. Accordingly, for these categories of transactions, disclosure of the aggregate value is based on the actual amount incurred for the period.



#### **Material Contracts**

Apart from those transactions disclosed as IPTs above, there were no material contracts entered into by the Company or any of its subsidiaries involving the interest of the CEO, any Director or controlling shareholder during the financial year under review.

#### Whistle-Blowing Policy

The Company has in place a whistle-blowing policy which sets out the procedures for staff of the Group or any other persons to, in confidence, make a report to the Company on misconduct or wrongdoing relating to the Company and its officers. A whistle-blower may submit a report to the Company's designated internal audit personnel either directly or through the Company's Official WeChat Account on an anonymous basis. The contact details of the designated internal audit personnel, the whistle-blowing policy and its procedures are clearly communicated and are made available to employees in order to facilitate and encourage reporting, investigation and resolution of such matters.

The designated internal audit personnel will then promptly and independently investigate whistle-blowing reports made in good faith and report the findings of the investigation to the ARMC, which will then recommend appropriate follow up actions to be taken. If required, the ARMC may engage professional advisors at the Group's expense to assist in any investigation. The investigation team keeps the identity of the whistle-blower and contents of the report strictly confidential and will not disclose the identity of the whistle-blower except as required by law or regulatory authorities. The Company is committed to ensure protection of the whistle-blower against detrimental or unfair treatment. No adverse action will be taken against any Director, officer, employee or other individual for making a whistle-blowing report in good faith under the Company's whistle-blowing policy. Where a whistle-blower. The ARMC is responsible for overseeing the implementation of the whistle-blowing policy and its terms of reference include the oversight and monitoring of whistle-blowing.

#### **Dealings in Securities**

The Company has adopted a code of conduct for dealing in securities which sets out the implications of insider trading and provides guidance and internal regulation with regards to dealings in the Company's securities by Directors and officers.

Specifically, the code of conduct has procedures in place prohibiting dealings in the Company's shares by its Directors and officers while (a) in possession of unpublished material price sensitive information, (b) (if the Company announces its quarterly financial statements) during the periods commencing two weeks preceding the announcement date of the Company's quarterly results and one month preceding the announcement date of the Company's full year results and ending one full trading day following such announcements, and (c) (if the Company does not announce its quarterly financial statements) during the period commencing one month preceding the announcement date of the Company's half year and full year financial results and ending one full trading day following such announce full trading day following such announcement gate following such announcement. Internal memorandums are regularly sent to remind Directors and officers on the period where dealings are prohibited. Directors and officers are also expected to observe insider trading laws at all times, even when dealing in securities within the permitted trading period. An officer should not deal in the Company's shares on short-term considerations.

## **Internal Audit and Internal Controls**

The objective of an internal audit is to assist the Board to evaluate the reliability, adequacy and effectiveness of the internal controls and risk management processes of the Group. The internal audit reviews and tests the controls in areas of key risks identified.

The internal audit function is independent of the activities it audits. The Board has engaged KPMG Huazhen LLP ("**KPMG**") as the Company's internal auditor. KPMG's primary reporting line is to the ARMC Chairman. The ARMC reviews and approves the appointment, termination, and remuneration of the head of the internal audit function. The ARMC meets with KPMG at least once annually without the presence of management. KPMG has unfettered access to all the Company's documents, records, properties and personnel, including access to the ARMC and management, and has appropriate standing within the Company.

KPMG's directors are members of the Institute of Internal Auditors as well as the Chinese Institute of Certified Public Accountants. The experience, qualifications and size of the engagement team members are also evaluated before assigning to audit the Group. The firm carried out its internal audit according to the standards set by the Institute of Internal Auditors. The ARMC reviews and approves the internal audit plan and reviews the reports from KPMG for its adequacy and effectiveness, at least on an annual basis, and is of the view that the Group's internal audit function is independent, effective and adequately resourced. The internal audit is conducted two to three times yearly, including audits at the corporate headquarters of the Group and a selected operating facility of the Group, as well as audits in respect of IPTs. Copies of the internal audit reports are provided to management and the external auditors. Processes are in place such that recommendations raised are followed up to ensure that they are implemented where possible, within a reasonable time frame, taking into account the severity and nature of the control weaknesses identified.

## Shareholders Rights and Engagement

## Principle 11: Shareholder Rights and Conduct of General Meetings

The Company treats all shareholders fairly and equitably in order to enable them to exercise shareholders' rights and have the opportunity to communicate their views on matters affecting the Company. The Company gives shareholders a balanced and understandable assessment of its performance, position and prospects. The Company facilitates the exercise of shareholders' rights by ensuring that all material and financial information relating to the Group is disclosed in an accurate and timely manner via SGXNET.

The Board provided shareholders with first quarter, half-yearly, third quarter and annual financial results in relation to FY2022. Results for the first, second and third quarter (where the Company announces its quarterly results) and the half-year (where the Company does not announce its quarterly results) are released to shareholders within 45 days of the end of each quarter and the annual results are released within 60 days from the financial year end. In presenting the Group's quarterly and annual results, the Board aims to provide shareholders with a balanced and understandable assessment of the Group's performance and financial position with a commentary at the date of the announcement of the significant trends and competitive conditions of the industry in which it operates.

General meetings of the Company are one of the principal forums for dialogue with shareholders. At general meetings, shareholders are given the opportunity to communicate their views and to ask the Directors questions on the various matters affecting the Company. All Directors are usually present and available at general meetings to address any queries. The external auditors are present at general meetings to assist the Directors in answering questions from shareholders as well as attending to queries on the conduct of audit and the preparation and content of the auditors' report. All Directors were present at all such general meetings of the Company held during FY2022. The Directors' attendance at the general meetings of the Company held in 2022 is disclosed under principle 1 above.



Due to the various control and safe distancing measures put in place in Singapore to prevent the spread of COVID-19 and notwithstanding the place in which the AGMs for the financial years ended 31 December 2019, 31 December 2020 and 31 December 2021 which were held on 24 June 2020 ("**FY2019 AGM**"), 26 April 2021 ("**FY2020 AGM**") and 25 April 2022 ("**FY2021 AGM**") respectively, other than in respect of the Chairman, Directors and/or representatives of the Company present at such location, the FY2019 AGM, the FY2020 AGM and FY2021 AGM were convened and held, by way of electronic means pursuant to the Additional Guidance on the Conduct of General Meetings During Elevated Safe Distancing Period and checklist jointly issued by the Accounting and Corporate Regulatory Authority, the Monetary Authority of Singapore and Singapore Exchange Regulation ("Checklist"), which is based on the COVID-19 (Temporary Measures) (Alternative Arrangements for Meetings for Companies, Variable Capital Companies, Business Trusts, Unit Trusts and Debenture Holders) Order 2020 (as amended) ("Alternative Arrangements Order").

Printed copies of the Notice of AGM and the proxy forms for the FY2019 AGM, the FY2020 AGM, the FY2021 AGM and the forthcoming FY2022 AGM were not and will not be sent to members. Instead, the Notice of AGM and the proxy forms for the FY2019 AGM, the FY2020 AGM, the FY2021 AGM and the forthcoming FY2022 AGM were sent and will be sent to members by electronic means via publication on the Company's website at <a href="http://en.znjjhj.com/info.html">http://en.znjjhj.com/info.html</a> and the SGXNet.

The Company provides for separate resolutions at general meetings on each substantially separate issue unless the issues are interdependent and linked so as to form one significant proposal. Where the resolutions are "bundled", the Company will explain the reasons and material implications in the notice of the general meeting. Detailed information on each item in the agenda for the general meeting is provided in the explanatory notes to the Notice of meeting.

The Company prepares minutes of general meetings, which record substantial comments and queries from shareholders relating to the agenda of such meetings and are published on its corporate website and SGXNET together with presentation slides. The Board believes that consistent with the intent of principle 11 of the Code, the Company treats all shareholders fairly and equitably in order to enable them to exercise shareholders' rights and have the opportunity to communicate their views on matters affecting the Company, and has given shareholders a balanced and understandable assessment of its performance, position and prospects.

Shareholders are encouraged to attend the Company's general meetings where the respective Chairmen of the Board and the Board Committees are in attendance to engage shareholders in dialogue and to address their queries.

All shareholders are given the opportunity to participate effectively in and to vote at general meetings in person or by proxy. The rules including the voting procedures are set out in the notice of the general meetings. Shareholders may appoint one or two proxies each to participate in and vote at general meetings in their absence. "Relevant intermediaries" such as banks, capital markets services licence holders which provide custodial services for securities and the Central Provident Fund Board, are allowed to appoint more than two proxies to participate in and vote at general meetings. The proxy forms must be deposited with the Company's share registrar not less than seventy-two hours before the time set for the general meetings. However, the Company's Memorandum and Articles of Association do not permit voting in absentia by mail, facsimile or e-mail as such voting methods would need to be cautiously evaluated to ensure that the authenticity of the vote and shareholders' identities are not compromised.



For the FY2019 AGM, the FY2020 AGM and the FY2021 AGM, the Company had put in place arrangements for shareholders to participate in the meeting by submitting questions ahead of the meeting, voting by proxy and/or watching or listening to the proceedings via a "live" webcast pursuant to the Checklist. The questions could be submitted (i) via the pre-registration website; (ii) by email to an electronic mail address; (iii) and by post to the registered office address of the Company's Share Transfer Agent, no later than 72 hours before the FY2019 AGM, the FY2020 AGM and the FY2021 AGM. The proxy forms, if submitted (i) by post, were to be lodged at the registered office of the Company's Share Transfer Agent, no later than 72 hours before the FY2021 AGM. At the FY2019 AGM, the FY2020 AGM and the FY2021 AGM. At the FY2019 AGM, the FY2020 AGM and the FY2020 AGM and the FY2021 AGM and the FY2021 AGM, the Company also addressed the questions which were submitted by shareholders prior to the submission deadline.

The Company had informed the shareholders of such alternative arrangements and the details relating thereto ahead of the FY2019 AGM, the FY2020 AGM and the FY2021 AGM in its Notice of AGM and Proxy Forms released by the Company on SGXNet and its corporate website.

The Company will be conducting its forthcoming FY2022 AGM via electronic means in accordance with the Checklist which was updated on 27 April 2020, 22 June 2020, 1 October 2020 and 4 February 2022 and the Alternative Arrangements Order (which will remain in effect until 30 June 2023) read together with the Regulator's Column: Live Engagement and Voting Expected at all AGMs for FYs Ending 30 June 2022 or After issued by Singapore Exchange Regulation on 23 May 2022.

For the forthcoming FY2022 AGM, the Company will be utilising real-time remote electronic voting and real-time electronic communication. Shareholders will be able to participate at the FY2022 AGM by (a) observing and/or listening to the FY2022 AGM proceedings via "live" audio-and-video webcast or "live" audio-only feed; (b) submitting questions to the Chairman of the FY2022 AGM in advance of or "live" at the FY2022 AGM; and/or (c) voting at the FY2022 AGM "live" by the shareholders themselves or their duly appointed proxy/proxies (other than the Chairman of the FY2022 AGM) via electronic means or appointing the Chairman of the FY2022 AGM as proxy to vote on their behalf at the FY2022 AGM.

All resolutions tabled by the Company at a general meeting are put to the vote by poll pursuant to Rule 730A(2) of the SGX-ST Listing Manual. Where physical meetings are held, poll voting is typically conducted "live" during such meeting. Even when meetings are conducted by electronic means (such as the FY2019 AGM, the FY2020 AGM, the FY2021 AGM and the forthcoming FY2022 AGM), the resolutions tabled by the Company at such meetings are still voted on by poll. For the FY2019 AGM, the FY2022 AGM and the FY2021 AGM, the chairman of the meeting, acting as proxy, cast the votes in accordance with the instructions specified by shareholders in their respective proxy forms in accordance with the requirements under the Alternative Arrangements Order (as defined below). For the forthcoming FY2022 AGM, "live" voting by poll of the shareholders or their appointed proxies will be conducted. Voting by poll allows for an equitable and transparent voting process. Shareholders will be better able to demonstrate their concerns in a manner more accurately reflective of their shareholdings. Independent scrutineers are appointed to conduct the voting process. The results of the general meetings are announced via SGXNet after the general meetings.

The Company currently does not have a fixed dividend policy. When making recommendations on the timing, amount and form of future dividends, if any, the Board will consider, among other things, the Group's results of operations and cash flow, expected financial performance and working capital needs, future prospects, capital expenditures and other investment plans, other investment and growth plans and the general economic and business conditions and other factors deemed relevant by the Board and statutory or contractual restrictions on the payment of dividends. For FY2022, no dividend has been recommended as the Group is in the process of investing in its pipeline of new and expansion projects in China with a view of achieving sustainable and long-term growth of its business. These projects require considerable financial resources and the Group's priority is to manage its cash flow prudently and responsibly so as to ensure that its financial commitments are met.



## Principle 12: Engagement with Shareholders

The Company ensures that timely and accurate material information are given to shareholders and investors so that they will be apprised of developments that may have a material impact on the Company. The financial statements and other presentation materials are presented at the Company's general meetings. Material and price-sensitive information are disseminated and publicly released via the SGXNET and the Company's website on a timely basis. The notice of AGM is advertised in the press and the annual report and the notice of AGM are released via SGXNET and the Company's website.

The Company is open to meetings with shareholders, investors, media and analysts, and in conducting such meetings, the Company is mindful of the need to ensure fair disclosure to all shareholders. The Company seeks to solicit and understand the views of shareholders through analyst briefings that coincide with the release of financial results, meeting local and foreign fund managers in investor roadshows and conferences and dialogues with shareholders in general meetings. The Company has in place an investor relations programme which allows for an ongoing exchange of views so as to actively engage and promote regular, effective and fair communication with shareholders. The investor relations programme sets out the mechanisms through which shareholders may contact the Company with questions and through which the Company may respond to such questions.

#### **Managing Stakeholders Relationships**

#### Principle 13: Engagement with Stakeholders

The Board adopts an inclusive approach by considering and balancing the needs and interests of material stakeholders, as part of its overall responsibility to ensure that the best interests of the Company are served. The Company has identified its stakeholders as those who are impacted by the Group's business and operations and those who are able to materially impact the Company's business and operations. Four stakeholder groups have been identified following an assessment of their significance to the Group's business operations. The Group's stakeholders are, namely, investors, employees, the local community and regulators.

In FY2022, the Group has reported its sustainability performance in accordance with the requirements of Rules 711A and 711B of the Listing Manual of the Singapore Exchange Securities Trading Limited, prepared with reference to the Global Reporting Initiative (GRI) Standards and has aligned its climate-related disclosures with the Task Force on Climate-related Financial Disclosures (TCFD) in the four key areas of governance, strategy, risk management and metrics and targets. The Company has undertaken a materiality assessment to determine six material environmental, social and governance (ESG) factors which are important to these stakeholders and are the Company's sustainability priorities. These issues form the materiality matrix upon which targets, performance and progress are reviewed and endorsed by the Board annually. Underpinned by the six material ESG factors, the Company focuses on four priority areas in sustainability, namely, economic performance, environmental services and impacts, workforce and corporate governance, to bring about positive value for its key stakeholders. Having identified its stakeholders and the material ESG factors, the Company has mapped out the key areas of focus in relation to the management of the respective stakeholder relationships. Please refer to the Sustainability Report on pages 41 to 92 of this Annual Report for further details.

The Company has made available its sustainability report in the annual report. Sustainability is essential to provide sustainable solutions and bring about positive values for our customers, investors, employees, the local community and regulators.

The Company's website can be found at <u>http://www.znjjhj.com/</u>, which remains updated and current and offers a platform to communicate and engage with stakeholders.

# Financial Contents

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For the financial year ended 31 December 2022

The directors present their statement to the members together with the audited consolidated financial statements of the Group for the financial year ended 31 December 2022 and the statement of financial position of the Company as at 31 December 2022 and the statement of changes in equity of the Company for the year then ended.

In the opinion of the directors, the statement of financial position and statement of changes in equity of the Company and the consolidated financial statements of the Group as set out on pages 140 to 226 are drawn up so as to give a true and fair view of the financial position of the Company and of the Group as at 31 December 2022, the financial performance, changes in equity and cash flows of the Group and the changes in equity of the Company for the financial year ended on that date.

## Directors

The directors of the Company in office at the date of this statement are as follows:

Wei Dongliang Wang Ruihong Ang Swee Tian Ni Mingjiang Kan Yaw Kiong (Ernest) (appointed on 22 July 2022)

## Arrangements to enable directors to acquire shares and debentures

Neither at the end of nor at any time during the financial year was the Company a party to any arrangement whose object was to enable the directors of the Company to acquire benefits by means of the acquisition of shares in, or debentures of, the Company or any other body corporate, other than as disclosed under "Share Options and Performance Shares" in this statement.

## Directors' interests in shares or debentures

(a) According to the register of directors' shareholdings, none of the directors holding office at the end of the financial year had any interest in the shares or debentures of the Company or its related corporations, except as follows:

	Holdings registered in name of director		Holdings in which director is deemed to have an interest			
	At	At At		At		At
	31.12.2022	1.1.2022	31.12.2022	1.1.2022		
Zheneng Jinjiang Environment Holding Company Limited						
(No. of ordinary shares)						
Wang Ruihong	2,100,000	2,100,000	-	_		
Ang Swee Tian	171,000	171,000	-	-		

(b) The directors' interest in the ordinary shares and convertible securities of the Company as at 21 January 2023 were the same as those as at 31 December 2022.



# Directors' Statement

For the financial year ended 31 December 2022

## Share Options and Performance Shares

The Company has adopted the Jinjiang Environment Performance Share Plan (the "Plan") which was approved by the shareholders on 29 June 2016 and was subsequently amended and approved by the shareholders at an Extraordinary General Meeting held on 25 April 2017. The Plan shall continue to be in force at the discretion of the Remuneration Committee, subject to a maximum period of ten years commencing from 29 June 2016.

At the date of this statement, the Remuneration Committee which administers the Plan comprises the following directors:

- (i) Ang Swee Tian (Chairman)
- (ii) Ni Mingjiang
- (iii) Kan Yaw Kiong (Ernest)

During the current financial year, there were no shares granted under the Plan. As at 31 December 2022, the Company has granted 23,394,700 shares under the Plan. All entitled employees are required to pay 30% of the closing market price of the shares awarded to them on the date of grant in cash as a condition for the vesting of the share awards. These shares were granted without a vesting period but will be subject to a moratorium on trading of 12 months from the date of issuance and allotment.

The Plan is a performance incentive scheme which will form an integral part of the Group's incentive compensation program. The purpose of the Plan is to provide eligible participants with an opportunity to participate in the equity of the Company and to motivate them towards better performance through increased dedication and loyalty by issuing them with ordinary shares of the Company based on the merits of their performance. The number of shares available under the Plan shall not exceed 15% of the issued share capital of the Company.

(a) The information on directors of the Company participating in the Plan is as follows:

Name of directors	Granted in financial year ended 31.12.2022	Aggregate granted since commencement of scheme to 31.12.2022	Aggregate exercised since commencement of scheme to 31.12.2022	Aggregate outstanding as at 31.12.2022
Wang Ruihong	_	2,100,000	_	2,100,000

Save as disclosed above, there were no shares granted to directors or controlling shareholders of the Company, or associates of controlling shareholders of the Company, from the commencement of the Plan to the end of the financial year. In addition, no individual has been granted 5% or more of the total number of shares to be comprised in share awards available under the Plan, from the commencement of the Plan to the end of the financial year.

## (b) Options to take up unissued shares

During the financial year, no options to take up unissued shares of the Company or any corporation in the Group were granted.



Directors' Statement

For the financial year ended 31 December 2022

#### Share Options and Performance Shares (Continued)

(c) Options exercised

During the financial year, there were no shares of the Company or any corporation in the Group issued by virtue of the exercise of an option to take up unissued shares.

(d) Unissued shares under options

At the end of the financial year, there were no unissued shares of the Company or any corporation in the Group under options.

#### Audit and Risk Management Committee

The members of the Audit and Risk Management Committee at the end of the financial year were as follows:

Kan Yaw Kiong (Ernest) (Chairman) Ang Swee Tian Ni Mingjiang

All members of the Audit and Risk Management Committee were non-executive directors.

The Audit and Risk Management Committee has reviewed the following:

- the internal and external auditors' audit plans and results of their examination and evaluation of the Group's systems of internal accounting controls;
- the Group's financial and operating results and accounting policies;
- the Group's key financial risk areas and risk management structure;
- the statement of financial position and statement of changes in equity of the Company and the consolidated financial statements of the Group before their submission to the directors of the Company and external auditor's report on those financial statements;
- the quarterly and annual announcements on the results and financial position of the Company and the Group;
- the interested person transactions as defined under Chapter 9 of the SGX-ST Listing Manual;
- the scope, approach and results of the audit and its cost effectiveness, and the independence and objectivity of the external auditor;
- the co-operation and assistance given by the management to the Group's internal and external auditors; and
- the re-appointment of the external auditors of the Group.



# Directors' Statement

For the financial year ended 31 December 2022

## Audit and Risk Management Committee (Continued)

The Audit and Risk Management Committee has full access to and has the co-operation of the management and has been given the resources required to discharge its function properly. It also has full discretion to invite any director and executive officer to attend its meetings. The external and internal auditors have unrestricted access to the Audit and Risk Management Committee.

The Group has complied with Rules 712 and 715 read together with Rule 716 of the Listing Manual issued by Singapore Exchange Securities Trading Limited in relation to its auditors.

The Audit and Risk Management Committee has recommended to the Board that the independent auditor, PricewaterhouseCoopers LLP, be nominated for re-appointment at the forthcoming Annual General Meeting of the Company.

## **Independent Auditor**

The independent auditor, PricewaterhouseCoopers LLP, has expressed its willingness to accept re-appointment.

On behalf of the directors

Wei Dongliang Director Wang Ruihong Director

6 April 2023



To the Members of Zheneng Jinjiang Environment Holding Company Limited

## **Our Opinion**

In our opinion, the accompanying consolidated financial statements of Zheneng Jinjiang Environment Holding Company Limited ("the Company") and its subsidiaries ("the Group") and the statement of financial position and statement of changes in equity of the Company present fairly, in all material respects, the consolidated financial position of the Group and the financial position of the Company as at 31 December 2022 and of the consolidated financial performance, consolidated changes in equity and consolidated cash flows of the Group and of the changes in equity of the Company for the financial year then ended in accordance with the International Financial Reporting Standards ("IFRSs").

## What we have audited

The financial statements of the Company and the Group comprise:

- the consolidated statement of comprehensive income of the Group for the year ended 31 December 2022;
- the consolidated statement of financial position of the Group as at 31 December 2022;
- the statement of financial position of the Company as at 31 December 2022;
- the consolidated statement of changes in equity of the Group and the statement of changes in equity of the Company for the year then ended;
- the consolidated statement of cash flows of the Group for the year then ended; and
- the notes to the financial statements, including a summary of significant accounting policies.

## **Basis for Opinion**

We conducted our audit in accordance with International Standards on Auditing ("ISAs"). Our responsibilities under those standards are further described in the *Auditor's Responsibilities for the Audit of the Financial Statements* section of our report.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

## Independence

We are independent of the Group in accordance with the Accounting and Corporate Regulatory Authority Code of Professional Conduct and Ethics for Public Accountants and Accounting Entities ("ACRA Code") together with the ethical requirements that are relevant to our audit of the financial statements in Singapore, and we have fulfilled our other ethical responsibilities in accordance with these requirements and the ACRA Code.

## **Our Audit Approach**

As part of designing our audit, we determined materiality and assessed the risks of material misstatement in the accompanying financial statements. In particular, we considered where management made subjective judgements; for example, in respect of significant accounting estimates that involved making assumptions and considering future events that are inherently uncertain. As in all of our audits, we also addressed the risk of management override of internal controls, including among other matters consideration of whether there was evidence of bias that represented a risk of material misstatement due to fraud.

To the Members of Zheneng Jinjiang Environment Holding Company Limited

## **Our Audit Approach (Continued)**

#### Key Audit Matters

Key audit matters are those matters that, in our professional judgement, were of most significance in our audit of the financial statements for the financial year ended 31 December 2022. These matters were addressed in the context of our audit of the financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

#### **Key Audit Matter**

## Recognition of revenue from construction services provided under service concession arrangements (the "construction services revenue")

(Refer to Notes 2.3, 2.14, 3.1(a), 3.2(a), and 4 to the consolidated financial statements.)

The Group entered into certain service concession arrangements (such as "Build-Operate-Transfer" arrangements ("BOT arrangements")) in respect of its waste-to-energy ("WTE") plants with local government authorities ("Grantors") in the People's Republic of China ("PRC").

BOT arrangements are assessed to be under the scope of IFRS Interpretations Committee ("IFRIC") 12 "Service Concession Arrangements", and the Group accounted for their construction revenue by reference to the fair value of the construction services delivered in the construction phase. The fair value of such services is estimated on a cost-plus basis with reference to the prevailing market rate of gross margin at the date of the agreement applicable to similar construction services rendered.

The construction services revenue recognized for the year ended 31 December 2022 amounted to approximately RMB594 million, representing approximately 15% of the Group's total revenue.

We focused on auditing the revenue from construction services under BOT arrangements because it can be materially affected by the assumptions and estimates used (i.e. the estimates on projected construction costs and the gross margin). The inherent risk is considered significant due to subjectivity of these assumptions and estimates.

#### How our audit addressed the Key Audit Matter

Our audit procedures in relation to the recognition of construction services revenue included:

- Understood and evaluated the management's policies, key controls and processes in allocation of the considerations for the construction of the WTE plants among the different services as provided by the Group under BOT arrangements and assessed the inherent risk of material misstatement by considering the degree of estimation uncertainty and the level of other inherent risk factors such as subjectivity of the key assumptions and estimates applied;
- Assessed the reasonableness of the key assumptions and estimates as applied by management in determining the amounts of construction services revenue by:
  - Comparing the projected construction costs as applied by management against the total budget costs as approved by management and inspected the relevant signed construction contracts;
  - Comparing the estimated gross margins as applied by management against those of the comparable companies in the construction industry.
- Tested the mathematical accuracy of the calculations of the amounts of construction services revenue recognised by the Group.

Based on our audit procedures, we found the key assumptions and estimates used by management in determining the recognition amount of construction services revenue to be supportable by the evidence obtained and procedures performed.



To the Members of Zheneng Jinjiang Environment Holding Company Limited

#### **Key Audit Matter**

#### Impairment of property, plant and equipment

(Refer to Notes 2.12, 3.1 (c) and 19 to the consolidated financial statements)

As at 31 December 2022, the carrying amounts of the Group's property, plant and equipment amounted to approximately RMB10,402 million, representing approximately 48% of the Group's total assets.

Property, plant and equipment are tested for impairment whenever there is an indication that these assets may be impaired. The Group regularly reviews whether there are any indications of impairment and recognizes an impairment loss if the carrying amount of an asset is higher than its recoverable amount (which is the higher of the fair value less costs of disposal and the value in use).

As at 31 December 2022, for certain WTE plants with impairment indicators, management performed assessment on impairment of the assets at cash generating unit ("CGU") level. Based on the assessment, the Group does not expect any impairment arising from these WTE plants. We focused on the impairment of property, plant and equipment due to the significant management's judgements, assumptions and estimates involved in the impairment assessment (including identification of the existence of impairment indicators). The inherent risk is considered significant due to the subjectivity of significant judgement and estimates used by management.

How our audit addressed the Key Audit Matter

Our audit procedures in relation to impairment assessment of property, plant and equipment included:

- Understood and evaluated the management's internal control and process in assessing the impairment of property, plant and equipment (including the identification of the existence of impairment indicators) and assessed the inherent risk of material misstatement by considering the degree of estimation uncertainty and the level of other inherent risk factors such as complexity, subjectivity, changes and susceptibility to management bias;
- Assessed the reasonableness of management's determination of CGU based on our knowledge of business including the use of assets and internal reporting process;
- Assessed the appropriateness of management's use of valuation methodology and its compliance with management's circumstances and relevant accounting standards;
- Assessed management's forecast and calculation of the CGU's value in use, including:
  - Assessing the reasonableness of revenue growth rate by comparing the historical operating results and future operation plans of the CGUs, taking into consideration of the economic and industry outlook;
  - Assessing the discount rate by referencing to market data, and risk factors of comparable companies and market premium;
  - Assessing the reasonableness of other key input data such as capital expenditure by comparing with the management budget and corroborating with industry information; and
  - Testing the mathematical accuracy of the discounted cash flows model.

Based on the audit procedures performed above, we found management's judgement and estimates in relation to the impairment assessment of property, plant and equipment to be supportable by the evidence obtained and procedures performed.



To the Members of Zheneng Jinjiang Environment Holding Company Limited

## **Other Information**

Management is responsible for the other information. The other information comprises all the sections of the annual report but does not include the financial statements and our auditor's report thereon.

Our opinion on the financial statements does not cover the other information and we do not express any form of assurance conclusion thereon.

In connection with our audit of the financial statements, our responsibility is to read the other information and, in doing so, consider whether the other information is materially inconsistent with the financial statements or our knowledge obtained in the audit, or otherwise appears to be materially misstated. If, based on the work we have performed, we conclude that there is a material misstatement of this other information, we are required to report that fact. We have nothing to report in this regard.

## Responsibilities of Management and Directors for the Financial Statements

Management is responsible for the preparation of financial statements that give a true and fair view in accordance with the IFRSs, and for devising and maintaining a system of internal accounting controls sufficient to provide a reasonable assurance that assets are safeguarded against loss from unauthorised use or disposition; and transactions are properly authorised and that they are recorded as necessary to permit the preparation of true and fair financial statements and to maintain accountability of assets.

In preparing the financial statements, management is responsible for assessing the Group's ability to continue as a going concern, disclosing, as applicable, matters related to going concern and using the going concern basis of accounting unless management either intends to liquidate the Group or to cease operations, or has no realistic alternative but to do so.

The directors' responsibilities include overseeing the Group's financial reporting process.

## Auditor's Responsibilities for the Audit of the Financial Statements

Our objectives are to obtain reasonable assurance about whether the financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with ISAs will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these financial statements.

As part of an audit in accordance with ISAs, we exercise professional judgement and maintain professional scepticism throughout the audit. We also:

• Identify and assess the risks of material misstatement of the financial statements, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinion. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control.



To the Members of Zheneng Jinjiang Environment Holding Company Limited

## Auditor's Responsibilities for the Audit of the Financial Statements (Continued)

- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Group's internal control.
- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by management.
- Conclude on the appropriateness of management's use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Group's ability to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in our auditor's report to the related disclosures in the financial statements or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our auditor's report. However, future events or conditions may cause the Group to cease to continue as a going concern.
- Evaluate the overall presentation, structure and content of the financial statements, including the disclosures, and whether the financial statements represent the underlying transactions and events in a manner that achieves fair presentation.
- Obtain sufficient appropriate audit evidence regarding the financial information of the entities or business activities within the Group to express an opinion on the consolidated financial statements. We are responsible for the direction, supervision and performance of the group audit. We remain solely responsible for our audit opinion.

We communicate with the directors regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identify during our audit.

We also provide the directors with a statement that we have complied with relevant ethical requirements regarding independence, and to communicate with them all relationships and other matters that may reasonably be thought to bear on our independence, and where applicable, related safeguards.

From the matters communicated with the directors, we determine those matters that were of most significance in the audit of the financial statements of the current period and are therefore the key audit matters. We describe these matters in our auditor's report unless law or regulation precludes public disclosure about the matter or when, in extremely rare circumstances, we determine that a matter should not be communicated in our report because the adverse consequences of doing so would reasonably be expected to outweigh the public interest benefits of such communication.

The engagement partner on the audit resulting in this independent auditor's report is Tham Tuck Seng.

PricewaterhouseCoopers LLP Public Accountants and Chartered Accountants Singapore, 6 April 2023



# **Consolidated Statement of Comprehensive Income**

For the financial year ended 31 December 2022

	Note	2022 RMB'000	2021 RMB'000
Revenue Cost of sales	4 5	4,073,855 (2,916,100)	(Restated)* 4,101,098 (3,054,992)
Gross profit		1,157,755	1,046,106
Other income - Interest - Others	7 7	22,862 172,135	11,702 132,523
Loss allowance recognised on financial assets	36(b)	(765)	(16,817)
Other gains and losses, net	8	(203,016)	41,167
Expenses - Administrative - Finance - Others	5 9 10	(248,122) (417,443) –	(233,372) (361,676) (30,273)
Share of loss of associates Share of profit/(loss) of joint ventures		(38) 2,891	(534) (11,931)
Profit before income tax		486,259	576,895
Income tax expense	11	(141,343)	(130,238)
Profit for the year		344,916	446,657
Other comprehensive loss:			
Item that may be reclassified subsequently to profit or loss: Currency translation differences arising from consolidation <b>Other comprehensive loss, net of tax</b>	31(iv)	(10,112) (10,112)	(11,172)
Total comprehensive income		334,804	435,485
<b>Profit attributable to:</b> Equity holders of the Company Non-controlling interests	15	325,022 19,894 344,916	432,456 14,201 446,657
Total comprehensive income attributable to:			
Equity holders of the Company Non-controlling interests	15	314,910 19,894	421,284 14,201
		334,804	435,485
Earnings per share attributable to the equity holders of the Company: (RMB cents per share)			
Basic and diluted earnings per share	12	22.35	29.74

\* refer to Note 2.1

The accompanying notes form an integral part of these financial statements.



# Statements of Financial Position

As at 31 December 2022

		Gro	oup	Company		
	Note	2022 RMB'000	2021 RMB'000 (Restated)*	2022 RMB'000	2021 RMB'000 (Restated)*	
ASSETS						
Current assets						
Cash and cash equivalents	10	627,047	387,801	11,623	15,722	
Pledged bank deposits Trade and other receivables	13 14	1,281,047 2,789,208	818,234 2,868,499	86,160 _	79,423	
Amounts due from related parties	16	248,674	718,976	658	2,258	
Service concession receivables	17	68,088	63,976	_		
Inventories	18	108,371	62,216	-	_	
Total current assets		5,122,435	4,919,702	98,441	97,403	
Non-current assets						
Other receivables	14	159,877	152,448	2,995,972	2,116,567	
Service concession receivables	17	743,373	736,432	-	_	
Property, plant and equipment	19	10,402,440	10,031,413	-	_	
Investments in associates	20	13,755	15,613	-	_ 	
Investments in joint ventures Investments in subsidiaries	21 22	295,115	204,765	5,039 1,798,280	5,039 1,798,280	
Investment property	23	27,013	24,875	1,790,200	1,790,200	
Intangible assets	26	4,708,883	4,289,074	_	_	
Total non-current assets		16,350,456	15,454,620	4,799,291	3,919,886	
Total assets		21,472,891	20,374,322	4,897,732	4,017,289	
<b>LIABILITIES</b> <b>Current liabilities</b> Trade and other payables Amounts due to related parties Borrowings and lease liabilities Income tax liabilities	27 16 28	2,094,340 37,405 4,903,709 130,362	2,160,424 55,680 4,711,448 123,057	761,330 _ 1,942,533 _	96,389 _ 2,014,633 _	
Total current liabilities		7,165,816	7,050,609	2,703,863	2,111,022	
Net current liabilities		(2,043,381)	(2,130,907)	(2,605,422)	(2,013,619)	
		(2,010,001)	(2,100,007)	(2,000,122)	(2,010,010)	
Non-current liabilities	07					
Trade and other payables	27 28	357,515	364,020	_ 370,313	_	
Borrowings and lease liabilities Deferred tax liabilities	20 29	6,344,903 701,525	5,777,427 618,953	370,313	_	
Provision for major overhauls	33	28,425	24,826	_	_	
Total non-current liabilities		7,432,368	6,785,226	370,313	_	
Total liabilities		14,598,184	13,835,835	3,074,176	2,111,022	
NET ASSETS		6,874,707	6,538,487	1,823,556	1,906,267	
EQUITY Capital and reserves attributable to equity holders of the Company						
Share capital	30	96	96	96	96	
Share premium		1,601,100	1,601,100	1,601,100	1,601,100	
Other reserves	31	548,817	515,890	1,057,112	1,057,112	
Retained profits/(accumulated losses)		4,561,996	4,280,013	(834,752)	(752,041)	
Non-controlling interests	15	6,712,009	6,397,099	1,823,556	1,906,267	
Total equity	10	<u> </u>	<u> </u>	1,823,556	1,906,267	
. eta. oquity		0,017,101	0,000,407	1,020,000	1,000,207	

\* refer to Note 2.1 and 37

The accompanying notes form an integral part of these financial statements.



# **Consolidated Statement of Changes in Equity**

For the financial year ended 31 December 2022

	- Attrik	outable to ec	Non-				
	Share capital (Note 30) RMB'000	Share premium RMB'000	Other reserves (Note 31) RMB'000	Retained profits RMB'000	Total RMB'000	controlling Interests (Note 15) RMB'000	Total equity RMB'000
Group 2022 Balance as previously reported at 1 January 2022 Adoption of amendments to	96	1,601,100	515,890	4,285,581	6,402,667	142,225	6,544,892
IAS 16* Balance as restated at 1 January 2022	- 96	- 1,601,100	- 515,890	(5,568) 4,280,013	(5,568) 6,397,099	(837) 141,388	(6,405) 6,538,487
Profit for the year Other comprehensive loss for the year	-	-	– (10,112)	325,022 -	325,022 (10,112)	19,894 _	344,916 (10,112)
Total comprehensive income for the year		_	(10,112)	325,022	314,910	19,894	334,804
Transactions with owners, recognised directly in equity Appropriation to reserves		_	43,039	(43,039)	_	_	_
Capital contribution from non-controlling interests Dividends paid to	-	-	-	-	-	5,735	5,735
non-controlling interests Balance as at 31 December 2022	96	- 1,601,100	548,817	4,561,996	6,712,009	(4,319) 162,698	(4,319) 6,874,707
2021 (Restated) Balance as at 1 January 2021 Profit for the year* Other comprehensive loss for the year	96 	1,601,100 _ _	491,107 - (11,172)	3,883,512 432,456 –	5,975,815 432,456 (11,172)	127,187 14,201 –	6,103,002 446,657 (11,172)
Total comprehensive income for the year		_	(11,172)	432,456	421,284	14,201	435,485
Transactions with owners, recognised directly in equity Appropriation to reserves			35,955	(35,955)	_		
Capital contribution from non-controlling interests Dividends paid to non-controlling interests	-	_	_	_	-	5,265 (5,265)	5,265
Balance as at 31 December 2021	96	1,601,100	515,890	4,280,013	6,397,099	141,388	6,538,487

\* refer to Note 2.1

The accompanying notes form an integral part of these financial statements.



## Statement of Changes in Equity

For the financial year ended 31 December 2022

	Attributable to equity holders of the Company —> Share Other				
	capital (Note 30) RMB'000	Share premium RMB'000	reserves (Note 31) RMB'000	Accumulated Iosses RMB'000	Total equity RMB'000
Company					
2022					
Balance as at 1 January 2022	96	1,601,100	1,057,112	(752,041)	1,906,267
Loss for the year, representing total					
comprehensive loss for the year		_	_	(82,711)	(82,711)
Balance as at 31 December 2022	96	1,601,100	1,057,112	(834,752)	1,823,556
2021					
Balance as at 1 January 2021	96	1,601,100	1,057,112	(664,591)	1,993,717
Loss for the year, representing total		, , -			. ,
comprehensive loss for the year		_	_	(87,450)	(87,450)
Balance as at 31 December 2021	96	1,601,100	1,057,112	(752,041)	1,906,267



## **Consolidated Statement of Cash Flows**

For the financial year ended 31 December 2022

	2022 RMB'000	2021 RMB'000 (Restated)*
Cash flows from operating activities		
Profit before tax	486,259	576,895
Adjustments for:		
<ul> <li>Amortisation of intangible assets</li> </ul>	159,434	149,050
<ul> <li>Deferred grant recognised</li> </ul>	(40,294)	(36,781)
<ul> <li>Depreciation of investment property</li> </ul>	911	898
- Depreciation of property, plant and equipment	419,753	375,149
<ul> <li>Depreciation of right-of-use assets</li> </ul>	85,454	81,594
– Finance expenses	417,443	361,676
<ul> <li>Foreign exchange loss/(gains)</li> </ul>	194,794	(50,166)
<ul> <li>Impairment loss on prepayments</li> </ul>	-	71
<ul> <li>Impairment loss on intangible asset</li> </ul>	-	30,202
- Financial income under service concession arrangements	(43,968)	(42,601)
- Bank interest income	(22,862)	(11,702)
<ul> <li>Gain on disposal of shares of associate</li> </ul>	(421)	_
<ul> <li>Loss allowance on other receivables</li> </ul>	-	10,899
<ul> <li>Loss allowance on trade receivables</li> </ul>	765	5,918
<ul> <li>Loss on disposal of property, plant and equipment</li> </ul>	651	444
<ul> <li>Loss on disposal of shares of joint venture</li> </ul>	-	556
<ul> <li>Share of (profit)/loss of joint ventures</li> </ul>	(2,891)	11,931
<ul> <li>Share of loss of associates</li> </ul>	38	534
	1,655,066	1,464,567
Change in working capital		(
- Trade and other receivables	(12,928)	(665,846)
- Service concession receivables	32,915	(101,422)
- Inventories	(46,155)	(5,432)
- Intangible assets	(567,764)	(580,261)
- Trade and other payables	181,230	347,554
- Amounts due from related parties	241,271	(69,487)
- Amounts due to related parties	242	14,298
- Provision for contingent liabilities		(2,400)
Cash generated from operations	1,483,877	401,571
Income tax paid	(51,467)	(78,819)
Net cash generated from operating activities	1,432,410	322,752

\* refer to Note 2.1 and 37

The accompanying notes form an integral part of these financial statements.



## Consolidated Statement of Cash Flows

For the financial year ended 31 December 2022

	2022 RMB'000	2021 RMB'000 (Restated)*
Cash flows from investing activities		
Interest received	17,097	6,111
Additions to property, plant and equipment	(1,057,893)	(1,091,251)
Additions to intangible assets – software	(7,322)	(2,958)
Investments in joint ventures	(87,459)	(22,371)
Proceeds from disposal of shares of an associate	2,241	_
Proceeds from disposal of subsidiaries	114,255	_
Proceeds from disposal of shares of joint venture	-	18,725
Receipt of non-trade amounts due from joint ventures	229,031	_
Change in bank deposits pledged	6,552	24,655
Proceeds from closure of WTE plant	_	9,836
Proceeds from disposal of property, plant and equipment	383	2,813
Net cash used in investing activities	(783,115)	(1,054,440)
Cash flows from financing activities		
Proceeds from borrowings	7,870,654	5,115,390
Repayment of borrowings	(7,337,981)	(3,277,050)
Payment of finance costs	(478,550)	(439,559)
Capital contributions from non-controlling interests	1,416	_
Pledged bank deposits for borrowings	(462,007)	(602,591)
Repayment of lease liabilities	(5,193)	(35,274)
Net cash (used in)/generated from financing activities	(411,661)	760,916
Net increase in cash and cash equivalents	237,634	29,228
Cash and cash equivalents		
Beginning of financial year	387,801	361,313
Effects of currency translation on cash and cash equivalents	1,612	(2,740)
End of financial year	627,047	387,801

\* refer to Note 2.1 and 37



For the financial year ended 31 December 2022

These notes form an integral part of and should be read in conjunction with the accompanying financial statements.

### 1. GENERAL INFORMATION

Zheneng Jinjiang Environment Holding Company Limited (the "Company") was incorporated on 8 September 2010 as an exempt company with limited liability in Cayman Islands with its registered office presently at Grand Pavilion, Hibiscus Way, 802 West Bay Road, P.O. Box 31119, KY1-1205, Cayman Islands and principal place of business at 1 Yinxiu Road, Level 19, Tower A, Hangyue Commercial Center, Gongshu District, Hangzhou City, Zhejiang Province, the People's Republic of China (the "PRC"). The single largest shareholder is Zhejiang Provincial Energy Group Co., Ltd., which is controlled by State-owned Assets Supervision and Administration Commission of the People's Government of Zhejiang Province.

The Company was listed on the Main Board of Singapore Exchange Securities Trading Limited ("SGX-ST") on 3 August 2016.

The consolidated financial statements are expressed in Renminbi ("RMB"), which is the Company's functional currency.

The principal activity of the Company is that of an investment holding company. The Group is mainly engaged in the generation and sales of electricity and steam, operation of waste-to-energy plants and project management, technical consulting and advisory services and energy management contracting business. The principal activities of the subsidiaries, associates and joint ventures are disclosed in Notes 22, 20 and 21 to the consolidated financial statements respectively.

### 2. SIGNIFICANT ACCOUNTING POLICIES

#### 2.1 Basis of preparation

These financial statements have been prepared in accordance with the International Financial Reporting Standards ("IFRS") under the historical cost convention, except as disclosed in the accounting policies below.

The preparation of financial statements in conformity with IFRS requires management to exercise its judgement in the process of applying the Group's accounting policies. It also requires the use of certain critical accounting estimates and assumptions. The areas involving a higher degree of judgement or complexity, or areas where assumptions and estimates are significant to the financial statements are disclosed in Note 3.

#### Interpretations and amendments to published standards effective in 2022

On 1 January 2022, the Group has adopted the new or amended IFRS and interpretations issued by the IFRS Interpretations Committee ("IFRIC") that are mandatory for application for the financial year. Changes to the Group's accounting policies have been made as required, in accordance with the transitional provisions in the respective IFRS and IFRIC.

The adoption of these new or amended IFRS and IFRIC did not result in substantial changes to the Group's accounting policies and had no material effect on the amounts reported for the current or prior financial years except for the Amendment to IAS 16 *Property, Plant and Equipment*.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.1 Basis of preparation (Continued)

#### Interpretations and amendments to published standards effective in 2022 (Continued)

The amendment to IAS 16 prohibits an entity from deducting from the cost of an item of property, plant and equipment any proceeds received from selling items produced while the entity is preparing the asset for its intended use. The proceeds from selling such samples and the costs relating to items produced are now recognised in profit or loss. This amendment also clarifies that an entity is 'testing whether the asset is functioning properly' when it assesses the technical and physical performance of the asset. The financial performance of the asset is not relevant to this assessment.

Entities must disclose separately the amount of proceeds and cost relating to items produced that are not an output of the entity's ordinary activities.

Entities should apply the amendment retrospectively, but only to property, plant and equipment that are brought to the location and condition necessary for them to be capable of operating in the manner intended by management on or after the beginning of the earliest period presented in the financial statements in which the entity first applies the amendments.

#### Impact on the comparatives for the 31 December 2022 Financial Statements

	2021 As previously reported	Increase/ (decrease)	2021 As currently reported
	RMB'000		RMB'000
Group			
Consolidated Statement of Comprehensive Income			
Revenue – sales of electricity	1,466,023	12,577	1,478,600
Revenue – revenue from waste treatment	914,032	28,145	942,177
Cost of sales	3,007,865	47,127	3,054,992
Profit for the period attributable to shareholders of the			
Company	438,024	(5,568)	432,456
Profit for the period attributable to non-controlling interests	15,038	(837)	14,201
Basic and diluted earnings per share	30.12	(0.38)	29.74
Group			
Consolidated Statement of Financial Position			
Property, plant and equipment	10,037,818	(6,405)	10,031,413
Net assets	6,544,892	(6,405)	6,538,487
Retained profits	4,285,581	(5,568)	4,280,013
Non-controlling interests	142,225	(837)	141,388
Total equity	6,544,892	(6,405)	6,538,487
Group Consolidated Statement of Cash Flows			
Net cash generated from operating activities	329,157	(6,405)	322,752
Net cash used in investing activities	(1,060,845)	(6,405)	(1,054,440)

Impact on the Consolidated Statement of Changes in Equity can be seen above within the impact on the Consolidated Statement of Comprehensive Income and Consolidated Statement of Financial Position.

There is no impact on the opening balance of the comparatives as of 1 January 2021.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.1 Basis of preparation (Continued)

Annual periods

#### Interpretations and amendments to published standards effective in 2022 (Continued)

Impact on the comparatives for the 31 December 2022 Financial Statements (Continued)

The following are the new or amended Standards and Interpretations (issued up to 31 December 2022) that are not yet applicable, but may be early adopted for the current financial year.

commencing on	Description
1 January 2023	<ul> <li>Amendments to:</li> <li>IAS 1 Presentation of Financial Statements and IFRS Practice Statement 2 (Disclosure of Accounting Policies)</li> <li>IAS 8 Accounting Policies, Changes in Accounting Estimates and Errors (Definition of Accounting Estimates)</li> <li>IAS 12 Deferred Tax related to Assets and Liabilities arising from a Single Transaction</li> </ul>
1 January 2024	<ul> <li>Amendments to:</li> <li>IAS 1 Non-current Liabilities with Covenants</li> <li>IAS 1 Classification of Liabilities as Current or Non-current</li> <li>IFRS 16 Lease Liability in a Sale and Leaseback</li> </ul>
To be determined	<ul> <li>Amendments to:</li> <li>IFRS 10 Consolidated Financial Statements and IAS 28 Investments in Associates and Joint Ventures (Sale or Contribution of Assets between an Investor and its Associate or Joint Venture)</li> </ul>

The new or amended accounting Standards and Interpretations listed above are not mandatory for 31 December 2022 reporting periods and have not been early adopted by the Group. These are not expected to have a material impact on the Group in the current or future reporting periods and on foreseeable future transactions.

#### 2.2 Going concern

As of 31 December 2022, the current liabilities of the Group and of the Company exceeded the current assets by approximately RMB2,043,381,000 and RMB2,605,422,000 respectively. Furthermore, included in the current liabilities of the Group and of the Company are outstanding borrowings of RMB1,374,480,000 and RMB1,224,480,000 respectively, which the banks are contractually entitled to request for immediate repayment as a result of the non-compliance of the Financial Covenant (as described in Note 28) and the consequential cross default in relation to one other borrowing.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.2 Going concern (Continued)

The financial statements have been prepared on a going concern basis as the directors and management have assessed that it is appropriate to do so after considering the following:

- (a) the Company fully repaid the above-mentioned outstanding borrowing amounting to RMB1,224,480,000 by the end of February 2023 (refer to Note 28), in advance of the scheduled maturity date. The lenders of the other borrowing with consequential cross default caused by the aforementioned repaid borrowing has not called on the repayment ahead of the stipulated repayment dates. The Group also continuously communicates with the other banks and financial institutions on its financial situation;
- (b) the Group's ability to comply with all financial covenants for its other outstanding borrowings;
- (c) the Group's ability to finalise and obtain additional credit facilities or manage renewal from financial institutions subsequent to year end;
- (d) the Company had received a no-objection letter from Shenzhen Stock Exchange on 23 December 2022 to the establishment of an asset-backed securities ("ABS") scheme under which up to RMB1 billion in aggregate principal amount of ABS will be issued, which the Company intends to submit the application for the listing of the ABS within 12 months from the date of the no-objection letter; and
- (e) the Group's ability to generate positive cash flows from its operations and control the capital expenditure.

The cash flow projection prepared by management, which covers a period of at least twelve months from 31 December 2022, and takes into account the above-mentioned plans and measures, reflects that the Group will have sufficient funds to finance its operations and to meet its financial obligations as and when they fall due within twelve months from 31 December 2022. Accordingly, the directors are satisfied that it is appropriate to prepare the accompanying financial statements on a going concern basis.

#### 2.3 Revenue

Revenue is measured based on the consideration specified in a contract with a customer and excludes amounts collected on behalf of third parties. The Group recognises revenue when it transfers control of a product or service to a customer.

(a) Sale of goods

The Group sells electricity and steam to the customers. Revenue is recognised when the electricity and steam has been transferred to the end users upon usage based on the meter reading. A receivable is recognised by the Group when the electricity and steam are delivered to the customers as this represents the point in time which the right to consideration becomes unconditional, as only the passage of time is required before payment is due.

For the financial year ended 31 December 2022

## 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.3 Revenue (Continued)

- (b) Rendering of services
  - (i) Project technical and management service and Energy Management Contracting ("EMC") business

Project technical and management fees and EMC service fees from customers are recognised as revenue over time when services are rendered based on agreed rates. Management has assessed that the stage of completion is determined as the proportion of the total service period that has elapsed as at the end of the reporting period as it is an appropriate measure of progress towards complete satisfaction of these performance obligations under IFRS 15 as the customer simultaneously receives and consumes the services provided by the Group over the service period.

(ii) Equipment selection and sale

The Group enters into contracts with customers for equipment with unique specifications and engages a vendor to manufacture the specified equipment. Revenue is recognised at a point in time when control of the equipment has transferred to the customer which coincides with the delivery of the equipment to the customer.

(iii) Revenue from waste treatment

Revenue from waste treatment is recognised based on agreed rates when the relevant services are rendered over time as the grantor simultaneously receives and consumes the services provided by the Group over the service period.

(c) Interest income

Interest income is recognised using the effective interest rate method.

- (d) Construction services
  - (i) Construction contracts

The Group's performance in respect of construction services creates or enhances an asset or work in progress that the customer controls as the asset is created or enhanced, thus the Group satisfies a performance obligation and recognises revenue from construction contracts over time, as measured by the proportion of the contract costs incurred for work performed to date relative to the estimated total contract costs. Revenue from the construction services under a service concession agreement is estimated on a cost-plus basis with reference to a prevailing market rate of gross margin at the date of the agreement applicable to similar construction services rendered.

Management considers that this input method is an appropriate measure of the progress towards complete satisfaction of these performance obligations under IFRS 15 – Revenue from Contracts with Customers.





For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.3 Revenue (Continued)

- (d) Construction services (Continued)
  - (ii) Contract costs

Costs incurred in fulfilling a contract with a customer are recognised as an asset if such costs relate directly to a contract and generate or enhance the Group's resources used in satisfying future performance obligations and are expected to be recovered.

(iii) Contract assets and contract liabilities

Upon entering into a contract with a customer, the Group obtains rights to receive consideration from the customer and assumes performance obligations to transfer goods or provide services to the customer. The combination of those rights and performance obligations gives rise to a net asset or a net liability depending on the relationship between the remaining rights and the performance obligations. The contract is an asset and recognised as contract assets if the measure of the remaining rights exceeds the measure of the remaining performance obligation.

Conversely, the contract is a liability and recognised as contract liabilities if the measure of the remaining performance obligations exceeds the measure of the remaining rights.

#### 2.4 Government grants

Grants from the government are recognised at their fair value when there is reasonable assurance that the grant will be received and the Group will comply with all the attached conditions.

Government grants are deferred and recognised as income over the periods necessary to match them with the related costs which they are intended to compensate, on a systematic basis. Government grants relating to expenses are shown separately as other income.

Government grants relating to the purchase of assets are included in non-current liabilities as deferred grant and they are credited to profit or loss on a straight-line basis over the expected lives of the related assets.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.5 Accounting for common control transactions

The predecessor values method of accounting is used to account for the transfer of businesses from entities under common control.

In the application of the predecessor values method of accounting, the transaction can either be accounted for as if it had taken place at the beginning of the earliest period presented (or the date that the entities were first under common control, if later), or prospectively from the date of transfer of the businesses. The Group and the Company has elected to account for such transactions as if it had taken place at the beginning of the earliest period presented (or the date that the entities were first under common control, if later).

The net assets of the combining entities or businesses are combined using the existing carrying amounts. No amount is recognised in respect of goodwill or excess of acquirer's interest in the net fair value of acquiree's identifiable assets, liabilities and contingent liabilities over cost at the time of common control combination.

The consolidated statement of profit or loss and other comprehensive income include the results of each of the combining entities or businesses from the earliest date presented or since the date when the combining entities or businesses first came under the common control, whichever is earlier.

#### 2.6 Group accounting

- (a) Subsidiaries
  - (i) Consolidation

Subsidiaries are all entities (including structured entities) over which the Group has control. The Group controls an entity when the Group is exposed to, or has rights to, variable returns from its involvement with the entity and has the ability to affect those returns through its power over the entity. Subsidiaries are fully consolidated from the date on which control is transferred to the Group. They are deconsolidated from the date on that control ceases.

In preparing the consolidated financial statements, transactions, balances and unrealised gains on transactions between group entities are eliminated. Unrealised losses are also eliminated unless the transaction provides evidence of an impairment indicator of the transferred asset. Accounting policies of subsidiaries have been changed where necessary to ensure consistency with the policies adopted by the Group.

Non-controlling interests comprise the portion of a subsidiary's net results of operations and its net assets, which is attributable to the interests that are not owned directly or indirectly by the equity holders of the Company. They are shown separately in the consolidated statement of comprehensive income, statement of changes in equity, and balance sheet. Total comprehensive income is attributed to the non-controlling interests based on their respective interests in a subsidiary, even if this results in the non-controlling interests having a deficit balance.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.6 Group accounting (Continued)

#### (a) Subsidiaries (Continued)

(ii) Acquisitions

The acquisition method of accounting is used to account for business combinations entered into by the Group, unless it is an acquisition under common control, in which case, the accounting policy set out in Note 2.5 applies.

The consideration transferred for the acquisition of a subsidiary or business comprises the fair value of the assets transferred, the liabilities incurred and the equity interests issued by the Group. The consideration transferred also includes any contingent consideration arrangement and any pre-existing equity interest in the subsidiary measured at their fair values at the acquisition date.

Acquisition-related costs are expensed as incurred.

Identifiable assets acquired and liabilities and contingent liabilities assumed in a business combination are, with limited exceptions, measured initially at their fair values at the acquisition date.

On an acquisition-by-acquisition basis, the Group recognises any non-controlling interest in the acquiree at the date of acquisition either at fair value or at the non-controlling interest's proportionate share of the acquiree's identifiable net assets.

The excess of (a) the consideration transferred, the amount of any non-controlling interest in the acquiree and the acquisition-date fair value of any previous equity interest in the acquiree over the (b) fair value of the identifiable net assets acquired is recorded as goodwill.

#### (iii) Disposals

When a change in the Group's ownership interest in a subsidiary results in a loss of control over the subsidiary, the assets and liabilities of the subsidiary including any goodwill are derecognised. Amounts previously recognised in other comprehensive income in respect of that entity are also reclassified to profit or loss or transferred directly to retained earnings if required by a specific Standard.

Any retained equity interest in the entity is remeasured at fair value. The difference between the carrying amount of the retained interest at the date when control is lost and its fair value is recognised in profit or loss.

Please refer to the paragraph "Investments in subsidiaries, associates and joint ventures" for the accounting policy on investments in subsidiaries in the separate financial statements of the Company.

For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.6 Group accounting (Continued)

(b) Transactions with non-controlling interests

Changes in the Group's ownership interest in a subsidiary that do not result in a loss of control over the subsidiary are accounted for as transactions with equity owners of the Company. Any difference between the change in the carrying amounts of the non-controlling interest and the fair value of the consideration paid or received is recognised within equity attributable to the equity holders of the Company.

(c) Associates and joint ventures

Associates are entities over which the Group has significant influence, but not control, generally accompanied by a shareholding giving rise to voting rights of 20% and above.

Joint ventures are entities over which the Group has joint control as a result of contractual arrangements, and rights to the net assets of the entities.

Investments in associates and joint ventures are accounted for in the consolidated financial statements using the equity method of accounting less impairment losses, if any.

(i) Acquisition

Investments in associates and joint ventures are initially recognised at cost. The cost of an acquisition is measured at the fair value of the assets given, equity instruments issued or liabilities incurred or assumed at the date of exchange, plus costs directly attributable to the acquisition. Goodwill on associates and joint ventures represents the excess of the cost of acquisition of the associates or joint venture over the Group's share of the fair value of the identifiable net assets of the associates company or joint venture and is included in the carrying amount of the investments.

(ii) Equity method of accounting

Under the equity method of accounting, the investments are initially recognised at cost and adjusted thereafter to recognise Group's share of its associates' or joint ventures' post-acquisition profits or losses of the investee in profit or loss and its share of movements in other comprehensive income of the investee's other comprehensive income. Dividends received or receivable from the associates or joint ventures are recognised as a reduction of the carrying amount of the investments. When the Group's share of losses in an associates or joint venture equals to or exceeds its interest in the associates or joint venture, the Group does not recognise further losses, unless it has legal or constructive obligations to make, or has made, payments on behalf of the associates or joint venture. If the associates or joint venture subsequently reports profits, the Group resumes recognising its share of those profits only after its share of the profits equals the share of losses not recognised. Interest in an associates or joint venture includes any long-term loans for which settlement is never planned nor likely to occur in the foreseeable future.

Unrealised gains on transactions between the Group and its associates or joint ventures are eliminated to the extent of the Group's interest in the associates or joint ventures. Unrealised losses are also eliminated unless the transactions provide evidence of impairment of the assets transferred. The accounting policies of associates or joint ventures are changed where necessary to ensure consistency with the accounting policies adopted by the Group.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.6 Group accounting (Continued)

- (c) Associates and joint ventures (Continued)
  - (iii) Disposals

Investments in associates or joint ventures are derecognised when the Group loses significant influence or joint control. If the retained equity interest in the former associates or joint venture is a financial asset, the retained equity interest is measured at fair value. The difference between the carrying amount of the retained interest at the date when significant influence or joint control is lost, and its fair value and any proceeds on partial disposal, is recognised in profit or loss.

Please refer to the paragraph "Investments in subsidiaries and joint ventures" for the accounting policy on investments in subsidiaries and joint ventures in the separate financial statements of the Company.

#### 2.7 Property, plant and equipment

- (a) Measurement
  - (i) Buildings

Buildings are initially recognised at cost and subsequently carried at cost less accumulated depreciation and accumulated impairment losses.

(ii) Other property, plant and equipment

Other property, plant and equipment are initially recognised at cost and subsequently carried at cost less accumulated depreciation and accumulated impairment losses.

(iii) Components of costs

The cost of an item of property, plant and equipment initially recognised includes its purchase price and any cost that is directly attributable to bringing the asset to the location and condition necessary for it to be capable of operating in the manner intended by management. The projected cost of dismantlement, removal or restoration is also recognised as part of the cost of property, plant and equipment if the obligation for the dismantlement, removal or restoration is incurred as a consequence of either acquiring the asset or using the asset for purpose other than to produce inventories. Cost also includes borrowing costs (refer to Note 2.9 on borrowing costs).



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.7 Property, plant and equipment (Continued)

(b) Depreciation

Depreciation on property, plant and equipment (other than construction-in-progress) is calculated using the straight-line method to allocate their depreciable amounts over their estimated useful lives as follows:

	Useful lives
Leasehold land	30 - 50 years
Buildings	25 years
Plant and machinery	12 - 20 years
Furniture, fixture and equipment	5 years
Motor vehicles	8 years

No depreciation is charged for assets under construction until they are completed and transferred to appropriate asset categories. The residual values, estimated useful lives and depreciation method of property, plant and equipment are reviewed, and adjusted as appropriate, at each balance sheet date. The effects of any revision are recognised in profit or loss when the changes arise.

#### (c) Subsequent expenditure

Subsequent expenditure relating to property, plant and equipment that has already been recognised is added to the carrying amount of the asset only when it is probable that future economic benefits associated with the item will flow to the entity and the cost of the item can be measured reliably. All other repair and maintenance expenses are recognised in profit or loss when incurred.

(d) Disposal

On disposal of an item of property, plant and equipment, the difference between the disposal proceeds and its carrying amount is recognised in profit or loss within "Other gains and losses, net".

#### 2.8 Intangible assets

#### (a) Acquired computer software licences

Acquired computer software licences are initially capitalised at cost which includes the purchase prices (net of any discounts and rebates) and other directly attributable costs of preparing the asset for its intended use. Direct expenditures including employee costs, which enhance or extend the performance of computer software beyond its specifications and which can be reliably measured, are added to the original cost of the software. Costs associated with maintaining the computer software are expensed off when incurred.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.8 Intangible assets (Continued)

(b) Service concession arrangements

The Group recognises an intangible asset at fair value upon initial recognition when it has a right to charge for usage in relation to a concession infrastructure (as a consideration for providing construction services in a service concession arrangement). Subsequent to initial recognition, the intangible asset is measured at cost less accumulated amortisation and impairment losses. Amortisation is provided on straight-line basis over the respective periods of the operating concessions granted to the Group of 21 to 30 years.

The amortisation period and amortisation method of intangible assets other than goodwill are reviewed at least at each balance sheet date. The effects of any revision are recognised in profit or loss when the changes arise.

#### 2.9 Borrowing costs

Borrowing costs are recognised in profit or loss using the effective interest method except for those costs that are directly attributable to assets under construction. This includes those costs on borrowings acquired specifically for the construction or development of properties and assets under construction, as well as those in relation to general borrowings used to finance the construction or development of properties and assets under construction.

Borrowing costs on general borrowings are capitalised by applying a capitalisation rate to construction expenditures that are financed by general borrowings.

#### 2.10 Investment property

Investment property comprises of office units that are held for long-term rental yields and/or for capital appreciation.

Investment property are initially recognised at cost and subsequently carried at cost less accumulated depreciation and accumulated impairment losses.

Investment property is subject to renovations or improvements at regular intervals. The cost of major renovations and improvements is capitalised and the carrying amounts of the replaced components are recognised in profit or loss. The cost of maintenance, repairs and minor improvements is recognised in profit or loss when incurred.

Depreciation is calculated using a straight-line method after taking into account of their estimated residual value to allocate the depreciable amounts over the estimated useful lives of 99 years.

The residual values, useful lives and depreciation method of investment property are reviewed, and adjusted as appropriate, at each balance sheet date. The effects of any revision are included in profit or loss when the changes arise.

On disposal of an investment property, the difference between the disposal proceeds and the carrying amount is recognised in profit or loss.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.11 Investments in subsidiaries and joint ventures

Investments in subsidiaries and joint ventures are carried at cost less accumulated impairment losses in the Company's statement of financial position. On disposal of such investments, the difference between disposal proceeds and the carrying amounts of the investments are recognised in profit or loss.

#### 2.12 Impairment of non-financial assets

Intangible assets Property, plant and equipment Right-of-use assets Investments in subsidiaries, associates and joint ventures

Intangible assets, property, plant and equipment, right-of-use assets and investments in subsidiaries, associates and joint ventures are tested for impairment whenever there is any objective evidence or indication that these assets may be impaired.

For the purpose of impairment testing, the recoverable amount (i.e. the higher of the fair value less costs of disposal and the value-in-use) is determined on an individual asset basis unless the asset does not generate cash inflows that are largely independent of those from other assets. If this is the case, the recoverable amount is determined for the CGU to which the asset belongs.

If the recoverable amount of the asset (or CGU) is estimated to be less than its carrying amount, the carrying amount of the asset (or CGU) is reduced to its recoverable amount.

The difference between the carrying amount and recoverable amount is recognised as an impairment loss in profit or loss.

An impairment loss for an asset other than goodwill is reversed if, and only if, there has been a change in the estimates used to determine the asset's recoverable amount since the last impairment loss was recognised. The carrying amount of this asset is increased to its revised recoverable amount, provided that this amount does not exceed the carrying amount that would have been determined (net of any accumulated amortisation or depreciation) had no impairment loss been recognised for the asset in prior years.

A reversal of impairment loss for an asset other than goodwill is recognised in profit or loss, unless the asset is carried at revalued amount, in which case, such reversal is treated as a revaluation increase. However, to the extent that an impairment loss on the same revalued asset was previously recognised as an expense, a reversal of that impairment is also recognised in profit or loss.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.13 Financial assets

#### (a) Classification and measurement

The Group classifies its financial assets as measured at amortised cost.

The classification depends on the Group's business model for managing the financial assets as well as the contractual terms of the cash flows of the financial asset.

Financial assets with embedded derivatives are considered in their entirety when determining whether their cash flows are solely payment of principal and interest.

The Group reclassifies debt instruments when and only when its business model for managing those assets changes.

#### At initial recognition

At initial recognition, the Group measures a financial asset at its fair value plus, in the case of a financial asset not at fair value through profit or loss, transaction costs that are directly attributable to the acquisition of the financial asset. Transaction costs of financial assets carried at fair value through profit or loss are expensed in profit or loss.

#### At subsequent measurement

#### Debt instruments

Debt instruments mainly comprise of cash and cash equivalents, pledged bank deposits, trade and other receivables, service concession receivables and amounts due from related parties.

There are three subsequent measurement categories, depending on the Group's business model for managing the asset and the cash flow characteristics of the asset:

Amortised cost: Debt instruments that are held for collection of contractual cash flows where those cash flows represent solely payments of principal and interest are measured at amortised cost. A gain or loss on a debt instrument that is subsequently measured at amortised cost and is not part of a hedging relationship is recognised in profit or loss when the asset is derecognised or impaired. Interest income from these financial assets is included in interest income using the effective interest rate method.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.13 Financial assets (Continued)

(b) Impairment

The Group assesses on a forward-looking basis the expected credit losses associated with its debt financial assets carried at amortised cost. The impairment methodology applied depends on whether there has been a significant increase in credit risk. Note 35 details how the Group determines whether there has been a significant increase in credit risk.

For trade receivables and contract assets, the Group applies the simplified approach permitted by the IFRS 9, which requires expected lifetime losses to be recognised from initial recognition of the receivables.

For other receivables, amounts due from related parties, service concession receivables and cash and cash equivalents, the general 3-stage approach is applied. Credit loss allowance is based on 12-month expected credit loss if there is no significant increase in credit risk since initial recognition of the assets. If there is a significant increase in credit risk from initial recognition, lifetime expected credit loss will be calculated and recognised.

(c) Recognition and derecognition

Regular way purchases and sales of financial assets are recognised on trade date – the date on which the Group commits to purchase or sell the asset.

Financial assets are derecognised when the rights to receive cash flows from the financial assets have expired or have been transferred and the Group has transferred substantially all risks and rewards of ownership.

On disposal of a debt instrument, the difference between the carrying amount and the sale proceeds is recognised in profit or loss. Any amount previously recognised in other comprehensive income relating to that asset is reclassified to profit or loss.

On disposal of an equity investment, the difference between the carrying amount and sales proceed is recognised in profit or loss if there was no election made to recognise fair value changes in other comprehensive income. If there was an election made, any difference between the carrying amount and sales proceed amount would be recognised in other comprehensive income and transferred to retained profits along with the amount previously recognised in other comprehensive income relating to that asset.





For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.14 Service concession arrangements

#### Consideration given by the grantor

A financial asset (receivable under service concession arrangement) is recognised to the extent that the Group has an unconditional right to receive cash or another financial asset from or at the direction of the grantor for the construction services rendered and/or the consideration paid and payable by the Group for the right to manage and operate the infrastructure for public service. The Group has an unconditional right to receive cash if the grantor contractually guarantees to pay the Group (a) specified or determinable amounts or (b) the shortfall, if any, between amounts received from users of the public service and specified or determinable amounts, even if the payment is contingent on the Group ensuring that the infrastructure meets specified quality of efficiency requirements. The financial asset (receivable under service concession arrangement) is accounted for in accordance with the policy set out for "Financial assets" in Note 2.13.

An intangible asset (operating concession) is recognised to the extent that the Group receives a right to charge users of the public service. The intangible assets (operating concession) are stated at cost less accumulated amortisation and any accumulated impairment loss and are amortised on a straight-line basis over the operation phase of the concession periods.

If the Group is paid for the construction services partly by a financial asset and partly by an intangible asset, then each component of the consideration is accounted for separately and is recognised initially at the fair value of the consideration.

#### Construction of service concession related infrastructure

Revenue and costs relating to construction phase of a concession arrangement is accounted for in accordance to IFRS 15. The Group recognised the construction revenue with reference to the fair value of the construction service delivered in the construction phase. The fair value of such service is estimated on a cost-plus basis with reference to the prevailing market rate of gross margin. Consequently, the Group recognised a profit margin on the construction work by reference to the stage of completion and in accordance with the policy for "Revenue (Construction services)" in Note 2.3(d).

#### Operating services

Revenue relating to operating services is accounted for in accordance with the policy for "Revenue (Rendering of services)" in Note 2.3(b).

#### Contractual obligations to restore the infrastructure to a specified level of serviceability

When the Group has contractual obligations that it must fulfil as a condition of its licence for operating concessions under the "Intangible Asset" model, that is (a) to maintain the infrastructure to a specified level of serviceability and/or (b) to restore the infrastructure to a specified condition before they are handed over to the grantor at the end of the service concession arrangement, these contractual obligations to maintain or restore the infrastructure are recognised and measured in accordance with the policy set out for "Provisions" in Note 2.21.

Repair and maintenance and other expenses that are routine in nature are expensed and recognised in profit or loss as incurred.



For the financial year ended 31 December 2022

## 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.15 Borrowings

Borrowings are presented as current liabilities unless the Group has an unconditional right to defer settlement for at least 12 months after the balance sheet date, in which case they are presented as non-current liabilities.

Borrowings are initially recognised at fair value (net of transaction costs) and subsequently carried at amortised cost. Any difference between the proceeds (net of transaction costs) and the redemption value is recognised in profit or loss over the period of the borrowings using the effective interest method.

#### 2.16 Trade and other payables

Trade and other payables represent liabilities for goods and services provided to the Group prior to the end of financial year which are unpaid. They are classified as current liabilities if payment is due within one year or less (or in the normal operating cycle of the business if longer). Otherwise, they are presented as non-current liabilities.

Trade and other payables are initially recognised at fair value, and subsequently carried at amortised cost using the effective interest method.

#### 2.17 Leases

#### When the Group is the lessee:

At the inception of the contract, the Group assesses if the contract contains a lease. A contract contains a lease if the contract convey the right to control the use of an identified asset for a period of time in exchange for consideration. Reassessment is only required when the terms and conditions of the contract are changed.

• Right-of-use assets

The Group recognised a right-of-use asset and lease liability at the date which the underlying asset is available for use. Right-of-use assets are measured at cost which comprises the initial measurement of lease liabilities adjusted for any lease payments made at or before the commencement date and lease incentive received. Any initial direct costs that would not have been incurred if the lease had not been obtained are added to the carrying amount of the right-of-use assets.

These right-of-use asset is subsequently depreciated using the straight-line method from the commencement date to the earlier of the end of the useful life of the right-of-use asset or the end of the lease term.

Right-of-use assets are presented within "Property, plant and equipment".



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.17 Leases (Continued)

#### When the Group is the lessee: (Continued)

Lease liabilities

The initial measurement of lease liability is measured at the present value of the lease payments discounted using the implicit rate in the lease, if the rate can be readily determined. If that rate cannot be readily determined, the Group shall use its incremental borrowing rate.

Lease payments include the following:

- Fixed payment (including in-substance fixed payments), less any lease incentives receivables; and
- Payment of penalties for terminating the lease, if the lease term reflects the Group exercising that option.

Lease liability is measured at amortised cost using the effective interest method. Lease liability shall be remeasured when:

- There is a change in the Group's assessment of whether it will exercise an extension option; or
- There is a modification in the scope or the consideration of the lease that was not part of the original term.

Lease liability is remeasured with a corresponding adjustment to the right-of-use asset, or is recorded in profit or loss if the carrying amount of the right-of-use asset has been reduced to zero.

• Short term and low value leases

The Group has elected to not recognised right-of-use assets and lease liabilities for short-term leases that have lease terms of 12 months or less and leases of low value leases, except for sublease arrangements. Lease payments relating to these leases are expensed to profit or loss on a straight-line basis over the lease term.

#### When the Group is the lessor:

The Group leases investment property under operating leases.

Leases where the Group retains substantially all risks and rewards incidental to ownership are classified as operating leases. Rental income from operating leases (net of any incentives given to the lessees) is recognised in profit or loss on a straight-line basis over the lease term.

Initial direct costs incurred by the Group in negotiating and arranging operating leases are added to the carrying amount of the leased assets and recognised as an expense in profit or loss over the lease term on the same basis as the lease income.



For the financial year ended 31 December 2022

## 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.18 Inventories

Inventories are carried at the lower of cost and net realisable value. Cost is determined using the weighted average basis. Net realisable value is the estimated selling price in the ordinary course of business, less the estimated costs of completion and applicable variable selling expenses.

#### 2.19 Income taxes

Current income tax for current and prior periods is recognised at the amount expected to be paid to or recovered from the tax authorities, using the tax rates and tax laws that have been enacted or substantively enacted by the balance sheet date. Management periodically evaluates positions taken in tax returns with respect to situations in which applicable tax regulation is subject to interpretation and considers whether it is probable that a tax authority will accept an uncertain tax treatment. The Group measures its tax balances either based on the most likely amount or the expected value, depending on which method provides a better prediction of the resolution of the uncertainty.

Deferred income tax is recognised for all temporary differences arising between the tax bases of assets and liabilities and their carrying amounts in the financial statements except when the deferred income tax arises from the initial recognition of goodwill or an asset or liability in a transaction that is not a business combination and affects neither accounting nor taxable profit or loss at the time of the transaction.

A deferred income tax liability is recognised on temporary differences arising on investments in subsidiaries, associates and joint ventures, except where the Group is able to control the timing of the reversal of the temporary difference and it is probable that the temporary difference will not reverse in the foreseeable future.

A deferred income tax asset is recognised to the extent that it is probable that future taxable profit will be available against which the deductible temporary differences and tax losses can be utilised.

Deferred income tax is measured:

- (i) at the tax rates that are expected to apply when the related deferred income tax asset is realised or the deferred income tax liability is settled, based on tax rates and tax laws that have been enacted or substantively enacted by the balance sheet date; and
- (ii) based on the tax consequence that will follow from the manner in which the Group expects, at the balance sheet date, to recover or settle the carrying amounts of its assets and liabilities except for investment property. Investment property measured at fair value is presumed to be recovered entirely through sale.

Current and deferred income taxes are recognised as income or expense in profit or loss, except to the extent that the tax arises from a business combination or a transaction which is recognised directly in equity. Deferred tax arising from a business combination is adjusted against goodwill on acquisition.

For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.20 Provisions

Provisions are recognised when the Group has a present legal or constructive obligation as a result of past events, it is more likely than not that an outflow of resources will be required to settle the obligation and the amount has been reliably estimated. Provisions are not recognised for future operating losses.

Other provisions are measured at the present value of the expenditure expected to be required to settle the obligation using a pre-tax discount rate that reflects the current market assessment of the time value of money and the risks specific to the obligation. The increase in the provision due to the passage of time is recognised in the statement of comprehensive income as finance expense.

Changes in the estimated timing or amount of the expenditure or discount rate are recognised in profit or loss when the changes arise.

#### 2.21 Employee compensation

Employee benefits are recognised as an expense, unless the cost qualifies to be capitalised as an asset.

(a) Defined contribution plans

Defined contribution plans are post-employment benefit plans under which the Group pays fixed contributions into separate entities such as the Central Provident Fund on a mandatory, contractual or voluntary basis. The Group has no further payment obligations once the contributions have been paid.

(b) Share-based compensation

The Group operates an equity-settled, share-based compensation plan. The value of the employee services received in exchange for the grant of options is recognised as an expense with a corresponding increase in the share award reserve on the grant date. The total amount to be recognised on the grant date is determined by reference to the fair value of the options granted on grant date. Non-market vesting conditions are included in the estimation of the number of shares under options that are expected to become exercisable on the vesting date.

There is no vesting period for the share options. On the date of grant, the Group recognises the number of shares under options that are exercised and recognises the impact in profit or loss, with a corresponding adjustment to the share award reserve. The proceeds received (net of transaction costs) and the related balance previously recognised in the share award reserve are credited to the share capital account, when new ordinary shares are issued, or to the "treasury shares" account, when treasury shares are re-issued to the employees.

#### (c) Employee leave entitlement

Employee entitlements to annual leave are recognised when they accrue to employees. An accrual is made for the estimated liability for unutilised annual leave as a result of services rendered by employees up to the balance sheet date.

For the financial year ended 31 December 2022

## 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.22 Currency translation

(a) Functional and presentation currency

Items included in the financial statements of each entity in the Group are measured using the currency of the primary economic environment in which the entity operates ("functional currency"). The financial statements are presented in Renminbi, which is the functional currency of the Company.

(b) Transactions and balances

Transactions in a currency other than the functional currency ("foreign currency") are translated into the functional currency using the exchange rates at the dates of the transactions. Currency exchange differences resulting from the settlement of such transactions and from the translation of monetary assets and liabilities denominated in foreign currencies at the closing rates at the balance sheet date are recognised in profit or loss. Monetary items include primarily financial assets (other than equity investments), contract assets and financial liabilities. However, in the consolidated financial statements, currency translation differences arising from borrowings in foreign currencies and other currency instruments designated and qualifying as net investment hedges and net investment in foreign operations, are recognised in other comprehensive income and accumulated in the currency translation reserve.

When a foreign operation is disposed of or any loan forming part of the net investment of the foreign operation is repaid, a proportionate share of the accumulated currency translation differences is reclassified to profit or loss, as part of the gain or loss on disposal.

Foreign exchange gains and losses impacting profit or loss are presented in the income statement within "Other gains and losses, net".

Non-monetary items measured at fair values in foreign currencies are translated using the exchange rates at the date when the fair values are determined.

(c) Translation of Group entities' financial statements

The results and financial position of all the Group entities (none of which has the currency of a hyperinflationary economy) that have a functional currency different from the presentation currency are translated into the presentation currency as follows:

- (i) assets and liabilities are translated at the closing exchange rates at the reporting date;
- (ii) income and expenses are translated at average exchange rates (unless the average is not a reasonable approximation of the cumulative effect of the rates prevailing on the transaction dates, in which case income and expenses are translated using the exchange rates at the dates of the transactions); and
- (iii) all resulting currency translation differences are recognised in other comprehensive income and accumulated in the currency translation reserve. These currency translation differences are reclassified to profit or loss on disposal or partial disposal with loss of control of the foreign operation.

Goodwill and fair value adjustments arising on the acquisition of foreign operations are treated as assets and liabilities of the foreign operations and translated at the closing rates at the reporting date.



For the financial year ended 31 December 2022

### 2. SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

#### 2.23 Segment reporting

Operating segments are reported in a manner consistent with the internal reporting provided to the executive committee whose members are responsible for allocating resources and assessing performance of the operating segments.

#### 2.24 Cash and cash equivalents

For the purpose of presentation in the consolidated statement of cash flows, cash and cash equivalents include cash on hand, deposits with financial institutions which are subject to an insignificant risk of change in value. For cash subjected to restriction, assessment is made on the economic substance of the restriction and whether they meet the definition of cash and cash equivalents.

#### 2.25 Share capital and treasury shares

Ordinary shares are classified as equity. Incremental costs directly attributable to the issuance of new ordinary shares are deducted against the share capital account.

When any entity within the Group purchases the Company's ordinary shares ("treasury shares"), the carrying amount which includes the consideration paid and any directly attributable transaction cost is presented as a component within equity attributable to the Company's equity holders, until they are cancelled, sold or reissued.

When treasury shares are subsequently cancelled, the cost of treasury shares are deducted against the share capital account if the shares are purchased out of capital of the Company, or against the retained profits of the Company if the shares are purchased out of earnings of the Company.

When treasury shares are subsequently sold or reissued pursuant to an employee share option scheme, the cost of treasury shares is reversed from the treasury share account and the realised gain or loss on sale or reissue, net of any directly attributable incremental transaction costs and related income tax, is recognised in the capital reserve.

#### 2.26 Dividends to Company's shareholders

Dividends to the Company's shareholders are recognised when the dividends are approved for payment.



For the financial year ended 31 December 2022

### 3. CRITICAL ACCOUNTING ESTIMATES, ASSUMPTIONS AND JUDGEMENTS

Estimates, assumptions and judgements are continually evaluated and are based on historical experience and other factors, including expectations of future events that are believed to be reasonable under the circumstances.

#### 3.1 Critical accounting estimates and assumptions

#### (a) <u>Service concession arrangements</u>

i) Initial recognition of intangible assets and/or financial assets

The Group recognises the right to operate the infrastructure (consideration received or receivable in exchange for the construction services provided) as an intangible asset in accordance with the build-operate-transfer ("BOT") arrangements entered into with the local government for the project where there are no future guaranteed receipts over its service concession period.

The Group recognises a financial asset arising from a service concession arrangement when it has an unconditional contractual right to receive cash or other financial asset from or at the direction of the grantor for the construction services provided. Such financial assets are measured at fair value on initial recognition and classified as service concession receivable.

If the Group is paid for the construction services partly by a financial asset and partly by an intangible asset, then each component of the consideration is accounted for separately and is initially recognised at the fair value of the consideration.

In determining the fair values of the service concession receivables and intangible assets under service concession arrangements on initial recognition, estimates used include discount rates, budgeted costs of construction and gross profit margins for construction services revenue.

The assumptions used and estimates made can materially affect the fair value on initial recognition. The carrying amount of the Group's service concession receivables and intangible assets arising from service concession arrangements at the end of the reporting period is disclosed in Notes 17 and 26 respectively.

#### ii) Revenue from construction services

The stage of completion of each construction contract is assessed on a cumulative basis in each accounting year. Changes in estimate of contract revenue or contract costs, or the effect of a change in the estimate of the outcome of a contract could impact the amount of revenue recognised in profit or loss in the year in which the change is made and in subsequent years.

Revenue from construction services provided under service concession arrangements is disclosed in Note 4 to the consolidated financial statements. The gross profit margins recognised for third party constructed infrastructure in relation to service concession arrangement are estimated by management based on the prevailing market rate applicable to construction services rendered by comparable companies.



For the financial year ended 31 December 2022

# 3. CRITICAL ACCOUNTING ESTIMATES, ASSUMPTIONS AND JUDGEMENTS (CONTINUED)

#### 3.1 Critical accounting estimates and assumptions (Continued)

#### (b) Useful lives and residual values of property, plant and equipment

Management exercises their judgement in estimating the useful lives and residual values of the depreciable assets. The estimated useful lives reflect management's estimate of the period that the Group intends to derive future economic benefits from the use of the depreciable asset.

Depreciation is calculated using a straight-line method to allocate the depreciable amounts over the estimated useful lives.

The carrying amount of property, plant and equipment is disclosed in Note 19 to the consolidated financial statements.

#### (c) Impairment of property, plant and equipment

The Group regularly reviews whether there are any indicators of impairment and recognises an impairment loss if the recoverable amount of an asset is lower than its carrying amount.

The recoverable amounts, being the higher of fair value less costs to sell or value in use, are determined by management with reference to the best information available as of the balance sheet date. These management's assumptions in their value in use calculation include the revenue growth rate, the discount rate and capital expenditure within the forecast period.

The carrying amount of property, plant and equipment is disclosed in Note 19 to the consolidated financial statements.

#### (d) Loss allowance for trade and other receivables

The Group and the Company assess at the end of reporting period the expected credit loss ("ECL") required for its trade and other receivables, amounts due from non-controlling interests and amounts due from related parties taking into consideration the estimation of future cash flows. When measuring ECL, the Group and the Company use reasonable and supportable forward-looking information, including taking into consideration the credit worthiness, past collection history, subsequent receipts from the debtors and future economic conditions of the industry in which the debtors operate.

The carrying amounts of trade and other receivables, amounts due from non-controlling interests and amounts due from related parties are disclosed in Notes 14, 15 and 16 to the consolidated financial statements respectively.



For the financial year ended 31 December 2022

# 3. CRITICAL ACCOUNTING ESTIMATES, ASSUMPTIONS AND JUDGEMENTS (CONTINUED)

#### 3.2 Critical judgements in applying the entity's accounting policies

#### Service concession arrangements

The Group has entered into build-operate-own ("BOO") and BOT arrangements in respect of certain of its wasteto-energy ("WTE") plants with the local government. Whether the arrangements are BOO or BOT would result in different accounting treatments that have different financial impacts on the Group.

The Group assessed that the BOO arrangements are not service concession arrangements under IFRIC 12 *Service Concession Arrangements* because the local government does not control the significant residual interest in the infrastructure at the end of the term of the arrangements. Under the terms of the arrangement, the Group has the practical ability to pledge the infrastructure throughout the period of the arrangement. At the end of the respective BOO arrangement, the Group retains the ownership and control to the infrastructure and holds the right of first refusal on renewal of the service concession arrangement by the local government. In addition to the initial investment in the infrastructure, the Group performs technical upgrade periodically to improve the capacity and efficiency of the infrastructure. Management believes such improvements will further enhance the residual interest in the overall infrastructure at the end of the service concession arrangement.

On the other hand, the Group concluded that the BOT arrangements are service concession arrangement under IFRIC 12 *Service Concession Arrangements*, because (i) the local government controls and regulates the services that the Group must provide with the infrastructure at a pre-determined service charge and the parties to whom the Group must provide the services, and (ii) the local government controls significant residual interest in the infrastructure at the end of the term of the arrangements. Under the terms of the arrangement, upon expiry of the respective BOT arrangements, the infrastructure has to be transferred to the local government under good condition at no or minimal consideration.

See above involving estimations that management has made in relation to revenue recognition for construction services arising from service concession arrangements.



For the financial year ended 31 December 2022

### 4. REVENUE FROM CONTRACTS WITH CUSTOMERS

(a) Disaggregation of revenue from contracts with customers

	2022 RMB'000	2021 RMB'000 (Restated)
Waste-to-energy project construction and operation		
Sales of electricity	1,613,648	1,478,600
Sales of steam	735,725	484,183
Revenue from waste treatment <sup>(1)</sup>	985,802	942,177
Revenue from construction services provided under service concession		
arrangements (Notes 17 and 26)	593,928	692,461
Financial income under service concession arrangements <sup>(2)</sup> (Note 17)	43,968	42,601
	3,973,071	3,640,022
Project technical and management service, equipment		
selection and sale and EMC business		
Service income – non-related parties	92,643	400,218
Service income - related parties (Note 16(a))	8,141	60,858
	100,784	461,076
Total	4,073,855	4,101,098

 Included in the revenue from waste treatment are operating services under service concession arrangements amounting to RMB957,354,000 (2021: RMB897,793,000).

(2) Effective interest applied ranges from 5.9% to 11% (2021: from 5.9% to 11%).

#### Timing of revenue recognition

	2022	2021
	RMB'000	RMB'000
		(Restated)
At a point in time		
Sales of electricity	1,613,648	1,478,600
Sales of steam	735,725	484,183
Equipment selection and sale	69,881	378,006
-	2,419,254	2,340,789
Over time		
Revenue from waste treatment	985,802	942,177
Revenue from construction services provided under service concession		
arrangements (Notes 17 and 26)	593,928	692,461
Project technical and management service and EMC business	30,903	83,070
_	1,610,633	1,717,708
Financial income under service concession arrangements (Note 17)	43,968	42,601
Total	4,073,855	4,101,098



For the financial year ended 31 December 2022

### 4. REVENUE FROM CONTRACTS WITH CUSTOMERS (CONTINUED)

#### (b) Contract assets and liabilities

	31 December		1 January
	2022	2021	2021
	RMB'000	RMB'000	RMB'000
Contract assets			
<ul> <li>Equipment sale and selection</li> </ul>	-	17,832	81,540
Less: Loss allowance		_	
Total contract assets (Note 14)		17,832	81,540
Contract liabilities (Note 27)			
<ul> <li>Service concession arrangements</li> </ul>	30,757	35,591	55,997
- Sale of steam	5,304	_	—
- Service contracts		_	89,313
	36,061	35,591	145,310

Contract assets relating to equipment sale and selection are balances due from customers under the contracts that arise when the Group has delivered the equipment to the customer. Any amount previously recognised as a contract asset is reclassified to trade receivables at the point at which it is invoiced to the customer.

Management estimates the loss allowance on such contract assets at an amount equal to lifetime ECL, taking into account the historical default experience and the future prospects of the construction and waste to energy industry. Based on the assessment, management is of the view that the ECL is insignificant.

Contract liabilities for service concession arrangements relate to the advances received from the customer relating to the waste treatment services. Contract liabilities for sale of steam and service contracts are advances received from the customer before the steam or equipment has been delivered to the customer.

(i) Revenue recognised in relation to contract liabilities

	2022 RMB'000	2021 RMB'000
Revenue recognised in current period that was included in the contract liability balance at the beginning of the period		
<ul> <li>Service concession arrangements</li> </ul>	4,834	20,406
- Service contracts		89,313
	4,834	109,719



For the financial year ended 31 December 2022

### 4. REVENUE FROM CONTRACTS WITH CUSTOMERS (CONTINUED)

- (b) Contract assets and liabilities (Continued)
  - (ii) Unsatisfied performance obligations

	31 December	
	2022 2021	
	RMB'000	RMB'000
Aggregate amount of the transaction price allocated to contracts that are partially or fully unsatisfied as at 31 December		
- Service concession arrangements	175,365	480,214
- Sale of steam	5,304	_
- Service contracts	-	8,180
	180,669	488,394

Management expects that 76% (RMB137,978,000) of the transaction price allocated to unsatisfied performance obligations as of 31 December 2022 will be recognised as revenue during the next reporting period. The remaining 24% (RMB42,691,000) will be recognised in the 2024 financial year. The amount disclosed above does not include variable consideration which is constrained.

As permitted under IFRS 15, the aggregated transaction price allocated to unsatisfied contracts of periods one year or less, or are billed based on time incurred, is not disclosed.

(c) Trade receivables from contracts with customers

		31 December		1 January	
	Note	2022 RMB'000	2021 RMB'000	2021 RMB'000	
Group					
Current assets					
Trade receivables from contracts with					
customers	14	2,041,584	2,003,425	1,238,015	
Loss allowance	14	(31,673)	(30,908)	(24,990)	
		2,009,911	1,972,517	1,213,025	



For the financial year ended 31 December 2022

### 5. EXPENSES BY NATURE

	Group	
	2022 RMB'000	2021 RMB'000
		(Restated)
Cost of inventories recognised as expense	856,116	942,417
Construction cost	519,390	597,860
Environmental protection cost	234,418	296,717
Depreciation of property, plant and equipment	419,753	375,149
Depreciation of right-of-use assets	85,454	81,594
Depreciation of investment property	911	898
Amortisation of intangible assets	159,434	149,050
Employee compensation (Note 6)	373,300	366,365
Audit fees:		
- to auditors of the Company	1,000	1,000
- to member firms of the auditors of the Company	3,121	3,121
- to other auditors	783	783
Non-audit fees:		
<ul> <li>paid to other auditors</li> </ul>	739	746
Repair and maintenance	109,538	90,817
Transportation	72,526	70,843
Utilities	52,563	45,745
Outsourcing labour cost	81,179	99,131
Lease expense (Note 24(d))	25,220	20,890
Others	168,777	145,238
Total cost of sales and administrative expenses	3,164,222	3,288,364

### 6. EMPLOYEE COMPENSATION

	Gre	oup
	2022	2021
	RMB'000	RMB'000
Wages and salaries	343,140	342,553
Employer's contribution to defined contribution plans	30,160	23,812
	373,300	366,365



For the financial year ended 31 December 2022

### 7. OTHER INCOME

	Group	
	2022	2021
	RMB'000	RMB'000
Government grant (Note (i))	40,294	36,781
Value added tax refund (Note (ii))	43,734	25,199
Bank interest income	22,862	11,702
Sales of waste materials	67,440	42,163
Interest income from joint ventures and others	20,667	28,380
	194,997	144,225

#### Notes:

- (i) The government grants represented the government incentive funds and government subsidies of different nature received from the local government by the PRC operating entities of the Group, among them are grants in relation to environmental initiatives, waste management and technological output transformation. During the year ended 31 December 2022, government grants included: (a) the incentive primarily in relation to waste-to-energy business development to enterprises established in the PRC which amounted to RMB19,003,000 (2021: RMB20,222,000); and (b) the subsidies received on acquisition of properties, plant and equipment amortised to profit or loss which amounted to RMB21,291,000 (2021: RMB16,559,000). There were no unfulfilled conditions and other contingencies attached to the receipt of those grants.
- (ii) The amount represents the Group's entitlement to the refund of value-added tax paid on the sales of electricity and steam, and rendering of waste treatment service, in accordance with the Notice of the Ministry of Finance and State Administration of Taxation of the PRC on policies regarding the Value-Added Tax on Comprehensive Utilisation of Resources. There were no unfulfilled conditions and other contingencies attached to the receipts of such tax refund.

### 8. OTHER GAINS AND LOSSES, NET

	Group	
	2022	2021
	RMB'000	RMB'000
Other gains relating to closure of WTE plant	-	2,750
Foreign exchange (loss)/gains	(195,414)	42,059
Loss on disposal of property, plant and equipment	(651)	(444)
Loss on disposal of shares of joint venture	_	(556)
Gain on disposal of shares of an associate	421	_
Others	(7,372)	(2,642)
	(203,016)	41,167

### 9. FINANCE EXPENSES

	Gre	pup
	2022	2021
	RMB'000	RMB'000
Interest expenses		
– Borrowings	513,367	457,414
– Lease liabilities	182	2,691
– Others	1,772	1,200
	515,321	461,305
Less: capitalised interest	(97,878)	(99,629)
	417,443	361,676

Finance expenses on general borrowings were capitalised at a rate of 4.85% per annum (2021: 5.04% per annum).



For the financial year ended 31 December 2022

### **10. OTHER EXPENSES**

	Gro	oup
	2022	2021
	RMB'000	RMB'000
Impairment loss on:		
<ul> <li>intangible assets</li> </ul>	-	30,202
- prepayments		71
		30,273

During the financial year ended 31 December 2021, an impairment of RMB30,202,000 was recognised on intangible assets under service concession arrangements (Note 26(b)) relating to the Gwalior BOT project in India.

### **11. INCOME TAXES**

#### Income tax expense

	Group	
	2022	2021
	RMB'000	RMB'000
Current tax		
- PRC enterprise income tax	56,688	52,939
- Under provision in the prior years	2,083	1,008
<ul> <li>Taxes in other jurisdictions</li> </ul>		(270)
	58,771	53,677
Deferred tax (Note 29):		
- Current year charges	82,572	76,561
	141,343	130,238

Domestic PRC income tax is calculated at 25% of the estimated assessable profit for the financial year. Taxation for other jurisdictions is calculated at the rates prevailing in the relevant jurisdictions.



For the financial year ended 31 December 2022

### 11. INCOME TAXES (CONTINUED)

#### Income tax expense (Continued)

The tax on the Group's profit before tax differs from the theoretical amount that would arise using the PRC standard rate of income tax as follows:

	Group	
	2022	2021
	RMB'000	RMB'000
		(Restated)
Profit before tax	486,259	576,895
Tax calculated at tax rate of 25% (2021: 25%)	121,565	144,224
Effects of:		
- different tax rates in other countries	38,775	9,777
<ul> <li>– tax exemptions granted to PRC subsidiaries</li> </ul>	(87,637)	(72,816)
<ul> <li>expenses not deductible for tax purposes</li> </ul>	1,074	1,843
- utilisation of tax losses/deductible temporary differences		
previously not recognised	(7,302)	(14,294)
<ul> <li>– tax losses/deductible temporary differences not recognised</li> </ul>	72,785	60,496
- under provision of tax in prior financial years	2,083	1,008
Tax charge	141,343	130,238

### 12. EARNINGS PER SHARE

#### Basic/diluted earnings per share

Basic earnings per share is calculated by dividing the net profit attributable to equity holders of the Company by the weighted average number of ordinary shares outstanding during the financial year.

For the purpose of calculating diluted earnings per share, profit attributable to equity holders of the Company and the weighted average number of ordinary shares outstanding are adjusted for the effects of all dilutive potential shares.

	2022	2021 (Restated)
Earnings (RMB'000)		
Earnings for the purposes of basic and diluted earnings per share (profit for		
the year attributable to owners of the Company)	325,022	432,456
Number of shares ('000) Weighted average number of ordinary shares for the purpose of basic and diluted earnings per share	1,454,025	1,454,025
Basic and diluted earnings per share (RMB cents)	22.35	29.74

The fully diluted earnings per share and basic earnings per share are the same as there are no dilutive potential shares outstanding at the end of the financial years ended 31 December 2022 and 2021.



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### **13. PLEDGED BANK DEPOSITS**

The Group's and Company's pledged bank deposits are primarily for borrowings (Note 28) and projects tendering.

### 14. TRADE AND OTHER RECEIVABLES

	Group		Company	
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Trade receivables – third parties	2,041,584	2,003,425	-	_
Less: Loss allowance	(31,673)	(30,908)	-	_
Bills receivables	19,959	7,265	-	_
	2,029,870	1,979,782	_	_
Amount due from non-controlling interests –				
trade (Note 15)	13,773	14,866	-	_
Total trade and bills receivables	2,043,643	1,994,648	-	_
Advances to suppliers (Note (i))	219,258	219,793	_	_
Other receivables:				
- Staff advances	19,864	12,498	-	_
<ul> <li>Refundable deposits</li> </ul>	112,141	54,230	-	-
- Compensation receivable on closure of				
WTE plant	198,241	198,241	-	—
<ul> <li>Amount receivable for disposal of subsidiaries</li> </ul>	_	114,254	_	
- Others	37,450	26,879	_	_
Less: Loss allowance (Note (ii))	(42,356)	(42,356)	_	_
Sub-total of other receivables	325,340	363,746	_	_
Amount due from subsidiaries – non-trade Amount due from non-controlling interests –	-	_	2,995,972	2,116,567
non-trade (Note 15) Dther tax recoverable	11,030	11,030	-	_
<ul> <li>Value added tax recoverable</li> </ul>	311,574	384,869	_	_
– Others	1,054	1,681	-	_
Prepayments	37,186	27,348	-	_
Contract assets (Note 4)		17,832	_	
Total trade and other receivables	2,949,085	3,020,947	2,995,972	2,116,567
Analysed for reporting purposes as:				
<ul> <li>Current assets</li> </ul>	2,789,208	2,868,499	_	_
<ul> <li>Non-current assets</li> </ul>	159,877	152,448	2,995,972	2,116,567

Notes:

(i) Advances to suppliers comprise the prepayments agreed in the Group's equipment procurement contracts and project construction contracts for its projects under construction and are unsecured and interest free.

(ii) Included in loss allowance for other receivables is an impairment loss of RMB10,899,000 (2021: RMB10,899,000) in connection with the enforcement of the deposit for performance bond relating to Gwalior project (refer to Note26(b)).



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### 14. TRADE AND OTHER RECEIVABLES (CONTINUED)

Certain of the Group's borrowings were secured by certain of the Group's trade receivables amounting to RMB1,112,425,000 (2021: RMB617,173,000).

The credit terms granted by the Group on the sale of electricity, steam, waste treatment and rendering of services is 60 to 120 days (2021: 60 to 120 days).

#### Amounts due from subsidiaries

The Company's receivables from subsidiaries are non-trade in nature, unsecured, interest-free and repayable on demand.

As at 31 December 2022 and 2021, amounts due from subsidiaries have been classified as non-current assets as the Company does not expect repayment within 12 months from the end of the reporting date. Management is of the view that the amounts due from subsidiaries approximate their fair values as the effect of discounting is not expected to be significant.

Management estimates the loss allowance on amounts due from subsidiaries at an amount equal to 12-month ECL, taking into account the historical default experience, current financial conditions of the subsidiaries and the future prospects of the industry of each subsidiary. None of the amounts due from subsidiaries at the end of the reporting period is past due.

There has been no change in the estimation techniques or significant assumptions made during the current reporting period in assessing the loss allowance for amounts due from subsidiaries.

Based on the assessment, management is of the view that the ECL is insignificant as the credit risk of the subsidiaries are low.



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### **15. NON-CONTROLLING INTERESTS**

The table below shows details of subsidiaries of the Group with significant non-controlling interests:

Name of subsidiaries	Place of incorporation and principal place of business	ownership and voti helo non-cor inter	rtion of o interests ng rights d by ntrolling rests	non-co inte Year	ocated to ntrolling rests ended cember	non-co inte	nulated ntrolling rests ecember
		2022	2021	2022	2021	2022	2021
		%	%	RMB'000	RMB'000	RMB'000	RMB'000
					(Restated)		(Restated)
Kunming Jinjiang <sup>(1)</sup>	Kunming, the PRC	1.67	1.67	1,948	1,806	17,757	15,809
Jilin Xinxiang <sup>(2)</sup>	Changchun, the PRC	20.00	20.00	7,727	5,956	46,423	38,696
Yunnan Energy <sup>(3)</sup>	Yunnan, the PRC	11.00	11.00	6,448	5,283	36,287	28,424
Individually immaterial subsidiaries with non-controlling interests				3,771	1,156	62,231	58,459
				19,894	14,201	162,698	141,388

(1) Kunming Jinjiang refers to Kunming Xinxingze Environment Resources Industry Co., Ltd.

(2) Jilin Xinxiang refers to Jilin Xinxiang Co., Ltd.

(3) Yunnan Energy refers to Yunnan Green Energy Co., Ltd.



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### 15. NON-CONTROLLING INTERESTS (CONTINUED)

Summarised financial information in respect of the Group's subsidiaries that has material non-controlling interests, before intra-group eliminations is set out below.

#### **Kunming Jinjiang**

Kunming Jinjiang		
	2022	2021
	RMB'000	RMB'000
Summarised balance sheet		
Current assets	681,573	543,290
Non-current assets	1,156,147	1,198,176
Current liabilities	(199,896)	(155,730)
Non-current liabilities	(574,514)	(639,073)
Equity attributable to owners of the Company	1,045,553	930,854
Non-controlling interests	17,757	15,809
Summarised statement of comprehensive income		
Revenue	288,480	276,380
Expenses		(168,241)
•	(171,833)	
Profit for the year	116,647	108,139
Profit attributable to owner of the Company	114,699	106,333
Profit attributable to non-controlling interests	1,948	1,806
Summarised statement of cash flow		
Net cash inflow from operating activities	171,340	118,480
Net cash outflow from investing activities	(5,880)	(21,775)
Net cash outflow from financing activities	(165,470)	(99,246)
Net cash outflow	(10)	(2,541)
Jilin Xinxiang	2022	2021
	RMB'000	RMB'000
Summarised balance sheet		
Current assets	46,754	23,219
Non-current assets	653,154	702,373
Current liabilities	(128,687)	(145,854)
Non-current liabilities	(313,228)	(360,379)
Equity attributable to owners of the Company	211,570	180,663
Non-controlling interests	46,423	38,696
	10,120	00,000
Summarised statement of comprehensive income Revenue	169,250	158,047
	,	,
Expenses	(130,616)	(128,269)
Profit for the year	38,634	29,778
Profit attributable to owner of the Company	30,907	23,822
Profit attributable to non-controlling interests	7,727	5,956
Summarised statement of cash flow		
Net cash inflow from operating activities	120,942	97,720
Net cash outflow from investing activities	(32,119)	(67,002)
Net cash outflow from financing activities	(89,077)	(29,949)
Net cash (outflow)/inflow	(254)	769



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### 15. NON-CONTROLLING INTERESTS (CONTINUED)

#### Yunnan Energy

	2022	2021
	RMB'000	RMB'000
Summarised balance sheet		
Current assets	169,404	200,991
Non-current assets	534,044	432,135
Current liabilities	(221,744)	(70,025)
Non-current liabilities	(151,828)	(294,708)
Equity attributable to owners of the Company	293,588	239,969
Non-controlling interests	36,288	28,424
Summarised statement of comprehensive income		
Revenue	248,341	293,121
Expenses	(189,721)	(245,096)
Profit for the year	58,620	48,025
Profit attributable to owner of the Company	52,172	42,742
Profit attributable to non-controlling interests	6,448	5,283
Dividends paid to owner of the Company	34,953	42,600
Dividends paid to non-controlling interests	4,319	5,265
Summarised statement of cash flow		
Net cash inflow from operating activities	76,788	44,785
Net cash outflow from investing activities	(78,923)	(142,891)
Net cash inflow from financing activities	7,576	99,151
Net cash inflow	5,441	1,045

The amounts due from non-controlling interests are as follows:

		Group			
	Note	2022 20	2021		
		RMB'000	RMB'000		
Trade related	14	13,773	14,866		
Non-trade related	14	11,030	11,030		
		24,803	25,896		

The trade related balances are unsecured, interest free and with a credit period of 120 days (2021: 120 days) from the invoice date and are not past due as at the end of the reporting period.

The non-trade related balances due from non-controlling interests were unsecured, interest-free and repayable on demand.

Management determines the non-trade receivables due from non-controlling interests are subject to immaterial credit loss.



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### 15. NON-CONTROLLING INTERESTS (CONTINUED)

The amounts due to non-controlling interests are as follows:

		Gro	oup
	Note	Note 2022 20	2021
		RMB'000	RMB'000
Trade related	27	4,995	4,382
Non-trade related	27	125	125
		5,120	4,507

The trade related balances due to non-controlling interests are interest-free.

The non-trade related balances due to non-controlling interests are unsecured, interest-free and repayable on demand.

### 16. RELATED PARTY BALANCES AND TRANSACTIONS

Zheneng Group is the largest shareholder of the Group whilst Hangzhou Jinjiang Group ("Jinjiang Group") is the second largest shareholder of the Group (collectively known as the "major shareholders").

(a) In addition to the information disclosed elsewhere in the financial statements, the following transaction took place between the Group and related parties at terms agreed between the parties.

	2022 RMB'000	2021 RMB'000
Companies in which Zheneng Group has control over:		
- Purchases of materials	83,403	39,475
<ul> <li>Interest expense</li> </ul>	23,606	29,248
Companies in which Jinjiang Group has control over:		
- Purchases of materials	14,591	38,088
- Revenue from EMC business	(6,690)	(56,422)
- Rendering of technical and management services	(1,451)	(4,436)
Joint ventures:		
– Interest income	(20,311)	(28,163)



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### 16. RELATED PARTY BALANCES AND TRANSACTIONS (CONTINUED)

(b) The Group and the Company had the following balances with related parties:

	2022 RMB'000	2021 RMB'000
Group		
Trade:		
Amounts due from companies in which the major shareholders have		
control over	13,181	197,743
Amounts due from joint ventures	7,215	10,513
	20,396	208,256
Non-trade:		
Amounts due from companies in which the major shareholders have		
control over	-	6,329
Amounts due from joint ventures	228,278	504,391
	228,278	510,720
	248,674	718,976
Company		
Non-trade:		
Amounts due from joint ventures	658	2,258
	658	2,258
Group		
Trade:		
Amounts due to companies in which the major shareholders have		
control over	35,505	50,252
Amounts due to joint ventures	51	448
	35,556	50,700
Non-trade:		
Amounts due to companies in which the major shareholders have		
control over	1,414	4,345
Amounts due to joint ventures	435	635
	1,849	4,980





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### 16. RELATED PARTY BALANCES AND TRANSACTIONS (CONTINUED)

(b) The Group and the Company had the following balances with related parties: (Continued)

#### Trade balances

The trade related balances are unsecured, interest-free and with an average credit period of 6 months (2021: 6 months).

#### Non-trade balances

The non-trade related balances are unsecured, interest-free and repayable on demand except for the amounts due from joint ventures which bear interest at 6.5% (2021: 6.5%) per annum and are due within one year from the end of the reporting period.

The non-trade amounts due from joint ventures are the interest-bearing advances to the joint venture, Zibo Green New Energy Co., Ltd. (2021: Zibo Green New Energy Co., Ltd. and Hohhot Jiasheng New Energy Co., Ltd.), for financing the construction and operating costs of their WTE facilities.

(c) Compensation of directors and key management personnel of the Group

The remuneration of directors and key management personnel during the year was as follows:

	Gro	oup
	2022	2021
	RMB'000	RMB'000
Short-term employee benefits	8,980	9,819
Post-employment benefits	233	192
	9,213	10,111



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### 17. SERVICE CONCESSION RECEIVABLES

	Gro	Group		
	2022	2021		
	RMB'000	RMB'000		
Service concession receivables	811,461	800,408		
Less: Amounts due within one year shown under current assets	(68,088)	(63,976)		
Service concession receivables due after one year	743,373	736,432		
Expected collection schedule is analysed as follows: Within 1 year Within 2 to 5 years Over 5 years	68,088 232,485 510,888	63,976 209,308 527,124		
	811,461	800,408		

As at 31 December 2022, certain of the Group's borrowings were secured by the Group's service concession receivables with aggregate carrying amount RMB306,470,000 (2021: RMB728,222,000) (Note 28).

Management estimates the loss allowance on receivables under service concession arrangements at an amount equal to 12-month ECL, taking into account the historical default experience and the future prospects of the construction and waste to energy industry. None of the receivables under service concession arrangements at the end of the reporting period is past due.

Based on the assessment, management is of the view that the ECL is insignificant.

#### **18. INVENTORIES**

	Gr	Group		
	2022	2021		
	RMB'000	RMB'000		
Coal	58,697	16,655		
Spare parts and other raw materials	49,674	45,561		
	108,371	62,216		



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### 19. PROPERTY, PLANT AND EQUIPMENT

	Buildings RMB'000	Plant and machinery RMB'000	Furniture, fixtures and equipment RMB'000	Motor vehicles RMB'000	Construction in progress RMB'000	Right-of- use assets Leasehold land RMB'000	Right-of- use assets buildings RMB'000	Right-of- use assets Plant and machinery RMB'000	Total RMB'000
Group									
Cost									
At 1 January 2021	2,216,403	4,584,862	79,236	110,096	2,547,579	530,256	141,464	1,647,071	11,856,967
Additions (restated)	9,025	90,832	9,306	16,212	1,028,899	60,322	_	_	1,214,596
Transfer	616,777	1,097,418	124	_	(1,714,319)	_	_	_	_
Disposals/Written off	(143)	(87,611)	(540)	(14,913)	_	_	_	_	(103,207)
Exchange difference	-	-	(102)	(1,402)	(1,377)	(1,839)	_	_	(4,720)
At 31 December 2021	2.842.062	5,685,501	88,024	109,993	1,860,782	588,739	141.464	1 647 071	12,963,636
Additions	18,800	59,499	7,493	2,772	778,251	14,666			881,481
Transfer	612,743	2,340,827	268		(1,176,246)		(130,521)	(1,647,071)	
Disposals/Written off	(286)	(4,068)		(601)	(1,10,210)	_	(.00,02.)	(1,011,011)	(5,421)
Exchange difference	()	-	(126)	(1,994)	(2,609)	(282)	_	_	(5,011)
At 31 December 2022	3,473,319	8,081,759	95,193	110,170	1,460,178	603,123	10,943		13,834,685
Accumulated depreciation At 1 January 2021	(562,166)	(1,132,571)	(34,458)	(33,873)	_	(98,684)	(49,539)	(626,574)	(2,537,865)
Depreciation for the year	(100,495)	(252,830)	(9,554)	(12,270)	_	(11,988)	(8,903)	(60,703)	(456,743)
Disposals/Written off	9	80,997	514	7,034	_	_	_	_	88,554
Exchange difference	-	-	11	1,310	_	-	-	-	1,321
At 31 December 2021	(662,652)	(1,304,404)	(43,487)	(37,799)	_	(110,672)	(58,442)	(687,277)	(2,904,733)
Depreciation for the year	(174,506)	(218,417)	(7,820)	(19,010)	_	(15,516)	(8,697)	(61,241)	(505,207)
Transfer	(58,468)	(748,518)	-	-	_	_	58,468	748,518	_
Disposals/Written off	12	3,339	438	598	_	-	_	_	4,387
Exchange difference		-	2	796	-	_		_	798
At 31 December 2022	(895,614)	(2,268,000)	(50,867)	(55,415)	-	(126,188)	(8,671)	-	(3,404,755)
Accumulated impairment At 1 January 2021, At 31 December 2021, At 31 December 2022									
	-	(11,052)	-	(3)	(16,435)	-	-	-	(27,490)
Comming values		(11,052)		(3)	(16,435)	-		-	(27,490)
Carrying values At 31 December 2022	2,577,705	(11,052)		(3)	(16,435)	476,935	2,272		(27,490)



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### 19. PROPERTY, PLANT AND EQUIPMENT (CONTINUED)

Certain of the Group's interest-bearing bank and other borrowings were secured by certain of the Group's buildings and machinery, which had an aggregate carrying amount of RMB4,240,870,000 as at 31 December 2022 (2021: RMB3,808,406,000) (Note 28).

As at 31 December 2022, property certificates in respect of certain buildings with a carrying amount of RMB99,562,000 (2021: RMB105,076,000) of the Group in the PRC have not been obtained. As advised by the Group's PRC legal advisor, management is of the opinion that the Group legally owns the rights to use these properties.

For property, plant and equipment that have impairment indicators as of 31 December 2022 and 31 December 2021, management have performed an impairment assessment, and based on the impairment assessment carried out by management, no impairment loss was recognised for the financial year ended 31 December 2022 and 31 December 2021.

Right-of-use assets leasehold land represent land use rights located in the PRC and comprised leasehold land under medium-term lease. The land use rights in the PRC are amortised over the lease term of 30 to 50 years.

The Group leases certain buildings, plant and machinery. The lease terms are three to five years. The Group has options to purchase them without any extra charges and for a nominal amount at the end of the lease terms. No arrangements have been entered into for contingent rental payments. During the financial year ended 31 December 2022, these leases have been fully repaid at the end of their respective lease terms and hence, the right-of-use assets amounting to RMB970,606,000 have been reclassified to their respective property, plant and equipment categories.

### 20. INVESTMENTS IN ASSOCIATES

The Group's interest in the associates is accounted for using the equity method in the consolidated financial statements. As at 31 December 2022 and 2021, there is no material interest in the associates.

There are no contingent liabilities relating to the Group's interest in the associates.

The following table summarises, in aggregate, the Group's share of profit of the Group's individually immaterial associates accounted for using the equity method:

	31 December		
	2022	2021	
	RMB'000	RMB'000	
Net loss and total comprehensive loss	(38)	(534)	
Group			
Carrying value of individually immaterial associates, in aggregate	13,755	15,613	



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### 21. INVESTMENTS IN JOINT VENTURES

Set out below is the joint ventures of the Group as at 31 December 2022, which are material to the Group.

Name of entity <sup>(1)</sup>	Place of busines country of incorporation	s/ Principal activities	inte	vnership erest cember
			2022	2021
Zibo Green New Energy Co., Ltd. 淄博绿能新能源有限公司	Zibo, the PRC	Operation of waste-to- energy plant	30	30
Hohhot Jiasheng New Energy Co., Ltd. 呼和浩特嘉盛新能源有限公司	Hohhot, the PRC	Operation of waste-to- energy plant	30	30

(1) The English names of those companies established in the PRC are for reference only and have not been registered.

The above joint ventures are accounted for using the equity method in these consolidated financial statements.

There are no contingent liabilities relating to the Group's interest in the joint ventures.

Summarised financial information for joint venture

The following table illustrates the summarised financial information of the Group's investments in the material joint ventures:

Summarised balance sheet

	Zibo Green New Energy Co., Ltd. 31 December	
	2022	2021
Current assets	RMB'000 279,528	<b>RMB'000</b> 203,650
Includes: - Cash and cash equivalents	24,860	3,746
Current liabilities	(606,939)	(823,812)
Includes: - Financial liabilities (excluding trade payables)	(422,717)	(598,583)
Non-current assets	2,210,370	1,588,872
Non-current liabilities	(1,225,918)	(524,830)
– Financial liabilities (excluding trade payables)	(1,200,478)	(497,800)



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### 21. INVESTMENTS IN JOINT VENTURES (CONTINUED)

Summarised balance sheet (Continued)

		ng New Energy Ltd. cember
	2022 RMB'000	2021 RMB'000
Current assets	204,617	125,585
Includes: - Cash and cash equivalents	5,404	2,507
Current liabilities	(83,435)	(343,729)
Includes: - Financial liabilities (excluding trade payables)	(11,094)	(327,055)
Non-current assets	529,750	485,831
Non-current liabilities	(420,883)	(133,632)
- Financial liabilities (excluding trade payables)	(412,652)	(125,000)

Summarised statement of comprehensive income

	Zibo Green New Energy Co., Ltd. 31 December		Hohhot Jiashe Co., 31 Dec	• • • •
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Revenue	146,851	154,636	86,943	68,207
Interest income	129	17	55	7
Expenses				
Includes:				
- Depreciation and amortisation	54,350	52,962	25,758	20,173
<ul> <li>Interest expense</li> </ul>	26,659	58,484	8,267	14,787
Net profit/(loss) and total comprehensive				
income/(loss)	1,066	(33,346)	16,560	(756)

The information above reflects the amounts presented in the financial statements of the joint venture (and not the Group's share of those amounts), adjusted for differences in accounting policies between the Group and the joint venture.



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### 21. INVESTMENTS IN JOINT VENTURES (CONTINUED)

Summarised statement of comprehensive income (Continued)

The following table summarises, in aggregate, the Group's share of loss and other comprehensive income of the Group's individually immaterial joint ventures accounted for using the equity method:

	31 Dec	ember
	2022	2021
	RMB'000	RMB'000
Net loss and total comprehensive loss	(2,395)	(368)

Reconciliation of summarised financial information

Reconciliation of the summarised financial information presented to the carrying amount of the Group's interest in joint venture, is as follows:

	Energy	een New Co., Ltd. cember	0,	sheng New Co., Ltd. cember	То	tal ember
	2022	2021	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000	RMB'000	RMB'000
Net assets	657,041	443,880	230,049	134,055	887,090	577,935
Group's equity interest	30.00%	30.00%	30.00%	30.00%	_	_
Group's share of net assets	197,112	133,164	69,015	40,217	266,127	173,381
Fair value adjustments	5,934	5,934	-		5,934	5,934
Carrying value	203,046	139,098	69,015	40,217	272,061	179,315
Add: Carrying value of individually immat	erial joint ven	tures, in ag	ggregate		23,054	25,450
Carrying value Group's interest in joint ve	ntures				295,115	204,765



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### 22. INVESTMENTS IN SUBSIDIARIES

	Com	pany
	2022	2021
	RMB'000	RMB'000
Beginning and end of financial year	1,798,280	1,798,280

The Group has the following significant subsidiaries as at 31 December 2022 and 2021:

Name <sup>(1)</sup>	Principal activities	Country of business/ incorporation	Proportion of ordinary shares directly held by parent %	Proportion of ordinary shares held by the Group %	Proportion of ordinary shares held by non- controlling interests %
Gevin Limited	Investment holding	Hong Kong	100	100	_
Lamoon Holdings Limited	Investment holding	British Virgin Islands	100	100	_
Outstanding Mode Developments limited (British Virgin Islands)	Investment holding	British Virgin Islands	100	100	_
Waste Tec GmbH	Technical Service	Germany	100	100	_
Hangzhou Jinjiang Investment Co., Ltd. ("Jinjiang Investment") 杭州锦环投资有限公司	Investment holding	Hangzhou, the PRC	100	100	_
Lin'an Jiasheng Environment Co., Ltd. ("Lin'an Jiasheng' 临安嘉盛环保有限公司		Lin'an, the PRC	85.84	100	_
Hangzhou Kesheng Energy Technology Co., Ltd ("Hangzhou Kesheng") 杭州科晟能源技术有限公司	Operation of energy management consulting business	Hangzhou, the PRC	100	100	_
Hangzhou Zhenghui Construction Engineering Co., Ltd. ("Hangzhou Zhenghui") 杭州正晖建设工程有限公司	Operation of engineering, design, construction and project management	Hangzhou, the PRC	100	100	_
Jilin Xinxiang Co., Ltd. ("Jilin Xinxiang") 吉林省鑫祥有限责任公司	Operation of waste-to- energy plant	Changchun, the PRC	80	80	20
Kunming Xinxingze Environment Resources Industry Co., Ltd. ("Kunming Jinjiang") 昆明鑫兴泽环境资源产业有 限公司	Operation of waste-to- energy plant	Kunming, the PRC	90.59	98.33	1.67
Lianyungang Sunrise Environmental Protection Industry Co., Ltd. ("Lianyungang Sunrise") 连云港晨兴环保产业有限 公司	Operation of waste-to- energy plant	Lianyungang, the PRC	100	100	_



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### 22. INVESTMENTS IN SUBSIDIARIES (CONTINUED)

Name <sup>(1)</sup>	Principal activities	Country of business/ incorporation	Proportion of ordinary shares directly held by parent %	Proportion of ordinary shares held by the Group %	Proportion of ordinary shares held by non- controlling interests %
Tianjin Sunrise Environmenta Protection Science and Technology Development Co., Ltd. ("Tianjin Sunrise") 天津市晨兴力克环保科技发 展有限公司	energy plant	Tianjin, the PRC	100	100	_
Wuhan Green Energy Co., Ltd. ("Wuhan Jinjiang") 武汉市绿色环保能源有限 公司	Operation of waste-to- energy plant	Wuhan, the PRC	100	100	_
Wuhan Hankou Green Energy Co., Ltd. ("Hankou Jinjiang") 武汉汉口绿色能源有限公司	Operation of waste-to- energy plant	Wuhan, the PRC	100	100	-
Wuhu Lüzhou Environment Energy Co., Ltd. ("Wuhu Jinjiang") 芜湖绿洲环保能源有限公司	Operation of waste-to- energy plant	Wuhu, the PRC	100	100	-
Zhengzhou Xingjin Green Environment Energy Co., Ltd. ("Zhengzhou Xingjin") 郑州荥锦绿色环保能源有 限公司	Operation of waste-to- energy plant	Zhengzhou, the PRC	100	100	-
Zibo Green Energy Co., Ltd. ("Zibo Green Energy") 淄博绿能环保能源有限公司	Operation of waste-to- energy plant	Zibo, the PRC	100	100	_
Gaomi Lilangmingde Co. Ltd ("Gaomi Energy") 高密利朗明德环保科技有 限公司	Operation of waste-to- energy plant	Gaomi, the PRC	100	100	-
Hangzhou Xiaoshan Jinjiang Green Energy Co., Ltd. ("Xiaoshan Jinjiang") 杭州萧山锦江绿色能源有 限公司	Operation of waste-to- energy plant.	Hangzhou, the PRC	90	90	10
Songyuan Xinxiang New Energy Co., Ltd. ("Songyuan Xinxiang") 松原鑫祥新能源有限公司	Operation of waste-to- energy plant	Songyuan, the PRC	95	95	5
Suihua Green New Energy Co., Ltd. ("Suihua New Energy") 绥化市绿能新能源有限公司	Operation of waste-to- energy plant.	Suihua, the PRC	100	100	_
Wenling Green New Energy Co., Ltd. ("Wenling Green Energy") 温岭绿能新能源有限公司	Operation of waste-to- energy plant	Wenling, the PRC	100	100	_



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### 22. INVESTMENTS IN SUBSIDIARIES (CONTINUED)

Name <sup>(1)</sup>	Principal activities	Country of business/ incorporation	Proportion of ordinary shares directly held by parent %	Proportion of ordinary shares held by the Group %	Proportion of ordinary shares held by non- controlling interests %
Yinchuan Zhongke Environmental Electrical Co., Ltd. ("Yinchuan Zhongke") 银川中科环保电力有限公司	Operation of waste-to- energy plant	Yinchuan, the PRC	96.92	100	-
Yunnan Green Energy Co., Ltd. ("Yunnan Energy") 云南绿色能源有限公司	Operation of waste-to- energy plant	Kunming, the PRC	89	89	11
Zhejiang Zhuji Bafang Thermal Power Co. Ltd. ("Zhuji Bafang") 浙江诸暨八方热电有限责 任公司	Operation of thermal power plant	Zhuji, the PRC	100	100	_
Linzhou Jiasheng New Energy Co Ltd. ("Linzhou Jiasheng") 林州市嘉盛新能源有限公司	Operation of waste-to- energy plant	Linzhou, the PRC	100	100	_
Shijiazhuang Jinhuan Environmental Protection Technology Co Ltd. ("Shijiazhuang Jinhuan") 石家庄锦环环保科技有限 公司	Waste resource recycling projects	Shijiazhuang, the PRC	100	100	_
Zhongwei Green New Energy Co Ltd ("Zhongwei Energy") 中卫市绿能新能源有限公司	Operation of waste-to- energy plant	Zhongwei, the PRC	100	100	-
Baishan Green New Energy Co Ltd. ("Baishan Green Energy") 白山绿能新能源有限公司	Operation of waste-to- energy plant.	Baishan, the PRC	100	100	-
Jinghong Jiasheng New Energy Co Ltd. ("Jinghong Jiasheng") 景洪嘉盛新能源有限公司	Operation of waste-to- energy plant	Jinghong, the PRC	100	100	-
Leting Jinhuan New Energy Co Ltd. ("Leting Jinhuan") 乐亭县锦环新能源有限公司	Operation of waste-to- energy plant	Tangshan, the PRC	100	100	_
Tangshan Jiasheng New Energy Co Ltd. ("Tangshan Jiasheng") 唐山嘉盛新能源有限公司	Operation of waste-to- energy plant	Tangshan, the PRC	100	100	-
Zibo Green New Energy Co Ltd ("Zibo Energy") 淄博环保能源有限公司	Operation of waste-to- energy plant	Zibo, the PRC	100	100	-
Ecogreen Energy Gurgaon Faridabad Private Limited	Operation of waste-to- energy plant	Gurgaon, India	99.99	99.99	0.01
Ecogreen Energy Gwalior Private Limited	Operation of waste-to- energy plant	Gwalior, India	99.99	99.99	0.01
Ecogreen Energy Lucknow Private Limited	Operation of waste-to- energy plant	Lucknow, India	99.99	99.99	0.01

(1) The English names of those companies established in the PRC are for reference only and have not been registered. Audited by PricewaterhouseCoopers Zhong Tian LLP for consolidation purposes.



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#### 23. INVESTMENT PROPERTY

	2022 RMB'000	2021 RMB'000
Group		
Cost		
Beginning of financial year	26,422	27,618
Exchange difference	2,605	(1,196)
End of financial year	29,027	26,422
Accumulated depreciation		
Beginning of financial year	(1,547)	(1,342)
Depreciation for the year	(911)	(898)
Exchange difference	444	693
End of financial year	(2,014)	(1,547)
Carrying amount		
End of financial year	27,013	24,875

At the balance sheet date, the details of the Group's investment property are as follows:

Location	Description/existing use	Tenure
2 Venture Drive	Commercial	99-year leasehold commencing from
#15-17, #15/18, #15/19		10 June 2013.
Vision Exchange, Singapore		
Singapore 159936		

The property rental income from the Group's investment property leased out under operating lease amounted to approximately RMB491,000 (2021: RMB335,000). Direct operating expenses (including repairs and maintenance) arising from rental-generating investment property amounted to approximately RMB191,000 (2021: RMB159,000).

As at 31 December 2022 and 2021, certain of the Group's borrowings were secured by the Group's investment property (Note 28).

The fair value of the investment property is assessed to be RMB27,989,000 (2021: RMB25,477,000).

The Group engaged an independent valuer who has appropriate qualification and recent experience in the fair value measurement of the properties in the relevant locations to determine the fair value of the land and buildings. The valuations were made at year end on the basis of direct comparison with recent transactions of comparable properties within the vicinity and open market value.

The Group classified fair value measurement using a fair value hierarchy that reflects the nature and complexity of the significant inputs used in making the measurement. As at end of 31 December 2022, the fair value measurements of the Group's investment property is classified within Level 3 (2021: Level 3) of the fair value hierarchy. There were no transfers between different levels during the year.

For the financial year ended 31 December 2022

### 23. INVESTMENT PROPERTY (CONTINUED)

Management considers that certain unobservable inputs used in the fair value measurement of the Group's investment property are sensitive to the fair value measurement. The following information is relevant for the Group's investment property:

Significant unobservable					
Name of property	input(s)	Range	Sensitivity		
Vision Exchange Commercial units	Price per square metre of strata floor area	RMB118,000 - RMB145,000	Any significant isolated increase/(decrease) would result in a		
		(2021: RMB108,000 – RMB132,000)	significantly higher/ (lower) fair value measurement.		

### 24. LEASES - THE GROUP AS A LESSEE

Nature of the Group's leasing activities

#### Leasehold land

The Group has made an upfront payment to secure the right-of-use of the land located in the PRC under mediumterm lease. The land use rights in the PRC were amortised over the lease term of 30 to 50 years. These leasehold land is recognised within Property, plant and equipment (Note 19).

There are no externally imposed covenants on these lease arrangements.

#### Buildings

The Group leases office space for the purpose of back office operations.

#### Plant and machinery

The Group leases plant and machinery for waste-to-energy business.

#### (a) Carrying amounts

#### ROU assets classified within Property, plant and equipment

	2022 RMB'000	2021 RMB'000
Leasehold land	476,935	478,067
Buildings	2,272	83,022
Plant and machinery		959,794
	479,207	1,520,883



For the financial year ended 31 December 2022

### 24. LEASES – THE GROUP AS A LESSEE (CONTINUED)

Nature of the Group's leasing activities (Continued)

(b) Depreciation charge during the year

	2022 RMB'000	2021 RMB'000
Leasehold land	15,516	11,988
Buildings	8,697	8,903
Plant and machinery	61,241	60,703
Total	85,454	81,594
Interest expense		
Interest expense on lease liabilities	182	2,691
Lease expense not capitalised in lease liabilities		
Lease expense – short-term leases	25,220	20,890

(e) Total cash outflow for all the leases (including short-term leases) in 2022 was RMB30,413,000 (2021: RMB60,201,000).

(f) Addition of ROU assets during the financial year 2022 was RMB14,666,000 (2021: RMB60,322,000).

#### Lease liabilities

(C)

(d)

	Gr	oup
	2022	2021
	RMB'000	RMB'000
Current		
Lease liabilities	2,457	5,035
Non-current		
Lease liabilities		2,457
	2,457	7,492
Maturity analysis:		
Year 1	2,495	5,218
Year 2	_	2,495
Year 3		_
	2,495	7,713
Less: Unearned Interest	(38)	(221)
	2,457	7,492

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### 25. LEASES - THE GROUP AS A LESSOR

#### Nature of the Group's leasing activities - Group as a lessor

The Group has leased out their owned investment property for monthly lease payments. This lease is classified as an operating lease because the risk and rewards incidental to ownership of the assets are not substantially transferred.

Rental income from investment property are disclosed in Note 23.

Undiscounted lease payments from the operating leases to be received after the reporting date are as follows:

	2022	2021
	RMB'000	RMB'000
Less than one year	217	474
One to two years		198
Total undiscounted lease payment	217	672

#### 26. INTANGIBLE ASSETS

	Group	
	2022	2021
	2022 RMB'000 14,487 4,694,396	RMB'000
Software (Note (a))	14,487	8,993
Service concession arrangement (Note (b))	4,694,396	4,280,081
	4,708,883	4,289,074

#### (a) Software

	Group		
	2022	2021	
	RMB'000	RMB'000	
Cost			
Beginning of financial year	29,348	25,605	
Additions	7,880	3,743	
End of financial year	37,228	29,348	
Accumulated amortisation			
Beginning of financial year	(20,355)	(17,744)	
Amortisation	(2,386)	(2,611)	
End of financial year	(22,741)	(20,355)	
Net book value	14,487	8,993	





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### 26. INTANGIBLE ASSETS (CONTINUED)

#### (b) Service concession arrangement

	Group	
	2022	2021
	RMB'000	RMB'000
Cost		
Beginning of financial year	4,876,119	4,294,085
Additions	571,363	582,034
End of financial year	5,447,482	4,876,119
Accumulated amortisation		
Beginning of financial year	(565,836)	(419,397)
Amortisation	(157,048)	(146,439)
End of financial year	(722,884)	(565,836)
Accumulated impairment		
Beginning of financial year	(30,202)	-
Impairment losses	_	(30,202)
End of financial year	(30,202)	(30,202)
Net book value	4,694,396	4,280,081

The Group entered into service concession agreements with the local government authorities (the "Grantors"), pursuant to the design, construction, operation and maintenance of waste-to-energy plants during the concession period ranging from 21 years to 30 years, starting from the commencement date of commercial operation.

Service concession construction revenue (as detailed in Note 4) recorded in 2022 and 2021 represents the revenue recognised during the construction stage of the service concession period.

The right that the Group has received to charge for the sale of electricity and waste treatment has been recognised as an intangible asset at the fair value of the construction services provided and is amortised over the operating period of the waste-to-energy plant on a straight-line basis from the date on which the waste-to-energy plant commences operation.

As at 31 December 2022, the Group has RMB323,241,000 (2021: RMB744,627,000) of service concession arrangements pertaining to construction contracts in progress.

No impairment loss was recognised for the financial year ended 31 December 2022.



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### 26. INTANGIBLE ASSETS (CONTINUED)

During the financial year ended 31 December 2021, the Group was unable to reach mutual agreement with the local government regarding compensation for the cessation of a BOT project in India, and had notified the local government of its intention to initiate arbitration proceedings in connection therewith and has applied to the High Court of Delhi to appoint arbitrators. The Group made a commercial decision to cease operations of this BOT project due to its long-term negative cashflow arising from the local government not making timely payment of the waste treatment fees to the Group in accordance with the service concession agreement, the small scale of operations in the Gwalior region, the high cost of waste collection and transportation and certain cash deductions made by the local government due to inadequate coverage of waste collection. This resulted in the local government taking over the waste collection and transportation operations and project assets and later enforcing the deposit for performance bond relating to this BOT project. Given the uncertainty in terms of the timeline and outcome of such arbitration proceedings, an impairment loss of RMB30,202,000 on the intangible assets relating to the BOT project was recognised. In addition, an impairment loss of RMB10,899,000 was recognised in connection with the enforcement of the deposit for performance bond relating to this project (refer to Note 14). Based on legal advice from external council, it is not probable that a significant liability will arise from this matter.

The Group's intangible assets amounting to RMB1,581,579,000 as at 31 December 2022 (2021: RMB1,325,563,000) were pledged as collaterals against general loan facilities granted to the Group (Note 28).

Management estimates the loss allowance on such contract assets at an amount equal to lifetime ECL, taking into account the historical default experience and the future prospects of the construction and waste to energy industry. Based on the assessment, management is of the view that the ECL is insignificant.

### 27. TRADE AND OTHER PAYABLES

	Group		Company	
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Trade payables – third parties	766,621	630,804	_	_
Bills payables	-	106,000	_	_
Amount due to non-controlling interests –				
trade (Note 15)	4,995	4,382	_	_
Amounts due to subsidiaries	-	_	738,645	85,884
Construction and equipment payables	960,269	1,100,455	_	_
Contract liabilities (Note 4)	36,061	35,591	_	_
Accrued payroll and welfare	95,052	89,990	_	_
Accrued expenses	12,185	4,812	_	_
Deferred grant (Note 32)	375,874	381,085	_	_
Value added tax	62,540	41,540	_	_
Other tax liabilities	21,633	19,556	_	_
Amount due to non-controlling interests –				
non-trade (Note 15)	125	125	_	_
Deposits received from suppliers	62,569	35,914	_	_
Other payables	53,931	74,190	22,685	10,505
Total trade and other payables	2,451,855	2,524,444	761,330	96,389
Analysed for reporting purposes as:				
- Current liabilities	2,094,340	2,160,424	761,330	96,389
- Non-current liabilities	357,515	364,020	_	
	2,451,855	2,524,444	761,330	96,389



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### 27. TRADE AND OTHER PAYABLES (CONTINUED)

The credit period on purchases is 90 to 120 days (2021: 90 to 120 days). No interest is charged on the overdue trade payables.

The Company's payables to subsidiaries are non-trade in nature, unsecured, interest-free and repayable on demand.

### 28. BORROWINGS AND LEASE LIABILITIES

	Gro	up	Com	bany
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Guaranteed borrowings	_	_	1,224,480	1,495,364
Secured and guaranteed bank borrowings	196,799	1,752,091	-	_
Secured bank borrowings	3,938,281	2,423,913	1,088,366	519,269
Secured other borrowings	3,991,165	3,536,887	-	_
Unsecured borrowings	3,119,910	2,768,492	-	_
Lease liabilities (Note 24)	2,457	7,492	_	_
	11,248,612	10,488,875	2,312,846	2,014,633
The borrowings comprise:				
<ul> <li>Fixed-rate borrowings</li> </ul>	924,542	2,085,719	-	676,366
<ul> <li>Variable-rate borrowings</li> </ul>	10,321,613	8,395,664	2,312,846	1,338,267
	11,246,155	10,481,383	2,312,846	2,014,633
Total borrowings and lease liabilities	11,248,612	10,488,875	2,312,846	2,014,633
Less: Amount due within one year shown under current liabilities	(4,903,709)	(4,711,448)	(1,942,533)	(2,014,633)
Amounts shown under non-current liabilities	6,344,903	5,777,427	370,313	

The carrying amount of borrowings approximate their fair value.

Bank borrowings of the Group amounting to RMB196,799,000 (2021: RMB1,752,091,000) are guaranteed by one of the major shareholders and secured by trade receivables (Note 14), service concession receivables (Note 17), property, plant and equipment (Note 19) and intangible assets (Note 26).

Bank borrowings of the Group amounting to RMB3,938,281,000 (2021: RMB2,423,913,000) are secured by the pledge of certain bank deposits (Note 13), trade receivables (Note 14), service concession receivables (Note 17), property, plant and equipment (Note 19), investment property (Note 23), intangible assets (Note 26), shares of a subsidiary.



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### 28. BORROWINGS AND LEASE LIABILITIES (CONTINUED)

Other borrowings of the Group amounting to RMB3,991,165,000 (2021: RMB3,536,887,000) are secured by the pledge of certain trade receivables (Note 14), property, plant and equipment (Note 19), intangible assets (Note 26), shares of a subsidiary.

Unsecured borrowings of the Group include certain borrowings amounting to RMB2,891,657,000 (2021: RMB2,498,640,000) that are guaranteed by the subsidiaries of the Group.

Bank borrowings of the Company amounting to RMB1,088,366,000 (2021: RMB519,269,000) are secured by certain bank deposits (Note 13), and the remaining RMB1,224,480,000 (2021: RMB1,495,364,000) are guaranteed by certain subsidiaries of the Group.

Included in the borrowings of the Group are borrowings with an aggregate principal amount of RMB540,000,000 (2021: RMB840,000,000) from subsidiaries of Zheneng Group, namely Zhejiang Provincial Energy Group Finance Co., Ltd. (2021: Zhejiang Provincial Energy Group Finance Co., Ltd. and Shanghai Puneng Finance Leasing Co., Ltd.).

Included in the borrowings of the Group and Company as at 31 December 2022 is an amount of RMB1,224,480,000 (2021: RMB1,312,828,000) under a syndicated term loan facility arranged by Standard Chartered Bank (Hong Kong) Limited ("the Agent") of up to US\$270,000,000 (the "Facility"), which requires that Zheneng Group maintains more than 25% shareholding interest in the Company. The borrowings of RMB1,224,480,000 are due for repayment by July 2023 and had been fully classified as current liabilities as at 31 December 2022. The Company fully repaid the outstanding balance of RMB1,224,480,000 by the end of February 2023.

Before the full repayment, under the terms of the Facility, the Company has to ensure that the ratio of its consolidated net debt to consolidated total equity does not exceed 125% for the period from 1 January 2021 to 31 December 2021 and 100% for the period from 1 January 2022 to 31 December 2022 ("Financial Covenant"). The aforesaid ratio had exceeded 125% and 100% respectively for the financial year ended 31 December 2021 and 31 December 2022 resulting in non-compliance by the Company of the Financial Covenant. Due to the non-compliance of the Financial Covenant, the banks are contractually entitled to request for immediate repayment of the outstanding borrowing with covenant breaches. Accordingly, as of 31 December 2021, the non-current portion of the borrowings with covenant breaches of the Group and the Company amounting to RMB1,184,000,000 and RMB1,114,002,000 respectively were reclassified as current liabilities. Under the terms of the Facility, the Agent of the Facility may, at its discretion and if so directed by lenders representing two-thirds of the total commitments under the Facility, by notice call for repayment ahead of the stipulated repayment dates.



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### 28. BORROWINGS AND LEASE LIABILITIES (CONTINUED)

The ranges of effective interest rates on the Group's and Company's borrowings are as follows:

	Group		Company	
	2022	2022 2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Effective interest rate:				
- Fixed-rate borrowings	1.7% to	0.9% to	_	0.9% to
	4.25%	5.30%		3.50%
- Variable-rate borrowings	3.25% to	2.86% to	3.5% to	2.86% to
	6.76%	6.54%	6.76%	2.90%

Reconciliation of liabilities arising from financing activities.

The table below details changes in the Group's liabilities arising from financing activities. Liabilities arising from financing activities are those for which cash flows were, or future cash flows will be, classified in the Group's consolidated statement of cash flows as cash flows from financing activities.

	1 January 2022 RMB'000	Financing cash flows RMB'000	Other changes <sup>(1)</sup> RMB'000	Exchange difference RMB'000	31 December 2022 RMB'000
Borrowings	10,481,383	54,146	506,863	203,763	11,246,155
Lease liabilities	7,492	(5,216)	182		2,457
	10,488,875	48,930	507,045	203,763	11,248,612
	1 January 2021 RMB'000	Financing cash flows RMB'000	Other changes <sup>(1)</sup> RMB'000	Exchange difference RMB'000	31 December 2021 RMB'000
Borrowings Lease liabilities	8,679,340 44,676	1,401,255 (37,748)	454,513 564	(53,725)	10,481,383 7,492
	8,724,016	1,363,507	455,077	(53,725)	10,488,875

#### (1) Other changes include interest accruals

The cash flows make up the net amount of proceeds and repayments of the financial liabilities presented under the financing activities in the statement of cash flows.



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### 29. DEFERRED INCOME TAXES

	Undistributed earnings of PRC subsidiaries RMB'000	Fair value adjustment on acquisition of subsidiaries RMB'000	Accelerated tax depreciation RMB'000	Profit recognised on construction services provided under service concession arrangements RMB'000	Total RMB'000
At 1 January 2021 Charge/(credit) to profit or	59,731	3,882	264,350	214,429	542,392
loss (Note 11)		(134)	30,449	46,246	76,561
At 31 December 2021 Charge/(credit) to profit or	59,731	3,748	294,799	260,675	618,953
loss (Note 11)		(105)	51,118	31,559	82,572
At 31 December 2022	59,731	3,643	345,917	292,234	701,525

At 31 December 2022, the Group has unused tax losses of approximately RMB749,559,000 (2021: RMB754,036,000), available for offset against future profits. No deferred tax asset has been recognised in respect of those tax losses due to no certainty of the tax losses being utilised.

The unrecognised tax losses will expire in the following years:

	Gro	oup
	2022	2021
	RMB'000	RMB'000
2022	-	20,384
2023	28,730	81,281
2024	95,406	135,519
2025	195,542	330,099
2026	186,668	186,753
2027	243,213	_
	749,559	754,036

At 31 December 2022, the Group has deductible temporary differences of RMB206,228,000 (2021: RMB187,571,000). No deferred tax asset has been recognised in relation to such deductible temporary differences due to uncertainty of the deductible temporary differences being utilised.

At 31 December 2022, temporary differences associated with undistributed earnings of subsidiaries for which deferred tax liabilities have not been recognised are RMB5,640,236,000 (2021: RMB5,016,030,000). No liability has been recognised in respect of these differences because the Group is in a position to control the timing of the reversal of the temporary differences, and it is probable that such differences will not reverse in the foreseeable future.



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#### **30. SHARE CAPITAL**

	Group an Number of ordinary shares '000	d Company Share capital RMB'000
As at 1 January 2021 Issued during the year	1,454,025	96
At 31 December 2021 Issued during the year	1,454,025	96
At 31 December 2022	1,454,025	96

Fully paid ordinary shares have a par value of US\$0.00001 (2021: US\$0.00001), carry one vote per share and carry a right to dividend, amounting to equivalent RMB96,000 (2021: RMB96,000).

### **31. OTHER RESERVES**

	Group		Company	
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Capital reserve (i)	393,694	393,694	1,057,112	1,057,112
Merger reserve (ii)	(67,642)	(67,642)	-	_
Statutory surplus reserve (iii)	234,282	191,243	-	_
Foreign currency translation reserve (iv)	(67,689)	(57,577)	-	_
Other reserve (v)	56,172	56,172	-	
	548,817	515,890	1,057,112	1,057,112

Other reserves are non-distributable.

#### (i) Capital reserve

	Group		Company	
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Beginning and end of financial year	393,694	393,694	1,057,112	1,057,112

The Group's capital reserve represents deemed capital contribution. The Company's capital reserve represents waiver of debts by its subsidiaries and deemed capital contribution.

(ii) Merger reserve

	Gro	oup
	2022	2021
	RMB'000	RMB'000
Beginning and end of financial year	(67,642)	(67,642)



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### 31. OTHER RESERVES (CONTINUED)

#### (ii) Merger reserve (Continued)

Merger reserves represents the differences between the existing book values of the net assets of the subsidiaries under common control and the consideration paid when the Group acquired subsidiaries from the then ultimate holding company or ultimate shareholder using the merger accounting method.

#### (iii) Statutory surplus reserve

	Group	
	2022	2021
	RMB'000	RMB'000
Beginning of financial year	191,243	155,288
Appropriation to reserves	43,039	35,955
End of financial year	234,282	191,243

Pursuant to the relevant laws and regulations in the PRC and the Articles of Association of the subsidiaries established in PRC, the PRC subsidiaries are required to transfer at least 10% of their profit after tax to a statutory surplus reserve before distributing dividends to equity holders, until the balance reaches 50% of their respective registered capital, where further transfers will be at their directors' recommendation. The statutory surplus reserve can only be used to make up prior year losses or to increase share capital.

#### (iv) Foreign currency translation reserve

	Group	
	2022	2021
	RMB'000	RMB'000
Beginning of financial year	(57,577)	(46,405)
Other comprehensive income	(10,112)	(11,172)
End of financial year	(67,689)	(57,577)

Foreign currency translation reserve represents exchange differences arising from the translation of the financial statements of foreign operations whose functional currencies are different from that of the Group's presentation currency.

(v) Other reserve

	Group	
	2022	2021
	RMB'000	RMB'000
Beginning and end of financial year	56,172	56,172

Other reserve represents the difference between the carrying amount of the non-controlling interest and the consideration arising from equity transactions with the non-controlling shareholders without loss of control in the subsidiaries by the Group.





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#### 32. DEFERRED GRANT

	Group	
	2022	2021
	RMB'000	RMB'000
Grant received in advance	375,874	381,085
Analysed as:		
- Current liabilities	18,359	17,065
– Non-current liabilities	357,515	364,020
	375,874	381,085

Assets related grants are recognised over the estimated useful lives of the related assets. Please refer to Note 7(i) for details of such grants.

### 33. PROVISION FOR MAJOR OVERHAULS

Pursuant to the service concession agreements, the Group has contractual obligations to maintain the facilities to a specified level of serviceability and/or to restore the plants to a specified condition before they are handed over to the grantors at the end of the service concession periods. These contractual obligations except for any upgrade element, are recognised and measured at the best estimate of the expenditure that would be required to settle the present obligation at the end of the reporting period. The future expenditure on these maintenance and restoration costs is collectively referred to as "major overhauls". The estimation basis is reviewed on an ongoing basis, and revised where appropriate.

Movements in provision and the balances of the liabilities for major overhauls are as follows:

	Group	
	2022	2021
	RMB'000	RMB'000
Beginning of financial year	24,826	23,053
Provision made during the year	3,599	1,773
End of financial year	28,425	24,826

#### 34. COMMITMENTS

#### Capital commitments

Capital expenditures contracted for at the balance sheet date but not recognised in the financial statements, excluding those relating to investments in associates (Note 20) and investments in joint ventures (Note 21), are as follows:

	Gr	oup
	2022	2021
	RMB'000	RMB'000
Property, plant and equipment	253,393	816,755



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### 35. FINANCIAL RISK MANAGEMENT

#### Financial risk factors

The Group's activities expose it to market risk (including currency risk and interest rate risk), credit risk and liquidity risk. The Group's overall risk management strategy seeks to minimise any adverse effects from the unpredictability of financial markets on the Group's financial performance. The Group's risk management policies and guidelines are set to monitor and control the potential material adverse impact of these exposures. The Board of Directors is responsible for setting the objectives and underlying principles of financial risk management for the Group.

#### (a) Market risk

(i) Currency risk

The Group collects most of its revenue and incurs most of its expenditures in RMB. Cash and cash equivalents of the Group are mainly denominated in RMB and United States Dollar ("USD"). The Group currently does not have a foreign currency hedging policy as management considers the foreign exchange risk exposure of the Group to be limited. However, the Group monitors currency risk exposure by periodically reviewing foreign currency exchange rates and will consider hedging significant foreign currency exposure should the need arise.

The carrying amounts of the Group's and Company's monetary assets and liabilities which are significant at the reporting date that are denominated in currencies other than the respective functional currency of the group entities are as follows:

	Group		Company		
	2022 2021		2022	2021	
	RMB'000	RMB'000	MB'000 RMB'000 RMB		
Financial assets					
USD	112,114	106,548	97,664	95,036	
Financial liabilities					
USD	2,473,532	2,159,512	2,321,662	2,019,870	



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#### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (a) Market risk (Continued)

(i) Currency risk (Continued)

#### Sensitivity analysis

The following table details the Group's and Company's sensitivity to a 10% increase and decrease in the RMB against the relevant foreign currencies. 10% is the sensitivity rate used when reporting foreign currency risk internally to key management personnel and represents management's assessment of the reasonably possible change in foreign exchange rates. The sensitivity analysis includes only outstanding foreign currency denominated monetary items and adjusts their translation at the period end for a 10% change in foreign currency rates.

If the relevant foreign currency weakens by 10% against the functional currency of each group entity, profit before tax will increase/(decrease) by:

	Group		Company		
	2022 2021		2022	2021	
	RMB'000	RMB'000	RMB'000 RMB		_
_	236,142	205,296	222,400	192,483	_

If the relevant foreign currency strengthens by 10% against the functional currency of each group entity, profit before tax will decrease/(increase) by the same amount above.

#### (ii) Interest rate risk

Interest rate risk is the risk that the fair value or future cash flows of the Group's and Company's financial instruments will fluctuate because of changes in market interest rates. The Group's exposure to fair value interest rate risk related primarily to its fixed-rate borrowings and lease liabilities (Note 28). The Group's exposure to cash flow interest rate risk relates primarily to its variable-rate borrowings (Note 28).

The Group and Company currently do not have a specific policy to manage its interest rate risk and has not entered into any interest rate swaps to hedge against the exposure. However, the Group and Company will monitor the interest rate exposure and manage interest cost using a mix of fixed and variable-rate debts.



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (a) Market risk (Continued)

(ii) Interest rate risk (Continued)

#### Sensitivity analysis

The sensitivity analyses below have been prepared based on the exposure to interest rates for the variable-rate borrowings and bank balances at the end of the reporting period and the stipulated change taking place at the beginning of the year and held constant throughout the reporting period in the case of instruments that have floating rates. A 50 basis point increase or decrease represents management's assessment of the reasonably possible change in interest rates on variable-rate borrowings.

If interest rates had been 50 basis points higher/lower, the decrease/increase on profit before tax will be:

	Gro	Group		pany
	2022	2022 2021		2021
	RMB'000	RMB'000	RMB'000	RMB'000
Profit before tax	51,608	41,978	11,564	6,691

#### (b) Credit risk

The Group's maximum exposure to credit risk which will cause a financial loss to the Group due to failure to discharge an obligation by the counterparties of the Group is arising from the carrying amounts of the respective recognised financial assets as stated in the consolidated statement of financial position.

The Group has adopted a policy of only dealing with creditworthy counterparties as a means of mitigating the risk of financial loss from defaults. Customers of the Group mainly consists of regional state-owned grid companies, local government and certain manufacturing companies whose production relies on the supply of electricity and steam by the Group. In this regard, management considers the Group's credit risk is significantly reduced.

As at 31 December 2022, the Group has trade balances due from 3 third-party customers (2021: 4) who individually accounted for 5% or more of the total balance of trade receivables amounted to RMB471,928,000 (2021: RMB687,033,000).

As at 31 December 2022, the Group has trade balances due from 5 related parties (2021: 3 related parties) who individually accounted for 5% or more of the total balance of trade receivables amounted to RMB10,740,000 (2021: RMB164,106,000).



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (b) Credit risk (Continued)

The Company does not have any significant credit risk exposure to any single counterparty or any group of counterparties having similar characteristics except that the Company has significant non-trade receivables from 12 subsidiaries (2021: 10 subsidiaries) amounting to RMB2,995,972,000 (2021: RMB2,116,567,000) as at 31 December 2022. This represents advances made to the subsidiaries for purpose of capital expenditure fundings and working capital to other subsidiaries of the Group. Other than the above, there are no other significant receivables in the Company as at 31 December 2022 and 2021.

Receivables under service concession arrangements relate to consideration recoverable from certain governing bodies and agencies of the government of the PRC in respect of construction of WTE plants and are generally considered as having low risk of default.

#### Trade receivables and trade related amounts due from related parties and non-controlling interests

Loss allowance for trade receivables and trade related amounts due from related parties and non-controlling interests have been measured at an amount equal to lifetime ECL. Trade and bill receivables are mainly amounts due from local electrical power grid companies and local government sectors for the sale of electricity and waste treatment. Trade related amounts due from related parties and non-controlling interests are mainly from waste-to-energy project construction and operation business.

The ECL on trade balances are estimated by reference to past default experience of the debtor and an analysis of the debtor's current financial position, adjusted for factors that are specific to the debtors, general economic conditions of the industry in which the debtors operate and an assessment of both the current as well as the forward-looking macroeconomic factors affecting the ability of the debtors to settle the receivables.

There has been no change in the estimation techniques or significant assumptions made during the current reporting period.

A trade receivable is written off when there is information indicating that the debtor is in severe financial difficulty and there is no realistic prospect of recovery, e.g. when the debtor has been placed under liquidation or has entered into bankruptcy proceedings.

None of the trade receivables that have been written off are subject to enforcement activities.



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (b) Credit risk (Continued)

# Trade receivables and trade related amounts due from related parties and non-controlling interests (Continued)

The following is an aged analysis of trade receivables and bills receivable due from third parties at the end of the reporting period, net of loss allowance for trade and bill receivables:

	Group		
	2022	2021	
	RMB'000	RMB'000	
Current	1,676,550	1,628,741	
Within 60 days	57,863	48,813	
60 days to 90 days	30,314	37,883	
90 days to 120 days	24,378	27,949	
Over 120 days	240,765	236,396	
	2,029,870	1,979,782	

The following is an aged analysis of trade receivables due from related parties at the end of the reporting period:

	2022 RMB'000	2021 RMB'000
Current	10,864	92,194
0 to 90 days	782	2,078
91 to 120 days	1,644	6,259
Over 120 days	7,106	107,725
	20,396	208,256

For the financial years ended 31 December 2022 and 2021, the trade receivables have been assessed based on lifetime ECL and loss allowance was recognised for trade receivables that are credit impaired.

#### Other receivables and non-trade related amounts due from related parties and non-controlling interests

For purpose of impairment assessment, other receivables and non-trade related amounts due from related parties and non-controlling interests are considered to have low credit risk as they are not due for payment at the end of the reporting period and there has been no significant increase in the risk of default on the receivables since initial recognition.

In determining the ECL, management has estimated the loss allowance on other receivables and non-trade related amounts due from related parties and non-controlling interests at an amount equal to 12-month ECL, taking into account the historical default experience and the financial position of the counterparties, adjusted for factors that are specific to the debtors and general economic conditions of the industry in which the debtors operate, in estimating the probability of default of each these financial assets and the loss upon default.



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (b) Credit risk (Continued)

There has been no change in the estimation techniques or significant assumptions made during the current reporting period in assessing the loss allowance for other receivables.

For the financial years ended 31 December 2022 and 2021, other receivables and non-trade related amounts due from related parties and non-controlling interests have been assessed based on 12-month ECL individually and are not credit impaired.

The Group's and the Company's credit risk on cash and cash equivalents and pledged bank deposits is limited because the counterparties are banks with good reputation.

The Group develops and maintains its credit risk grading to categorise exposures according to their degree of risk of default. The Group uses its trading records to rate its major customers and other debtors. The Group does not hold any collateral to cover its credit risks associated with its financial assets.

Category	Description	Basis for recognising ECL
Performing	The counterparty has a low risk of default and does not have any past-due amounts.	12-month ECL
Doubtful	Amount is more than 90 days past due for corporate/ individual debtors, more than 180 days past due for amounts due from related parties and more than 3 years past due for government debtors or there has been a significant increase in credit risk since initial recognition.	Lifetime ECL – not credit- impaired
In default	Amount is more than 1 year past due for corporate/ individual debtors, more than 2 years past due for amounts due from related parties and more than 5 years past due for government debtors or there is evidence indicating the asset is credit impaired.	Lifetime ECL – credit- impaired
Write-off	There is evidence indicating that the debtor is in severe financial difficulty and the Group has no realistic prospect of recovery.	Amount is written off

The Group's current credit risk framework comprises the following categories:

The movements in credit loss allowance are as follows:

	Trade receivables RMB'000	Other receivables RMB'000	Total RMB'000
Group 2022			
Beginning of financial year Loss allowance recognised in profit or loss	30,908	42,356	73,264
during the year	765	_	765
End of financial year	31,673	42,356	74,029



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (b) Credit risk (Continued)

	Trade receivables RMB'000	Other receivables RMB'000	Total RMB'000
2021			
Beginning of financial year	24,990	31,457	56,447
Loss allowance recognised in profit or loss during the			
year	5,918	10,899	16,817
End of financial year	30,908	42,356	73,264

The assessment of the credit quality and exposure to credit risk of the Group's and Company's trade and other receivables, amounts due from non-controlling interests, related parties, service concession receivables and contract assets have been disclosed in Notes 14, 16, 17 and 4 to the financial statements respectively. The tables below detail the credit quality of the Group's financial assets and contract assets, as well as maximum exposure to credit risk by credit risk rating grades:

				Gross		
		Internal	12-month or	carrying	Loss	Net carrying
	Note	credit rating	lifetime ECL	amount	allowance	amount
Group				RMB'000	RMB'000	RMB'000
2022						
Trade and bills receivables	14	(i)	Lifetime ECL (simplified approach)	2,061,543	(31,673)	2,029,870
Other receivables	14	Performing	12-month ECL	367,696	(42,356)	325,340
Trade amounts due from non-controlling interests	14	(i)	Lifetime ECL (simplified approach)	13,773	_	13,773
Non-trade amounts due from non-controlling interest	14	Performing	12-month ECL	11,030	_	11,030
Trade amounts due from related parties	16	(i)	Lifetime ECL (simplified approach)	20,396	_	20,396
Non-trade amounts due from related parties	16	Performing	12-month ECL	228,278	_	228,278
Service concession receivables	17	Performing	12-month ECL	811,461	_	811,461
					(74,029)	_
Company 2022						_
Amount due from subsidiaries	14	Performing	12-month ECL	2,995,972	-	2,995,972



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

### (b) Credit risk (Continued)

Group	Note	Internal credit rating	12-month or lifetime ECL	Gross carrying amount RMB'000	Loss allowance RMB'000	Net carrying amount RMB'000
2021						
Trade and bills receivables	14	(i)	Lifetime ECL (simplified approach)	2,010,690	(30,908)	1,979,782
Other receivables	14	Performing	12-month ECL	406,102	(42,356)	363,746
Trade amounts due from non-controlling interests	14	(i)	Lifetime ECL (simplified approach)	14,866	_	14,866
Non-trade amounts due from non-controlling interest	14	Performing	12-month ECL	11,030	_	11,030
Trade amounts due from related parties	16	(i)	Lifetime ECL (simplified approach)	208,256	_	208,256
Non-trade amounts due from related parties	16	Performing	12-month ECL	510,720	_	510,720
Contract assets	4	(i)	Lifetime ECL (simplified approach)	17,832	_	17,832
Service concession receivables	17	Performing	12-month ECL	800,408	_	800,408
					(73,264)	-
Company 2021						
Amount due from subsidiaries	14	Performing	12-month ECL	2,116,567	_	2,116,567

(i) For trade related balances and contract assets, the Group has applied the simplified approach in IFRS 9 to measure the loss allowance at lifetime ECL. The Group determines the ECL on these items based on historical credit loss experience based on the past due status of the debtors, adjusted as appropriate to reflect current conditions and estimates of future economic conditions. Notes 14, 15, 16 and 4 includes further details on the loss allowance for these receivables and contract assets.



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

#### (c) Liquidity risk

To manage the liquidity risk, the Group and the Company maintain a level of cash and cash equivalents considered adequate by management to finance the Group's and the Company's operations. Management monitors the level of bank borrowings and ensures compliance with loan undertakings. The Group and the Company also rely on borrowings and amounts due to related parties for liquidity requirements. The directors believe the Group and the Company have sufficient resources to continue its operational existence for the foreseeable future.

#### Liquidity and interest risk tables

The following table details the Group's and Company's remaining contractual maturity for its financial liabilities as at the end of the reporting period. The table has been drawn up based on the undiscounted cash flows of financial liabilities based on the earliest date on which the Group can be required to pay. The table includes both interest and principal cash flows. The undiscounted cash flows column represents the possible future cash flows attributable to the instrument included in the maturity analysis which is not included in the carrying amount of the financial liability on the statement of financial position.

Group	Weighted average effective interest rate %	On demand, or less than 1 year RMB'000	1 – 5 years RMB'000	>5 years RMB'000	Undiscounted cash flows RMB'000	Carrying amount closing balance RMB'000
2022						
Non-derivative financial liabilities						
Trade and other payables*	-	1,950,627	-	-	1,950,627	1,950,627
Amounts due to related parties	-	37,405	-	-	37,405	37,405
Borrowings	4.65	5,108,331	4,464,094	3,173,654	12,746,079	11,246,155
Lease liabilities	4.63	2,495	-	-	2,495	2,457
		7,098,858	4,464,094	3,173,654	14,736,606	13,236,644
2021						
Non-derivative financial liabilities						
Trade and other payables*	_	2,042,165	-	-	2,042,165	2,042,165
Amounts due to related parties	_	55,680	-	_	55,680	55,680
Borrowings	4.63	3,930,789	6,174,653	1,587,806	11,693,248	10,481,383
Lease liabilities	4.85	5,218	2,495	-	7,713	7,492
		6,033,852	6,177,148	1,587,806	13,798,806	12,586,720

\* includes trade payables, bills payables. construction and equipment payables, accrued payroll and welfare, accrued expenses, other payables



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

### (c) Liquidity risk (Continued)

Company	Weighted average effective interest rate %	On demand, or less than 1 year RMB'000	1 – 5 years RMB'000	>5 years RMB'000	Undiscounted cash flows RMB'000	Carrying amount closing balance RMB'000
2022						
Non-derivative financial liabilities						
Other payables	_	22,685	-	-	22,685	22,685
Amounts due to subsidiaries	_	738,645	-	-	738,645	738,645
Borrowings	5.47	1,991,539	381,797	_	2,373,336	2,312,846
		2,752,869	381,797	-	3,134,666	3,074,176
2021						
Non-derivative financial liabilities						
Other payables	_	10,505	_	_	10,505	10,505
Amounts due to subsidiaries	_	85,884	_	_	85,884	85,884
Borrowings	2.47	938,574	1,138,470	-	2,077,044	2,014,633
		1,034,963	1,138,470	_	2,173,433	2,111,022

### (d) Capital risk

The Group's objectives when managing capital are to safeguard the Group's ability to continue as a going concern and to maintain an optimal capital structure so as to maximise shareholder value. In order to maintain or achieve an optimal capital structure, the Group may adjust the amount of dividend payments, return capital to shareholders, issue new shares, obtain new borrowings or sell assets to reduce borrowings. The Group's and the Company's current strategy remains unchanged from the previous financial year.

The Group monitors capital based on a net debt to total equity ratio. The net debt to total equity ratio is calculated as net debt divided by total equity. Net debt is calculated as total borrowings less cash and cash equivalents and pledged bank deposits for borrowings. Total equity comprises share capital, share premium, other reserves, retained profits/(accumulated losses) and non-controlling interests.

	Group 31 December			pany cember
	2022 RMB'000	2021 RMB'000 (Restated)	2022 RMB'000	2021 RMB'000
Net debt Total equity	9,514,679 6,874,707	9,388,692 6,538,487	2,301,223 1,823,556	1,998,911 1,906,267
Net debt to equity ratio	138%	144%	126%	105%



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### 35. FINANCIAL RISK MANAGEMENT (CONTINUED)

### (d) Capital risk (Continued)

Under the terms of the Facility, as of 31 December 2022, the group is required to comply with the following financial covenants:

- Net debt to equity ratio shall not at any time exceed 100% (2021: 125%);
- Earnings before interest and tax expense, depreciation and amortisation to interest expense ratio shall not less than 2.75 times (2021: 2.75 times); and
- Tangible net worth shall not be less than RMB5,500,000,000 (2021: RMB5,500,000,000).

Except for the borrowing facilities which require the fulfilment of covenants relating to certain of the Group's financial ratios as disclosed in Note 28, the Group and the Company are in compliance with all externally imposed capital requirements for the financial years ended 31 December 2022 and 2021.

#### (e) Fair value measurements

The fair value of financial assets and financial liabilities are determined in accordance with generally accepted pricing models based on discounted cash flow analysis or using prices or rates from observable current market transactions as input.

Management considers the carrying amounts of the financial assets and financial liabilities recorded at amortised cost in the consolidated financial statements approximate their fair values at the end of the reporting period.

The carrying amount of the different categories of financial instruments are as follows:

	Group 31 December		Company	
			31 Dec	ember
	2022	2021	2022	2021
	RMB'000	RMB'000	RMB'000	RMB'000
Financial assets at amortised cost	5,348,242	5,094,843	3,094,413	2,213,970
Financial liabilities at amortised cost	13,241,764	12,591,227	3,074,176	2,111,022



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### **36. SEGMENT INFORMATION**

The Group's management includes the Executive Directors, the Chief Financial Officer, and the leaders of each business unit. The Group's management has reviewed and approved reports from the Group's business unit, which are used to determine the operating segments, make strategic decisions, allocate resources and assess performance.

The Group's management considers the business from a business segment perspective. Specifically, the group's reportable segment and operating segments are as follows:

- (i) Waste-to-energy project construction and operation comprise sales of electricity and steam, waste treatment, construction services provided and financial income under service concession.
- (ii) Project technical and management service, equipment selection and sale and EMC business comprise service income.

#### (a) Segment revenue and profit

The following is an analysis of the Group's revenue and results from continuing operations by reportable and operating segment:

2022	Waste-to- energy project construction and operation RMB'000	Project technical and management service, equipment selection and sale and EMC business RMB'000	Total RMB'000
Segment revenue			
External revenue – non-related parties	3,972,028	92,643	4,064,671
External revenue – related parties (Note 4)	1,043	8,141	9,184
Inter-segment revenue		356,798	356,798
	3,973,071	457,582	4,430,653
Elimination		(356,798)	(356,798)
Revenue	3,973,071	100,784	4,073,855
Segment profit	1,135,071	22,684	1,157,755
Government grants and value added tax refund	82,241	1,787	84,028
Loss on disposal of property, plant and equipment	(651)	-	(651)
Gain on disposal of shares of an associate			421
Foreign exchange losses			(195,414)
Other income			103,597
Administrative expenses			(248,122)
Loss allowance recognised on financial assets Finance costs			(765)
Share of loss of associates			(417,443)
Share of profit of joint ventures			(38) 2,891
Profit before tax		-	486,259
ι τοπι μετοτε ίαλ			400,209



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### 36. SEGMENT INFORMATION (CONTINUED)

### (a) Segment revenue and profit (Continued)

2021	Waste-to- energy project construction and operation RMB'000 (Restated)	Project technical and management service, equipment selection and sale and EMC business RMB'000	Total RMB'000 (Restated)
Segment revenue			
External revenue – non-related parties External revenue – related parties (Note 4) Inter-segment revenue	3,637,034 2,988 	400,218 60,858 503,858	4,037,252 63,846 503,858
	3,640,022	964,934	4,604,956
Elimination		(503,858)	(503,858)
Revenue	3,640,022	461,076	4,101,098
Segment profit	968,003	78,103	1,046,106
Government grants and value added tax refund	60,264	1,716	61,980
Loss on disposal of property, plant and equipment	(444)	_	(444)
Other gains relating to closure of WTE plant	2,750	_	2,750
Impairment loss on intangible assets	(30,202)	_	(30,202)
Impairment loss on prepayments	(71)	_	(71)
Loss on disposal of shares of joint venture			(556)
Administrative expenses			(233,372)
Foreign exchange gains Other income			42,059 79,603
Loss allowance recognised on financial assets			(16,817)
Finance costs			(361,676)
Share of loss of associates			(534)
Share of loss of joint ventures			(11,931)
Profit before tax			576,895



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### 36. SEGMENT INFORMATION (CONTINUED)

### (b) Segment assets

The following is an analysis of the Group's assets by reportable and operating segment.

	Waste-to- energy project construction and operation RMB'000	Project technical and management service, equipment selection and sale and EMC business RMB'000	Total RMB'000
<b>2022</b> Segment assets Unallocated	18,006,210	697,781	18,703,991 2,768,900
Consolidated total assets			21,472,891
<b>2021 (restated)</b> Segment assets Unallocated Consolidated total assets	16,536,928	1,593,395	18,130,323 2,243,999 20,374,322

All assets are allocated to reportable segments other than investments in joint ventures and associates, other tax recoverable, pledged bank deposits, cash and cash equivalents and the non-trade related balances due from related parties and non-controlling interests.





For the financial year ended 31 December 2022

### 36. SEGMENT INFORMATION (CONTINUED)

### (c) Segment liabilities

The following is an analysis of the Group's liabilities by reportable and operating segment.

	Waste-to- energy project construction and operation RMB'000	Project technical and management service, equipment selection and sale and EMC business RMB'000	Total RMB'000
<b>2022</b> Segment liabilities Unallocated Consolidated total liabilities	13,005,918	674,232	13,680,150 918,034 14,598,184
<b>2021</b> Segment liabilities Unallocated Consolidated total liabilities	11,938,893	1,046,589	12,985,482 850,353 13,835,835

All liabilities are allocated to reportable segments other than income tax liabilities, other tax liabilities, deferred tax liabilities and the non-trade related balances due to related parties.

### (d) Information about major customers

#### Waste-to-energy project construction and services

Customers of the Group mainly consist of regional state-owned grid companies, local government environmental sectors and certain manufacturing companies whose production relies on the supply of electricity and steam by the Group.

In 2022 and 2021, no single customer accounted for 10% or more of the Group's revenue.

Project technical and management services, equipment selection and sale and EMC business

In 2022 and 2021, no single customer accounted for 10% or more of the Group's revenue.



For the financial year ended 31 December 2022

### **37. COMPARATIVE INFORMATION**

#### Change in classification

Certain financial statement line items from prior year have been grouped together to simplify the current year's consolidated statement of financial position of the Group and statement of financial position of the Company. Reclassifications have been made to the prior year's financial statements to enhance comparability with current year's financial statements. As a result, certain line items have been amended on the face of the consolidated statement of financial position of the Group and statement of financial position of the Company. Comparative figures have been adjusted to conform with current year's presentation as follows:

	2021 As previously reported RMB'000	Reclassification	2021 As currently reported RMB'000
<u>Group</u> Consolidated Statement of Financial Position			
Current assets:			
Trade and other receivables	2,438,221	430,278	2,868,499
Amounts due from non-controlling interests	25,896	(25,896)	_
Contract assets	17,832	(17,832)	_
Other tax recoverable	386,550	(386,550)	-
Current liabilities:			
Trade and other payables	2,077,756	82,668	2,160,424
Amounts due to non-controlling interests	4,507	(4,507)	-
Deferred grant	17,065	(17,065)	_
Other tax liabilities	61,096	(61,096)	_
Borrowings and lease liabilities	_	4,711,448	4,711,448
Borrowings	4,706,413	(4,706,413)	-
Lease liabilities	5,035	(5,035)	-
Non-current liabilities:			
Trade and other payables	_	364,020	364,020
Deferred grant	364,020	(364,020)	_
Borrowings and lease liabilities	_	5,777,427	5,777,427
Borrowings	5,774,970	(5,774,970)	-
Lease liabilities	2,457	(2,457)	_



For the financial year ended 31 December 2022

### 37. COMPARATIVE INFORMATION (CONTINUED)

### Change in classification (Continued)

	2021 As previously reported RMB'000	/ Reclassification	2021 As currently reported RMB'000
Company Statement of Financial Position			
Non-current assets:			
Other receivables	_	2,116,567	2,116,567
Amount due from subsidiaries	2,116,567	(2,116,567)	_
Current liabilities:			
Trade and other payables	10,505	85,884	96,389
Amount due to subsidiaries	85,884	(85,884)	_
Borrowings and lease liabilities	_	2,014,633	2,014,633
Borrowings	2,014,633	(2,014,633)	_
	2021		2021
	As previously	/	As currently
	reported RMB'000	Reclassification	reported RMB'000
Group			
Consolidated Statement of Cash Flows			
Cash flows from operating activities			
Change in working capital			
- Trade and other receivables	(680,025)	14,179	(665,846)
<ul> <li>Trade and other receivables</li> <li>Contract assets</li> </ul>	(680,025) 63,708	14,179 (63,708)	(665,846)
<ul> <li>Contract assets</li> <li>Other tax recoverable</li> </ul>	· · · · · · · · · · · · · · · · · · ·	(63,708) 55,747	(665,846) _ _
<ul> <li>Contract assets</li> <li>Other tax recoverable</li> <li>Amount due from non-controlling interests</li> </ul>	63,708	(63,708) 55,747 (6,218)	(665,846) _ _ _
<ul> <li>Contract assets</li> <li>Other tax recoverable</li> <li>Amount due from non-controlling interests</li> <li>Trade and other payables</li> </ul>	63,708 (55,747) 6,218 310,519	(63,708) 55,747 (6,218) 37,035	(665,846) - - 347,554
<ul> <li>Contract assets</li> <li>Other tax recoverable</li> <li>Amount due from non-controlling interests</li> </ul>	63,708 (55,747) 6,218	(63,708) 55,747 (6,218)	- - -

These amounts are reclassifications within the statement of financial position and statement of cash flows and do not have any effect on the statement of comprehensive income for the year ended 31 December 2021. The third statement of financial position at the beginning the preceding reporting year is not presented because above reclassification have no material effect on the information in the statement of financial position at the beginning of the preceding period.



For the financial year ended 31 December 2022

### 38. NEW OR REVISED ACCOUNTING STANDARDS AND INTERPRETATIONS

Below are the mandatory standards, amendments and interpretations to existing standards that have been published, and are relevant for the Group's accounting periods beginning on or after 1 January 2023 and which the Group has not early adopted.

**Amendments to IAS 1 Presentation of Financial Statements:** Classification of Liabilities as Current or Noncurrent (effective for annual periods beginning on or after 1 January 2024)

The narrow-scope amendments to IAS 1 Presentation of Financial Statements clarify that liabilities are classified as either current or non-current, depending on the rights that exist at the end of the reporting period.

Classification is unaffected by the expectations of the entity or events after the reporting date (e.g. the receipt of a waiver or a breach of covenant). The amendments also clarify what IAS 1 means when it refers to the 'settlement' of a liability.

The amendments could affect the classification of liabilities, particularly for entities that previously considered management's intentions to determine classification and for some liabilities that can be converted into equity.

The Group does not expect any significant impact arising from applying these amendments.

**Amendments to IAS 12 Income Taxes:** Deferred Tax related to Assets and Liabilities arising from a Single Transaction (effective for annual periods beginning on or after 1 January 2023)

The amendments to IAS 12 Income Taxes require companies to recognise deferred tax on transactions that, on initial recognition, give rise to equal amounts of taxable and deductible temporary differences. They will typically apply to transactions such as leases of lessees and decommissioning obligations, and will require the recognition of additional deferred tax assets and liabilities.

The amendment should be applied to transactions that occur on or after the beginning of the earliest comparative period presented. In addition, entities should recognise deferred tax assets (to the extent that it is probable that they can be utilised) and deferred tax liabilities at the beginning of the earliest comparative period for all deductible and taxable temporary differences associated with:

- \* Right-of use assets and lease liabilities, and
- \* Decommissioning, restoration and similar liabilities, and the corresponding amounts recognised as part of the cost of the related assets.



For the financial year ended 31 December 2022

# 38. NEW OR REVISED ACCOUNTING STANDARDS AND INTERPRETATIONS (CONTINUED)

The cumulative effect of recognising these adjustments recognised in retained earnings, or another component of equity, as appropriate.

IAS 12 did not previously address how to account for the tax effects of on-balance sheet leases and similar transactions and various approaches were considered acceptable. Some entities may have already accounted for such transactions consistent with the new requirements. These entities will not be affected by the amendments.

The Group does not expect any significant impact arising from applying these amendments.

### **39. AUTHORISATION OF FINANCIAL STATEMENTS**

These financial statements were authorised for issue in accordance with a resolution of the Board of Directors of Zheneng Jinjiang Environment Holding Company Limited on 6 April 2023.



## Statistics of Shareholdings

As at 17 March 2023

Class of shares Authorised share capital	:	Ordinary shares of US\$0.00001 each US\$50,000.00 divided into 5,000,000,000 ordinary shares of par value US\$0.00001 each
Issued and fully paid-up capital Number of Ordinary Shares issued Voting rights		Aggregate of US\$10,000, RMB748,000,000 and S\$316,380,235 1,454,024,700 One vote per share

The Company has no treasury shares and subsidiary holdings.

### **DISTRIBUTION OF SHAREHOLDINGS**

Size of Shareholding	Number of Shareholders	%	Number of Shares	%
100 - 1,000	99	19.57	87,900	0.01
1,001 - 10,000	177	34.98	1,028,900	0.07
10,001 - 1,000,000	215	42.49	17,376,600	1.19
1,000,001 and above	15	2.96	1,435,531.300	98.73
	506	100.00	1,454,024,700	100.00

### TWENTY LARGEST SHAREHOLDERS AS AT 17 MARCH 2023

		Number of	
No.	Name of Shareholders	Shares	%
1.	RAFFLES NOMINEES (PTE.) LIMITED	557,083,151	38.31
2.	UOB KAY HIAN PRIVATE LIMITED	442,189,275	30.41
З.	CITIBANK NOMINEES SINGAPORE PTE LTD	220,396,000	15.16
4.	DBS NOMINEES (PRIVATE) LIMITED	192,697,974	13.25
5.	WANG YUANLUO	5,140,000	0.35
6.	LIM & TAN SECURITIES PTE LTD	2,957,700	0.20
7.	PHILLIP SECURITIES PTE LTD	2,136,200	0.15
8.	WANG RUIHONG	2,100,000	0.14
9.	UNITED OVERSEAS BANK NOMINEES (PRIVATE) LIMITED	2,086,200	0.14
10.	WANG WUZHONG	1,993,300	0.14
11.	OCBC SECURITIES PRIVATE LIMITED	1,782,100	0.12
12.	E HONGBIAO	1,260,000	0.09
13.	XU YONGQIANG	1,260,000	0.09
14.	GOH BEE LAN	1,258,400	0.09
15.	LIM PUAY TIANG	1,191,000	0.08
16.	IFAST FINANCIAL PTE. LTD.	924,000	0.06
17.	ZHOU RONGQIN	500,000	0.03
18.	CGS-CIMB SECURITIES (SINGAPORE) PTE. LTD.	417,000	0.03
19.	YANG LEIYUAN	401,000	0.03
20.	GUAN DIFENG	398,500	0.03
	TOTAL	1,438,171,800	98.90

### PERCENTAGE OF SHAREHOLDING IN PUBLIC'S HANDS

11.73% of the Company's shares are held in the hands of the public. Accordingly, the Company has complied with Rule 723 of the Listing Manual of the SGX-ST.

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## Statistics of Shareholdings

As at 17 March 2023

### SUBSTANTIAL SHAREHOLDERS AS AT 17 MARCH 2023

(As recorded in the Register of Substantial Shareholders)

	Direct Interest		Deemed Interest <sup>(2)</sup>	
	No. of Shares	<b>%</b> <sup>(1)</sup>	No. of Shares	<b>%</b> <sup>(1)</sup>
Zhejiang Energy Hong Kong Holding Limited <sup>(3)</sup>	_	_	430,000,000	29.57
Zheneng Capital Holdings Co., Ltd. <sup>(4)</sup>	_	_	430,000,000	29.57
Zhejiang Energy International Limited <sup>(4)</sup>	_	_	430,000,000	29.57
Zhejiang Provincial Energy Group Co., Ltd. <sup>(4)</sup>	_	_	430,000,000	29.57
Win Charm Limited <sup>(5)</sup>	_	_	372,560,575	25.62
Hangzhou Zhengcai Holding Group Co., Ltd <sup>(6)</sup>	_	_	372,560,575	25.62
Hangzhou Jinjiang Group Co., Ltd. <sup>(7)</sup>	_	_	372,560,575	25.62
Dou Zhenggang <sup>(8)</sup>	_	_	372,560,575	25.62
Wei Xuefeng <sup>(9)</sup>	_	_	372,560,575	25.62
Zhejiang Hengjia Holding Co., Ltd. <sup>(10)</sup>	_	_	372,560,575	25.62
Dou Baibing <sup>(11)</sup>	_	_	372,560,575	25.62
Hangzhou Yande Industrial Co., Ltd.(12)	_	_	372,560,575	25.62
Harvest Global Dynamic Fund SPC acting on behalf of and for the account of Harvest Environmental Investment				
Fund SP <sup>(13)</sup>	214,000,000	14.72	_	_
Kung Chak Ming <sup>(13)</sup>	2,487,300	0.17	214,000,000	14.72
Jee Up Enterprises Limited <sup>(13)</sup>	_	_	214,000,000	14.72
Huang Bohao <sup>(13)</sup>	_	_	214,000,000	14.72
Whitel Management Company Limited <sup>(14)</sup>	180,620,574	12.42	_	_
Whitel International Management Holding Limited <sup>(14)</sup>	_	_	180,620,574	12.42
HOPU USD Master Fund III, L.P. <sup>(14)</sup>	-	-	180,620,574	12.42
HOPU Investments Co. III Ltd <sup>(14)</sup>	_	_	180,620,574	12.42
Fang Fenglei <sup>(14)</sup>	_	_	180,620,574	12.42
Lau Teck Sien <sup>(14)</sup>	_	_	180,620,574	12.42
AEP Investments (Mauritius) Limited <sup>(15)</sup>	81,478,351	5.60	_	_
Beijing Yuhua Enterprise Management Centre (L.P.) <sup>(16)</sup>	_	_	81,478,351	5.60

#### Notes:

(1) Based on 1,454,024,700 Shares in issue as at 17 March 2023.

- (2) Deemed interests refer to interests determined pursuant to Section 4 of the Securities and Futures Act ("SFA").
- (3) Zhejiang Energy Hong Kong Holding Limited (浙江能源香港控股有限公司) is deemed to have an interest in 430,000,000 Shares held by Raffles Nominees (Pte.) Limited.
- (4) Zhejiang Energy International Limited (浙江能源国际有限公司) owns the entire issued and paid-up share capital of Zhejiang Energy Hong Kong Holding Limited (浙江能源香港控股有限公司). Zhejiang Provincial Energy Group Co., Ltd. (浙江省能源集团有限公司) and Zheneng Capital Holdings Co., Ltd. (浙能资本控股有限公司) own 60% and 40% of the equity interests in Zhejiang Energy International Limited (浙江能源国际有限公司), respectively. Zheneng Capital Holdings Co., Ltd. (浙能资本控股有限公司) is 100% controlled by Zhejiang Provincial Energy Group Co., Ltd. (浙汇省能源集团 有限公司). Zhejiang Provincial Energy Group Co., Ltd. (浙汇省能源集团 有限公司). Zhejiang Provincial Energy Group Co., Ltd. (浙江省能源集团有限公司) is 100% controlled by Zhejiang Provincial Energy Group Co., Ltd. (浙江省能源集团 有限公司). Zhejiang Provincial Energy Group Co., Ltd. (浙江省能源集团有限公司) is 100% controlled by the State-owned Assets Supervision and Administration Commission of the People's Government of Zhejiang Province (浙江省人民政府国有资产监督管理委员会). Accordingly, each of Zhejiang Energy International Limited (浙江能源国际有限公司), Zheneng Capital Holdings Co., Ltd. (浙江省北源国际有限公司), Zheneng Capital Holdings Co., Ltd. (浙江省人民政府国有资产监督管理委员会) and Zhejiang Provincial Energy Group Co., Ltd. (浙江省派源国际有限公司), Zheneng Capital Holdings Co., Ltd. (浙江省北源国际有限公司), Zheneng Capital Holdings Co., Ltd. (浙江省北源集团有限公司) and Zhejiang Provincial Energy Group Co., Ltd. (浙江省派源国际有限公司), Zheneng Capital Holdings Co., Ltd. (浙正省长源集团有限公司) are deemed to have an interest in the Shares in which Zhejiang Energy Hong Kong Holding Limited (浙江 能源香港控股有限公司) has an interest by virtue of Section 4 of the SFA.
- (5) Win Charm is deemed to have an interest in 328,365,000 Shares held by UOB Kay Hian Private Limited. Win Charm holds approximately 50.0% of the voting shares in the issued and paid-up share capital of Jin Jiang Green Energy Limited ("Jinjiang Green Energy"), which in turn is deemed to have an interest in 44,195,575 Shares held by UOB Kay Hian Private Limited. Accordingly, Win Charm is also deemed to have an interest in the Shares in which Jinjiang Green Energy has an interest by virtue of Section 4 of the SFA.



## Statistics of Shareholdings

As at 17 March 2023

- (6) Hangzhou Zhengcai Holding Group Co., Ltd. ("Hangzhou Zhengcai") holds 45.0% of the issued and paid-up share capital of Win Charm. Win Charm is deemed to have an interest in the Shares held by Jinjiang Green Energy by virtue of Section 4 of the SFA please refer to Note (5) above. Accordingly, Hangzhou Zhengcai is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA.
- (7) Hangzhou Jinjiang Group Co., Ltd. ("Jinjiang Group") directly and indirectly (through its wholly-owned subsidiary Hangzhou Zhengcai) holds the entire issued and paid-up share capital of Win Charm. Win Charm is deemed to have an interest in the Shares held by Jinjiang Green Energy by virtue of Section 4 of the SFA please refer to Note (5) above. Accordingly, Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA.
- (8) Dou Zhenggang holds approximately 46.63% of the registered capital of Jinjiang Group. Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA – please refer to Note (7) above. Accordingly, Dou Zhenggang is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA.
- (9) Wei Xuefeng, who is Dou Zhenggang's spouse, holds the entire registered capital of Zhejiang Hengjia Holding Co., Ltd. ("Zhejiang Hengjia"). Zhejiang Hengjia holds approximately 27.04% of Jinjiang Group's registered capital. Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA please refer to Note (7) above. Accordingly, Wei Xuefeng is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest in which Jinjiang Green Energy and Win Charm have an interest of the SFA.
- (10) Zhejiang Hengjia holds approximately 27.04% of Jinjiang Group's registered capital. Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA please refer to Note (7) above. Accordingly, Zhejiang Hengjia is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA.
- (11) Dou Baibing, who is Dou Zhenggang's daughter, holds 90% of the registered capital of Hangzhou Yande Industrial Co., Ltd. ("Hangzhou Yande"). Hangzhou Yande holds approximately 26.33% of Jinjiang Group's registered capital. Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA – please refer to Note (7) above. Accordingly, Dou Baibing is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest in which Jinjiang Green Energy and Win Charm have an interest of the SFA.
- (12) Hangzhou Yande holds approximately 26.33% of Jinjiang Group's registered capital. Jinjiang Group is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA – please refer to Note (7) above. Accordingly, Hangzhou Yande is deemed to have an interest in the Shares in which Jinjiang Green Energy and Win Charm have an interest by virtue of Section 4 of the SFA.
- (13) While Harvest Global Capital Investments (Cayman) Limited is the manager of the relevant fund, the investment committee of the fund comprises a representative from the fund manager, and a representative from each of its two investors, being Kung Chak Ming and Jee Up Enterprises Limited. Accordingly, each of Kung Chak Ming and Jee Up Enterprises Limited has control over the business and affairs of Harvest Global Dynamic Fund SPC acting on behalf of and for the account of Harvest Environmental Investment Fund SP (the "SPC"), including making investment and divestment decisions and voting the securities and interests held by the SPC, including those in the Company. Pursuant to Section 4 of the SFA, each of Kung Chak Ming and Jee Up Enterprises Limited is deemed to have an interest in the Shares held by the SPC. Huang Bohao is the sole shareholder of Jee Up Enterprises Limited. Accordingly, each of Kung Chak Ming, Jee Up Enterprises Limited and Huang Bohao is deemed to have an interest in the Shares held by the SPC by virtue of Section 4 of the SFA.
- (14) Whitel Management Company Limited is 100% owned by Whitel International Management Holding Limited. Whitel International Management Holding Limited is in turn 100% owned by HOPU USD Master Fund III, L.P. HOPU Investments Co. III Ltd is the general partner of HOPU USD Master Fund III, L.P., and each of Fang Fenglei and Lau Teck Sien is entitled to exercise or control the exercise of not less than 20% of the votes attached to the voting shares of HOPU Investments Co. III Ltd. Accordingly, each of Whitel International Management, HOPU USD Master Fund III, L.P., HOPU Investments Co. III Ltd. Fang Fenglei and Lau Teck Sien may be deemed to have an interest in the Shares held by Whitel Management Company Limited by virtue of Section 4 of the SFA.
- (15) The shares in AEP Investments (Mauritius) Limited corresponding to its investment in the Company are held by Asia Environmental Partners, L.P. and its parallel fund, Asia Environmental Partners (PF1), L.P. (collectively, "AEP"). AEP's general partner is Olympus Green Capital Partners, L.P., holding a 0.99% interest in AEP. AEP's limited partners are passive investors consisting of pension funds, government entities, financial institutions, endowments and family offices from North America, Asia, Europe and the Middle East (none of whom owns more than 1% of the Company on a fully diluted, look-through basis).
- (16) Beijing Yuhua Enterprise Management Centre (L.P.) entered into a transfer agreement with AEP Investments (Mauritius) Limited on 27 February 2023 to acquire 81,478,351 shares in the Company (the "Sale Shares"). Completion pursuant to the transfer agreement has not taken place. Beijing Yuhua Enterprise Management Centre (L.P.) is deemed to have an interest in the Sale Shares by virtue of Section 4 of the SFA.

This Notice has been made available on the Company's corporate website (<u>http://en.znjjhj.com/info.html</u>) and SGXNET. A printed copy of this Notice will not be despatched to members of the Company.

NOTICE IS HEREBY GIVEN that the Annual General Meeting (the "**AGM**" or "**Meeting**") of Zheneng Jinjiang Environment Holding Company Limited 浙能锦江环境控股有限公司 (the "**Company**") will be held at 1 Yinxiu Road, Level 19, Meeting Room 1930, Tower A, Hangyue Commercial Center, Gongshu District, Hangzhou City, Zhejiang Province, People's Republic of China 310011 (浙江省杭州市拱墅区隐秀路1号杭悦商业中心写字楼A座19楼1930会议室(邮编: 310011)) on Monday, 24 April 2023 at 2.00 p.m. for the following purposes:-

### AS ORDINARY BUSINESS

- To receive and adopt the Directors' Statement and the Audited Financial Statements of the Company for the financial year ended 31 December 2022 together with thereon. (Resolution 1)
- 2. To re-elect the following Directors of the Company retiring pursuant to the Company's Articles of Association.

Mr Wei Dongliang	(Retiring pursuant to Article 127)	(Resolution 2)
Dr Kan Yaw Kiong (Ernest)	(Retiring pursuant to Article 126)	(Resolution 3)
[See Explanatory Note (i)]		

- To approve the payment of Directors' fees of S\$420,000 for the financial year ended 31 December 2021.
   [See Explanatory Note (ii)]
   (Resolution 4)
- To approve the payment of Directors' fees of \$\$312,630 for the financial year ended 31 December 2022.
   [See Explanatory Note (iii)] (Resolution 5)
- To re-appoint Messrs PricewaterhouseCoopers LLP as the Company's auditors and to authorise the Directors to fix their remuneration. (Resolution 6)
- 6. To transact any other ordinary business which may properly be transacted at an Annual General Meeting.

### AS SPECIAL BUSINESS

To consider and, if thought fit, to pass the following resolutions as Ordinary Resolutions, with or without modifications:-

#### 7. **"APPOINTMENT OF DIRECTOR**

That Mr Jin Ruizhi be appointed as a Director of the Company to hold office with effect from the conclusion of this AGM." [See Explanatory Note (iv)] (Resolution 7)

#### 8. **"APPOINTMENT OF DIRECTOR**

That Mr Liang Weiwen be appointed as a Director of the Company to hold office with effect from the conclusion of this AGM."
[See Explanatory Note (v)]
(Resolution 8)

ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED



#### 9. "THE PROPOSED RENEWAL OF THE GENERAL MANDATE FOR INTERESTED PERSON TRANSACTIONS

That:-

- (a) approval be and is hereby given for the purposes of Chapter 9 of the Listing Manual ("Chapter 9") of the Singapore Exchange Securities Trading Limited ("SGX-ST"), for the Company, its subsidiaries and associated companies that are considered to be "entities at risk" (as that term is used in Chapter 9), or any of them to enter into any of the transactions falling within the types of Mandated Transactions described in Appendix 2 to the Notice of Annual General Meeting dated 7 April 2023 ("Appendix 2") with any party who is of the class of Mandated Interested Persons described in Appendix 2, provided that such transactions are made on normal commercial terms and in accordance with the review procedures for such interested person transactions;
- (b) the approval given in paragraph (a) above (the "IPT General Mandate") shall, unless revoked or varied by the Company in general meeting, continue in force until the conclusion of the next annual general meeting of the Company; and
- (c) the Directors of the Company and/or any of them be and are and/or is hereby authorised to complete and do all such acts and things (including executing such documents as may be required) as they and/or he may consider expedient or necessary or in the interests of the Company to give effect to the transactions contemplated and/or authorised by this Resolution."

[See Explanatory Note (vi)]

(Resolution 9)

By Order of the Board of Directors

Wei Dongliang Executive Chairman 7 April 2023

#### **Explanatory Notes:-**

(i) The Ordinary Resolution 2 proposed in item 2 above is to re-elect Mr Wei Dongliang as a Director of the Company. Mr Wei Dongliang will, upon re-election as a Director of the Company, remain as a member of the Nominating Committee.

The Ordinary Resolution 3 proposed in item 2 above is to re-elect Dr Kan Yaw Kiong (Ernest) as a Director of the Company. Dr Kan Yaw Kiong (Ernest) will, upon re-election as a Director of the Company, remain as Chairman of the Audit and Risk Management Committee and a member of the Remuneration Committee. He will be considered independent for the purpose of Rule 704(8) of the Listing Manual of the Singapore Exchange Securities Trading Limited (the "SGX-ST").

The profiles of Mr Wei Dongliang and Dr Kan Yaw Kiong (Ernest) can be found under the sections entitled "Board of Directors" and "Supplemental Information on Directors pursuant to Rule 720(6) of the Listing Manual of the SGX-ST" of the Company's Annual Report for the financial year ended 31 December 2022 ("**Annual Report 2022**").

 (ii) At the AGM of the Company held on 25 April 2022, Ordinary Resolution 5 in relation to the approval of Directors' Fees for the financial year ended 31 December 2021 ("FY2021") was not passed.

The Ordinary Resolution 4 proposed in item 3 above, if passed, will facilitate the payment of Directors' fees for FY2021 to the Independent Directors who held office during FY2021. The Independent Directors who held office during FY2021 were Prof Ni Mingjiang, Mr Ang Swee Tian, Mr Tan Huay Lim and Mr Hee Theng Fong.



(iii) The Ordinary Resolution 5 proposed in item 4 above, if passed, will facilitate the payment of Directors' fees to the Independent Directors who held office for the financial year ended 31 December 2022 ("**FY2022**").

Save for Prof Ni Mingjiang and Mr Ang Swee Tian who each held office for the whole of FY2022, the Directors' fees are pro-rated for FY2022 for (i) each of Mr Hee Theng Fong and Mr Tan Huay Lim until their cessation as Independent Directors at the conclusion of the AGM held on 25 April 2022 and (ii) Dr Kan Yaw Kiong (Ernest) from his date of appointment as an Independent Director on 22 July 2022.

(iv) The Ordinary Resolution 7 proposed in item 7 above, if passed, is to appoint Mr Jin Ruizhi, who is the Chief Financial Officer of the Company, as an Executive Director of the Company. Pursuant to Article 130 of the Company's Articles of Association, Zhejiang Energy Hong Kong Holding Limited (浙江能源香港控股有限公司), being a member duly qualified to attend and vote at the AGM, has notified the Company of its intention to propose Mr Jin Ruizhi for election as an Executive Director of the Company. The Nominating Committee has reviewed Mr Jin Ruizhi's information and profile and is satisfied that Mr Jin Ruizhi has met the requisite standards as required by the Code of Corporate Governance 2018.

#### Key information and profile of Mr Jin Ruizhi

Mr Jin Ruizhi is the Chief Financial Officer of the Company. The profile of Mr Jin Ruizhi can be found under the section entitled "Key Management" of the Company's Annual Report 2022.

Pursuant to Rule 720(6) of the Listing Manual of the SGX-ST, please refer to Appendix 1 to this Notice of Annual General Meeting for the information relating to Mr Jin Ruizhi as set out in Appendix 7.4.1 of the Listing Manual of the SGX-ST.

(v) The Ordinary Resolution 8 proposed in item 8 above, if passed, is to appoint Mr Liang Weiwen as a Non-Executive, Non-Independent Director of the Company. Pursuant to Article 130 of the Company's Articles of Association, Harvest Global Dynamic Fund SPC acting on behalf of and for the account of Harvest Environmental Investment Fund SP and Whitel Management Company Limited, each being a member duly qualified to attend and vote at the AGM, have notified the Company of their intention to propose Mr Liang Weiwen for election as a Non-Executive, Non-Independent Director of the Company. The Nominating Committee has reviewed Mr Liang Weiwen's information and profile and is satisfied that Mr Liang Weiwen has met the requisite standards as required by the Code of Corporate Governance 2018.

#### Key information and profile of Mr Liang Weiwen

Mr Liang Weiwen has 15 years' of working experience in Hong Kong, including 9 years as part of the senior management of listed companies in the industrial sector. He has been engaged in investment banking and public fund management for 14 years in the domestic securities industry and has led the initial public offerings of many enterprises, mergers & acquisitions and restructuring of listed companies, equity fundraisings and bond issuances. He is familiar with the operation rules of the capital market in China and Hong Kong, and has rich experience in the management of finance, securities, public funds and listed companies.

Pursuant to Rule 720(6) of the Listing Manual of the SGX-ST, please refer to Appendix 1 to this Notice of Annual General Meeting for the information relating to Mr Liang Weiwen as set out in Appendix 7.4.1 of the Listing Manual of the SGX-ST.

(vi) The Ordinary Resolution 9 proposed in item 9 above, if passed, is to authorise the interested person transactions as described in Appendix 2 to this Notice of Annual General Meeting and recurring in the year, and will empower the Directors to do all acts necessary to give effect to the IPT General Mandate. This authority will, unless revoked or varied by the Company in a general meeting, continue in force until the conclusion of the next annual general meeting of the Company or the date by which the next annual general meeting of the Company is required by law to be held, whichever is the earlier. Please refer to Appendix 2 to this Notice of Annual General Meeting for more details.



#### Notes:-

1. In respect of the AGM of the Company to be held on Monday, 24 April 2023 at 2.00 p.m. (Singapore time) at 1 Yinxiu Road, Level 19, Meeting Room 1930, Tower A, Hangyue Commercial Center, Gongshu District, Hangzhou City, Zhejiang Province, People's Republic of China 310011 (浙江省杭州市拱墅区隐秀路1号杭悦商业中心写字楼A座19楼1930会议室 (邮编: 310011)) (and any adjournment thereof), notwithstanding the place in which the AGM is to be physically held, other than in respect of the Chairman, Directors and/or representatives of the Company present at such location, the AGM is being convened, and will be held, by way of electronic means pursuant to the Guidance on the Conduct of General Meetings Amid Evolving COVID-19 Situation and checklist jointly issued by the Accounting and Corporate Regulatory Authority, the Monetary Authority of Singapore and Singapore Exchange Regulation on 13 April 2020 and updated on 27 April 2020, 22 June 2020, 1 October 2020 and 4 February 2022 which is based on the COVID-19 (Temporary Measures) (Alternative Arrangements for Meetings for Companies, Variable Capital Companies, Business Trusts, Unit Trusts and Debenture Holders) Order 2020 (as amended) read together with the Regulator's Column: Live Engagement and Voting Expected at all AGMs for FYs Ending 30 June 2022 or After issued by Singapore Exchange Regulation on 23 May 2022.

Printed copies of this Notice of AGM and the proxy forms will not be sent to members. Instead, all documents (including the Annual Report 2022, proxy forms, this Notice of Annual General Meeting and the Appendices to this Notice of Annual General Meeting) or information relating to the business of this AGM will be sent to members by electronic means via publication on the Company's URL at <a href="http://en.znjjhj.com/info.html">http://en.znjjhj.com/info.html</a> and the SGXNet. Members and CPF/SRS investors are advised to check SGXNet and/or the Company's website regularly for updates.

- 2. Alternative arrangements are instead put in place to allow members/proxies to participate in the AGM by:
  - (a) watching or listening to the AGM proceedings via a Live Webcast (as defined below). Members/proxies who wish to participate as such will have to pre-register in the matter outlined in Notes 3 to 5 below;
  - (b) submitting questions ahead of or "live" at the AGM. Please refer to the Notes 6 to 9 below for further details; and
  - (c) voting (i) "live" by the members or by their duly appointed proxy(ies) (other than the Chairman of the AGM); or (ii) by appointing the Chairman of the AGM as proxy to vote on their behalf at the AGM. Please refer to Notes 10 to 18 below for further details.

#### Participation in AGM proceedings via "live webcast"

- 3. A member of the Company, their proxy(ies) or their corporate representative (in the case of a member which is a legal entity) will be able to watch or listen to the proceedings of the AGM through a "live" webcast via mobile phone, tablet or computer ("Live Webcast"). In order to do so, the member/proxy(ies) must pre-register no later than 2.00 p.m. on Friday, 21 April 2023, being seventy-two (72) hours before the time appointed for the AGM ("Registration Cut-Off Time"), at the following URL: <a href="https://go.lumiengage.com/zjehclagm2023">https://go.lumiengage.com/zjehclagm2023</a> (the "Pre-registration Website"), to create an account.
- 4. Following authentication of his/her/its status as a member or proxy(ies) of the member of the Company, an email containing instructions on how to access the "live" webcast and audio feed of the proceedings of the AGM will be sent to authenticated members and CPF/SRS investors by Saturday, 22 April 2023. Members and CPF/SRS investors who do not receive any email by 5.00 p.m. on Sunday, 23 April 2023, but have registered by the Registration Cut-Off Time, should contact the Company at +65 6536 5355.
- 5. Investors holding Shares through relevant intermediaries (as defined in Section 181 of the Companies Act 1967 of Singapore) ("Investors") (other than CPF/SRS investors) will not be able to pre-register at the Pre-registration Website for the "live" broadcast of the AGM. An Investor (other than CPF/SRS investors) who wishes to participate in the "live" broadcast of the AGM should instead approach his/her relevant intermediary as soon as possible in order for the relevant intermediary to make the necessary arrangements to pre-register. The relevant intermediary is required to submit a consolidated list of participants (setting out in respect of each participant, his/her name, email address and NRIC/passport number) to the Company's Share Transfer Agent, Boardroom Corporate & Advisory Services Pte. Ltd., via email to <a href="mailto:agm.teame@boardroomlimited.com">agm.teame@boardroomlimited.com</a>> no later than 2.00 p.m. on Friday, 21 April 2023.

#### Submission of questions ahead of the AGM

- 6. Members (including CPF and SRS Investors) may also submit questions relating to the resolutions to be tabled for approval at the AGM or the Company's businesses and operations ahead of the AGM.
- 7. To do so, all questions must be submitted no later than 2.00 p.m. on 15 April 2023 through any of the following means:
  - (a) via the pre-registration website at the URL: <u>https://go.lumiengage.com/zjehclagm2023;</u>
  - (b) in physical copy by depositing the same at the registered office of the Company's Share Transfer Agent, Boardroom Corporate & Advisory Services Pte. Ltd. at 1 Harbourfront Avenue, #14-07, Keppel Bay Tower, Singapore 098632; or
  - (c) by email to the Company at <agm.teame@boardroomlimited.com>.

If the questions are deposited in physical copy at the Company's registered office of the Company's share transfer agent or sent via email, and in either case not accompanied by the completed and executed proxy form(s), the following details must be included with the submitted questions: (i) the member's full name; and (ii) his/her/its identification/company registration number for verification purposes, failing which the submission will be treated as invalid.

8. The Company will address all substantial and relevant questions relating to the resolutions to be tabled for approval at the AGM or the Company's business and operations by publishing its responses to such questions, if any, on the Company's corporate website at the following URL: <u>http://en.znjjhj.com/info.html</u>, and on SGXNet at least 48 hours prior to the deadline for submission of proxy forms. Should there be subsequent clarification sought, or follow-up questions after the deadline of the submission of questions, the Company will address those substantial and relevant questions at the AGM.

#### Submission of questions "live" at the AGM

- 9. Members (including CPF and SRS Investors) may submit textual questions "live" at the AGM in the following manner:
  - (a) Members (including CPF and SRS Investors) or where applicable, their appointed proxy(ies) who have pre-registered and are verified to participate in the AGM can ask questions relating to the ordinary resolutions tabled for approval at the AGM "live" at the AGM, by typing in and submitting their questions through the "live" ask-a-question function via the webcast platform during the AGM.
  - (b) Members who wish to appoint a proxy(ies) (other than the Chairman of the AGM) to ask questions "live" at the AGM on their behalf must, in addition to completing and submitting a proxy form, ensure that their proxy(ies) pre-register separately via the registration link that will be sent to the appointed proxy(ies) via email upon verification of the proxy form(s).
  - (c) Members (including CPF and SRS Investors) or, where applicable, their appointed proxy(ies) must access the AGM proceedings via the "live" webcast platform in order to ask questions "live" at the AGM.
  - (d) The Company will, during the AGM itself, address the substantial and relevant questions (which are related to the resolutions to be tabled for approval at the AGM) which have not already been addressed prior to the AGM, as well as those received "live" at the AGM itself, as reasonably practicable. Where there are substantially similar questions, the Company will consolidate such questions; consequently, not all questions may be individually addressed.

#### Submission of proxy form, or voting "live" at the AGM

- 10. Members who wish to exercise their voting rights at the AGM may:
  - (a) (where such members are individuals) vote "live" via electronic means at the AGM or (where such members are individuals or corporates) appoint a proxy(ies) (other than the Chairman of the AGM)\* to vote "live" via electronic means at the AGM on their behalf; or

\*For the avoidance of doubt, CPF and SRS investors will not be able to appoint third party proxy(ies) (i.e., persons other than the Chairman of the AGM) to vote "live" at the AGM on their behalf.

- (b) (where the member is an individual or corporate) appoint the Chairman of the AGM as his/her/its proxy to participate in and vote on his/her/its behalf at the AGM. In appointing the Chairman of the AGM as proxy, a member (whether individual or corporate) must give specific instructions as to voting, or abstentions from voting, in the form of proxy, failing which the appointment for that resolution will be treated as invalid.
- 11. A proxy need not be a member of the Company.
- 12. A member of the Company who is not a relevant intermediary entitled to participate in the meeting and vote is entitled to appoint one or two proxies to participate and vote in his/her stead. Where a member who is not a relevant intermediary appoints two proxies, the appointments shall be invalid unless he/she specifies the proportion of his/her shareholding (expressed as a percentage of the whole) to be represented by each proxy.
- 13. A member who is a relevant intermediary entitled to participate in the meeting and vote is entitled to appoint more than two proxies to participate and vote instead of the member, but each proxy must be appointed to exercise the rights attached to a different Share or Shares held by such member. Where such member appoints more than two proxies, the appointments shall be invalid unless the member specifies the number of Shares in relation to which each proxy has been appointed.



"Relevant intermediary" means:

- (a) a banking corporation licensed under the Banking Act 1970 of Singapore or a wholly-owned subsidiary of such a banking corporation, whose business includes the provision of nominee services and who holds shares in that capacity; or
- (b) a person holding a capital markets services licence to provide custodial services under the Securities and Futures Act 2001 of Singapore and who holds shares in that capacity; or
- (c) the Central Provident Fund Board established by the Central Provident Fund Act 1953 of Singapore (the "CPF Act"), in respect of shares purchased under the subsidiary legislation made under the CPF Act providing for the making of investments from the contributions and interest standing to the credit of members of the Central Provident Fund, if the Central Provident Fund Board holds those shares in the capacity of an intermediary pursuant to or in accordance with that subsidiary legislation.
- 14. Subject to Note 17 below, completion and return of proxy form shall not preclude a member from participating in and voting at the AGM. Any appointment of a proxy or proxies shall be deemed to be revoked if a member personally participates in the Live Webcast of the meeting, and in such event, the Company reserves the right to refuse to allow any person or persons appointed under the proxy form to participate in the AGM.
- 15. The proxy form must be submitted to the Company in the following manner:
  - (a) via the pre-registration website at the URL: https://go.lumiengage.com/zjehclagm2023;
  - (b) if submitted by post, be lodged at the office of the Company's Share Transfer Agent, Boardroom Corporate & Advisory Services Pte. Ltd., at 1 Harbourfront Avenue #14-07, Keppel Bay Tower, Singapore 098632; or
  - (c) by sending a scanned PDF copy by email to the Company's Share Transfer Agent at <agm.teame@boardroomlimited.com>.

in either case, no later than 2.00 p.m. on Friday, 21 April 2023, not less than 72 hours before the time appointed for the AGM.

16. A member who wishes to submit the proxy form must first download, complete and sign the proxy form, before submitting it by post to the address provided above, or before scanning and sending it by email to the email address provided above.

The proxy form must be signed by the appointer or his attorney duly authorised in writing. Where the proxy form is executed by a corporation, it must be executed either under its seal or under the hand of an officer or attorney duly authorised.

- 17. The proxy form is not valid for use by Investors and shall be ineffective for all intents and purposes if used or purported to be used by them. An Investor who wishes to vote should instead approach his/her relevant intermediary as soon as possible to specify his/her voting instructions. A CPF/SRS investor who wishes to vote should approach his/her CPF Agent Bank or SRS Operator at least 7 working days before the date of the AGM to submit his/her voting instructions.
- 18. The Company shall be entitled to reject the proxy form if it is incomplete, improperly completed, illegible or where the true intentions of the appointor are not ascertainable from the instructions of the appointor specified in the proxy form (including any related attachment) (such as in the case where the appointor submits more than one proxy form). In addition, in the case of members of the Company whose shares are entered against their names in the Depository Register, the Company may reject any proxy form lodged if such members are not shown to have Shares entered against their names in the Depository Register (as defined in Part IIIAA of the Securities and Futures Act 2001 of Singapore), as at 72 hours before the time appointed for holding this AGM as certified by The Central Depository (Pte) Limited to the Company.

#### Personal data privacy:-

By pre-registering for the Live Webcast, submitting a proxy form to vote at the AGM and/or any adjournment thereof, and/or submitting questions relating to the resolutions to be tabled for approval at the AGM or the Company's businesses and operations, a member of the Company: (i) consents to the collection, use and disclosure of such member's personal data by the Company (or its agents) for the purpose of the processing and administration by the Company (or its agents) of proxies and representatives appointed for the AGM (including any adjournment thereof) and the preparation and compilation of the attendance lists, minutes and other documents relating to the AGM (including any adjournment thereof), and in order for the Company (or its agents) to comply with any applicable laws, listing rules, regulations and/or guidelines (collectively, the "Purposes"); (ii) warrants that where such member discloses the personal data of such member's proxy(ies) and/or representative(s) to the Company (or its agents), such member has obtained the prior consent of such proxy(ies) and/or representative(s) for the collection, use and disclosure by the Company (or its agents) of the personal data of such proxy(ies) and/or representative(s) for the Purposes; and (iii) agrees that such member will indemnify the Company in respect of any penalties, liabilities, claims, demands, losses and damages as a result of such member's breach of warranty.

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### ZHENENG JINJIANG ENVIRONMENT HOLDING COMPANY LIMITED



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