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2019

TSRC CORPORATE SOCIAL RESPONSIBILITY REPORT

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Message from the Management

2019 was a challenging year for most businesses. Global economic growth slowed due to the disruptions from trade disputes and geopolitical conflicts, as well as the uncertainties in outlook and negative impact to business/consumer confidence. TSRC’s business was not immune to these negative factors and experienced a decline in overall financial performance compared to the year of 2018.

Despite the downturn and uncertainties in the global economy, TSRC continues to invest to fulfill its commitment in sustainable enterprise development and corporate social responsibility in economic, environmental and social aspects. Adhering to our people-centric core value, we proactively connect with local stakeholders through social participation. In the aspect of employee welfare and caring, we were recognized and received 2019 “Happiness Enterprise Award” from a third-party media in Taiwan.

SUSTAINABLE DEVELOPMENT

From operation standpoint, we established concrete plans and actions to align TSRC performance targets with United Nations (UN) Sustainable Development Goals (SDGs) via international standard management systems. For example, we adopted ISO 50001, Energy Management System, and set the goal of larger-than-one-percent average annual saving in electricity to manufacture products more efficiently; ISO 45001, Occupational Health and Safety Management System, is used for manage our healthcare and practices toward the goal of a zero-hazard-zero-injury working environment; and ISO 14001, Environmental Management System, focuses on sustainable manufacturing and guide our activities in waste reduction and recycling management toward a sustainable environment.

For the year of 2020, global economic growth continues to be weakened, especially with the COVID-19 outbreak. The outbreak directly im-



pacted China’s economy and also caused a broad-based impact globally due to China’s position in the global supply chain and international trade. TSRC’s priority, during this difficult period, is to ensure the safety of our employees and to support our key customers to stabilize and sustain their businesses. We will also continue our long-term development projects for new products and technology solutions. Meanwhile, we strive to continue creating values for the stakeholders and the whole society with dedications to resource conservation and corporate social responsibility fulfillment for a sustainable future.

Joseph Chai
Chief Executive Officer

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Company Profile

TSRC is a listed company (Stock code 2103) in Taiwan with major shareholders comprising domestic and foreign corporations and individuals. Its main business consists of a variety of manufacturing and sales of synthetic rubber, with brand names of TAIPOL, T-BLEND, VECTOR and other related brands, and the main businesses are the manufacturing and sales of a variety of synthetic rubber (E-SBR, S-SBR, BR, TPE) and non-synthetic rubber (Applied Materials). All are upstream raw materials for products that consumers generally use.

Our rubber product customers are mostly the automobile industries, used in tires, engine tubing, airbag covers, and window trims. In addition, some of our products are also used in daily lives and industrial products, such as shoe materials, toys, construction materials, daily necessities, industrial supplies, etc. (For more detailed product description, please see TSRC website <https://www.tsrc.com.tw>).

TSRC was established in 1973. From a sole synthetic rubber manufacturer in Taiwan, TSRC

has become a leader in today's synthetic rubber industry. Recently TSRC has been actively globalizing our business: focused on the global planning of R&D and technology, developed high value-added products, and worked with the development of customized products to expand the scope of product applications and increase sales of high value-added products. The consolidated revenue approximately reached NT\$28.9 billion in 2019.

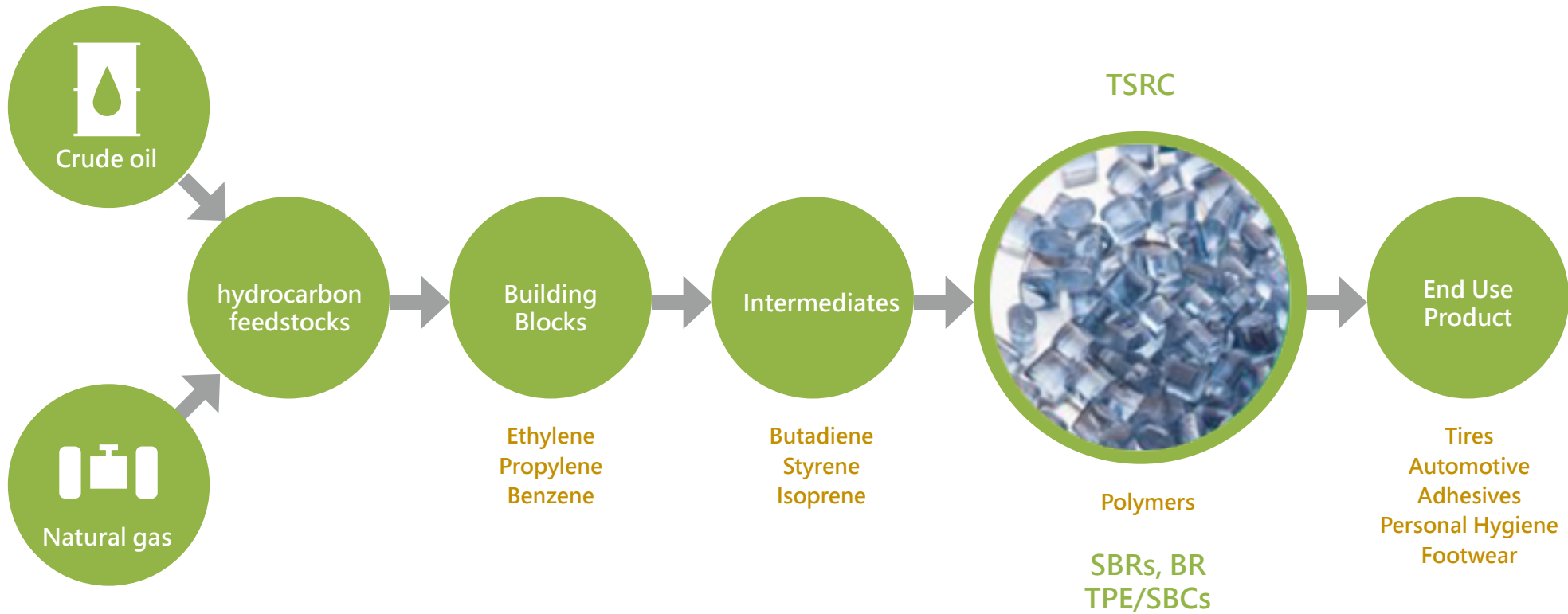
Headquartered in Taiwan, TSRC is vigorously expanding its business to establish production bases and commercial teams in China (Nantong in Jiangsu and Song-Jiang in Shanghai), Thailand, India, Vietnam and USA and Luxembourg to service the growing demand of worldwide customers. TSRC has two production factories in Taiwan (Kaohsiung Factory/Gangshan Factory) and four subsidiaries and warehouses in China. We have established ARLANXEO-TSRC as a joint venture with the German company Lanxess. Its India Factory is the result of cooperation with IndianOil, and we have established operation centers and sales channels in Europe. To further

develop the market of high-quality shoe materials, the production capacity of the Gangshan and Nantong Factories have been expanded. In 2018, a new production line was established in Binh Duong, Vietnam. Its production is expected to start in 2020 to add momentum for the future operations.

All TSRC production factories have received international certifications including ISO 9001 (quality management system) and ISO 14001 (environment)/ ISO 45001 (safety)/ QC 080000 (no hazardous substance)/ ISO 50001 (energy)/ ISO 10012 (MSA or measurement management system). In 2018, the Kaohsiung Factory received the certification of IATF 16949:2016 (automotive quality management system), and the Nantong Factory completed the promotion of IATF 16949 management system in 2019. In a rapidly changing market, TSRC can only prevail in competition through continued innovation.

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Relevance of the industry's upstream, midstream and downstream:



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Environmental Policy

Cherish the earth resources and fulfill our responsibilities for environmental protection. Commitment to continuous improvement and business sustainability.



ISO 14001



Hazardous Substance Free (HSF) Policy

Comply with HSF (Hazardous Substances Free) related laws and regulations. Meet customer product's environmental requirements. Continuous improvement in environmental protection standards and production of HSF (Hazardous Substances Free) products.



QC 080000



Energy Management Policy

Comply with regulations and carry out energy consumption audit/review. Improve energy consumption through utilization of high-efficiency equipment. Continuous improvement in GHG (Green House Gas) emissions reduction.



ISO 50001



Safety & Health Policies

People-centric is our core value. We strive to achieve the target of "zero hazard, zero injury" and operate based on the following principles: Technology · Safety & Health Culture · Responsibility · Communication



ISO 45001



Quality Policy

We are committed to meet and exceed customer's expectation in products' and services' quality through the principles of "Do It Right the First Time" and "Accountability" in continuous quality improvement.



ISO 9001



IATF 16949

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Corporate Social Responsibility and Sustainability Issue Management



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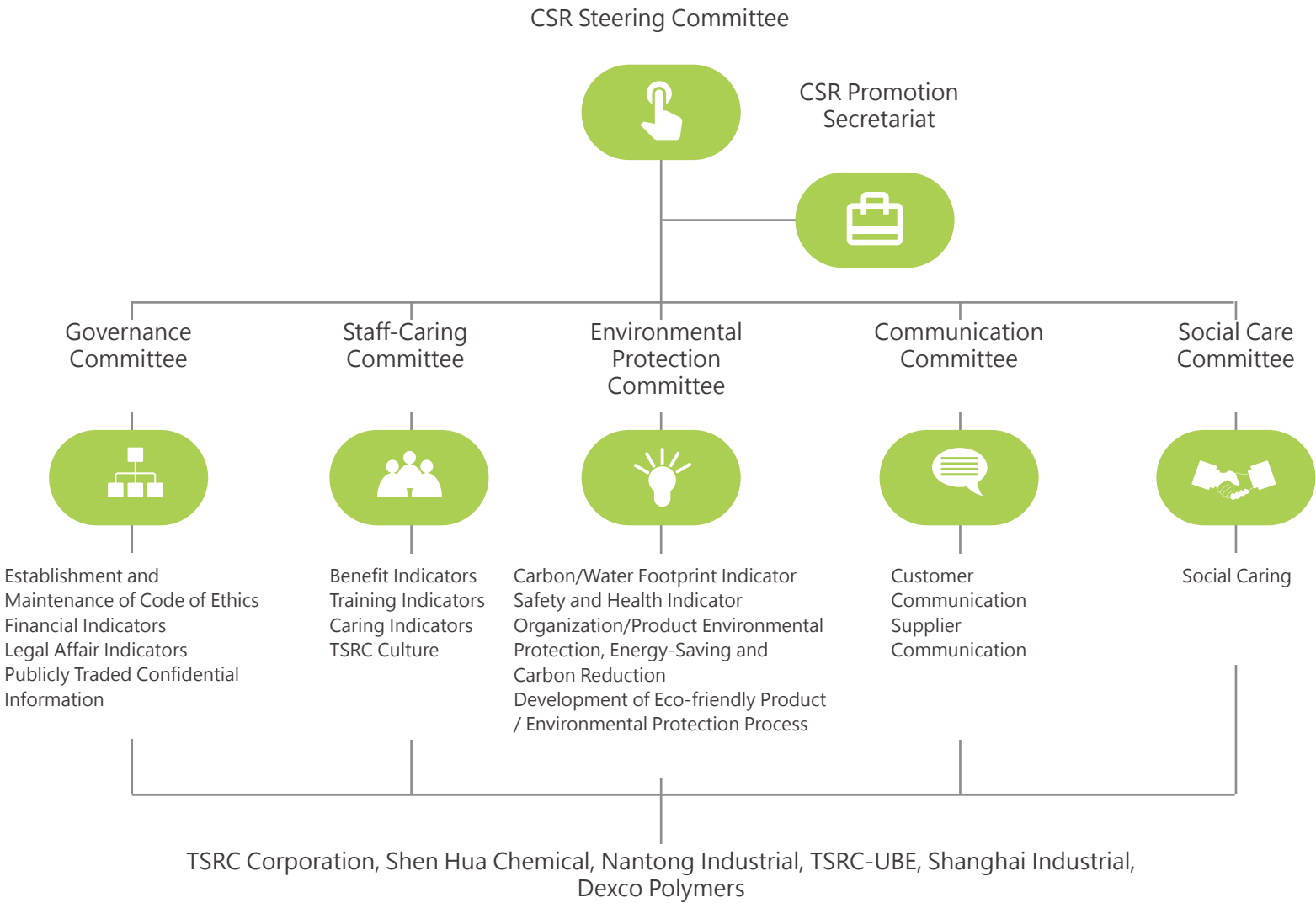
CSR (Corporate Social Responsibility) Organization Structure and the Operation

To promote CSR effectively, TSRC has established the CSR Steering Committee led by the CEO as the highest supervisory unit to provide guidance for establishing policies, procedures and plans related to CSR promotion. The Committee holds regular meetings to determine the strategy for CSR implementation as well as to review the status and progress of CSR execution.

The Functional Committees under CSR Steering Committee consist of “Governance Committee” , “Staff-Caring Committee” , “Environmental Protection Committee” , “Communication Committee” , and “Social Care Committee” , which are responsible for the operation and performance management of the corporate social responsibility indicators. The Committees also integrate the CSR promotion activities into the standard business operation activities in order to deliver to the corresponding stakeholders.

The CSR Promotion Secretariat follows the “P-D-C-A” (Plan - Do - Check - Action) management model to regularly identify stakeholders, collect and analyze the high priority issues related to the stakeholders, and discuss those issues in the annual review meeting with the steering committee to ensure the major issues covered and action plan executed. The CSR Promotion Secretariat is also responsible for the preparation and issuance of the CSR report, regularly review progress with the Steering Committee, and submit the annual implementation results to the Board of Directors. The annual report is compiled according to GRI (Global Reporting Initiative) Standards the disclosure in the report complies with ESG (Environmental, Social and Corporate Governance) Principles to ensure the sustainability issues are well addressed.

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Communication with Stakeholders and Analysis of Material Issues

Communication and screening of stakeholders and material issues are the most important part of Corporate Social Responsibility to understand the issues concerned by the stakeholders. By the Corporate Social Responsibility Report, we disclose the efforts and performance achieved on CSR by TSRC. In 2019, TSRC adopted the assessment method of the internal experts and the CSR Promotion Secretariat invited the representatives of each department to form an internal expert team represent-

ing the functions of each CSR Committees: corporate governance, employee care, environmental protection and energy saving, external communication and social care. According to the daily operation and business transaction and communication with stakeholders, we measure the results of the practical issue selection mechanism in 2018 and consider the changes in the internal and external environments of the year to adjust the setting of the prioritized communication targets and concerned issues.



Based on the daily operation and external business communication conducted by our relevant departments, we identified the primary stakeholders. There are 7 categories: customers, employees/labor unions, investors, government (the competent authorities), media, suppliers, society (including communities/NGOs/local residents affected by operation activities).

TSRC's aspects were based on the guidelines of the reporting principles and report content definition in the sustainability report framework of GRI Standards. The external part referred to related international sustainable standards and regulations (GRI Standards), sustainability messages (e.g. DJSI, CDP, SA8000, COP, SDGs, etc.) and the communication process and feedback of the stakeholders. The internal part referred to the Company's sustainability policies, corporate operation strategies and objectives. After the discussion of the meeting, we integrated these into the GRI aspects.

Each department of TSRC communicates with various stakeholders via daily operations and the communication channels include various ways such as phone calls, questionnaire survey, meetings, on-site visits and participation in associations. In 2019, the internal expert team discussed and reviewed the analysis result of 175 valid questionnaires received in 2018 and considered there were no significant changes in the internal and external environments. Thus, the team determined to continue using the said communication method.

The internal expert team discussed and reviewed the feedback of stakeholders and the major events/issues currently occurred in the external environment to adjust the priority in 2019.

For every material issue identified, we assess the impact on the related stakeholders or the external value chains. After calculating and prioritizing the scores of the received questionnaires regarding the "Concerned Level of Issues" and "Impact Level on Operation," we ranked the items in the top one-third as 12 material issues. In addition, given that TSRC is treated as a large energy consumer defined by the competent authorities, we added the disclosure of the "Energy" item.

According to the materiality matrix, we selected 23 specific indicators as the key disclosure items of this report and detailed the responsive strategies and performance results of the issues.

We examined the report completeness and demonstrated the Company's performance and sustainability impact. We gave feedback to the concerned issues of stakeholders in each relevant chapters. The report was sent to the advisory committee and the Board of Directors for audit and public publishing and we collected the stakeholders' opinions for the feedback in the next report.

Note:
DJSI: Dow Jones Sustainability Index, CDP (Climate Change Program) carbon disclosure, SA8000 (Social Accountability Standard), COP: UN Framework Convention on Climate Change (UNFCCC) Conference of the Parties (COP), UN Sustainable Development Goals (SDGs).

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The Stakeholders, Concerned Issues and Communication Channels are as follows

Stakeholders	Customer	Employees/Labor Union	Investor	Media	Supplier	Society (Note 1)	Government (Note 2)
Material Issue	<ul style="list-style-type: none"> Customer Privacy Customer Health and Safety Occupational Health and Safety 	<ul style="list-style-type: none"> Occupational Health and Safety Economic Performance Employment 	<ul style="list-style-type: none"> Economic Performance Environmental Compliance Effluents and Waste 	<ul style="list-style-type: none"> Occupational Health and Safety Environmental Compliance Effluents and Waste 	<ul style="list-style-type: none"> Procurement Practices Economic Performance Customer Privacy 	<ul style="list-style-type: none"> Local Communities Environmental Compliance Effluents and Waste 	<ul style="list-style-type: none"> Environmental Compliance Effluents and Waste Emissions
Communication Channels	<ul style="list-style-type: none"> Annual interactive seminar Visit (Email, telephone, questionnaire, etc.) Disclosure of information in the product safety data sheet website Customer CSR audit Information disclosure on the corporate social responsibility report website 	<ul style="list-style-type: none"> Employees Welfare Committee Disclosure of material safety data sheet Responsible Care Committee Health promotion forum (if required) Employee complain mailbox Industrial safety bulletin Labor Union Representatives Conference 	<ul style="list-style-type: none"> Information disclosure on the corporate social responsibility report website Investor service mailbox in the Company's website Public Information Observation Post Shareholders' meeting 	<ul style="list-style-type: none"> Set up CSR mailbox on the Company website Unscheduled telephone communication/face-to-face meeting Disclosure of information in the product safety data sheet website Information disclosure on the corporate social responsibility report website 	<ul style="list-style-type: none"> Supplier CSR assessment Set up CSR mailbox on the Company website Supplier CSR promotions Environmental protection assessment of the supplier Information disclosure on the corporate social responsibility report website Annual supplier evaluation 	<ul style="list-style-type: none"> Non-scheduled visits Industrial Park Manufacturers Association Industrial Park Service Center Set up CSR mailbox on the Company website Information disclosure on the corporate social responsibility report website 	<ul style="list-style-type: none"> Corporate Social Responsibility Report Government laws and regulations promotions Government official documents Stock annual report
Communication frequency	<ul style="list-style-type: none"> Once/Annual Irregular Regularly updated Irregular Once/Annual 	<ul style="list-style-type: none"> Once/Quarterly Regularly updated Once/Quarterly Irregular Irregular Published daily Annual 	<ul style="list-style-type: none"> Once/Annual Active on working days Published daily Once/Annual 	<ul style="list-style-type: none"> Active on working days Irregular Each batch of products Updated annually 	<ul style="list-style-type: none"> Performed annually Active on working days Performed annually Performed annually Updated annually Performed annually 	<ul style="list-style-type: none"> Irregular Irregular Performed if necessary Active on working days Updated annually 	<ul style="list-style-type: none"> Updated annually Irregular Irregular Updated annually
Responding Chapters	CH1. Corporate Mission and Vision CH3. Corporate Social Responsibility - Economy CH5. Corporate Social Responsibility - Society	CH4. Corporate Social Responsibility - Environment CH5. Corporate Social Responsibility - Society	CH2. Corporate Social Responsibility and Sustainability Issue Management CH3. Corporate Social Responsibility - Economy CH4. Corporate Social Responsibility - Environment	CH4. Corporate Social Responsibility - Environment CH5. Corporate Social Responsibility - Society	CH2. Corporate Social Responsibility and Sustainability Issue Management CH3. Corporate Social Responsibility - Economy	CH 2. Corporate Social Responsibility and Sustainability Issue Management CH4. Corporate Social Responsibility - Environment	CH3. Corporate Social Responsibility - Economy CH4. Corporate Social Responsibility - Environment

Note

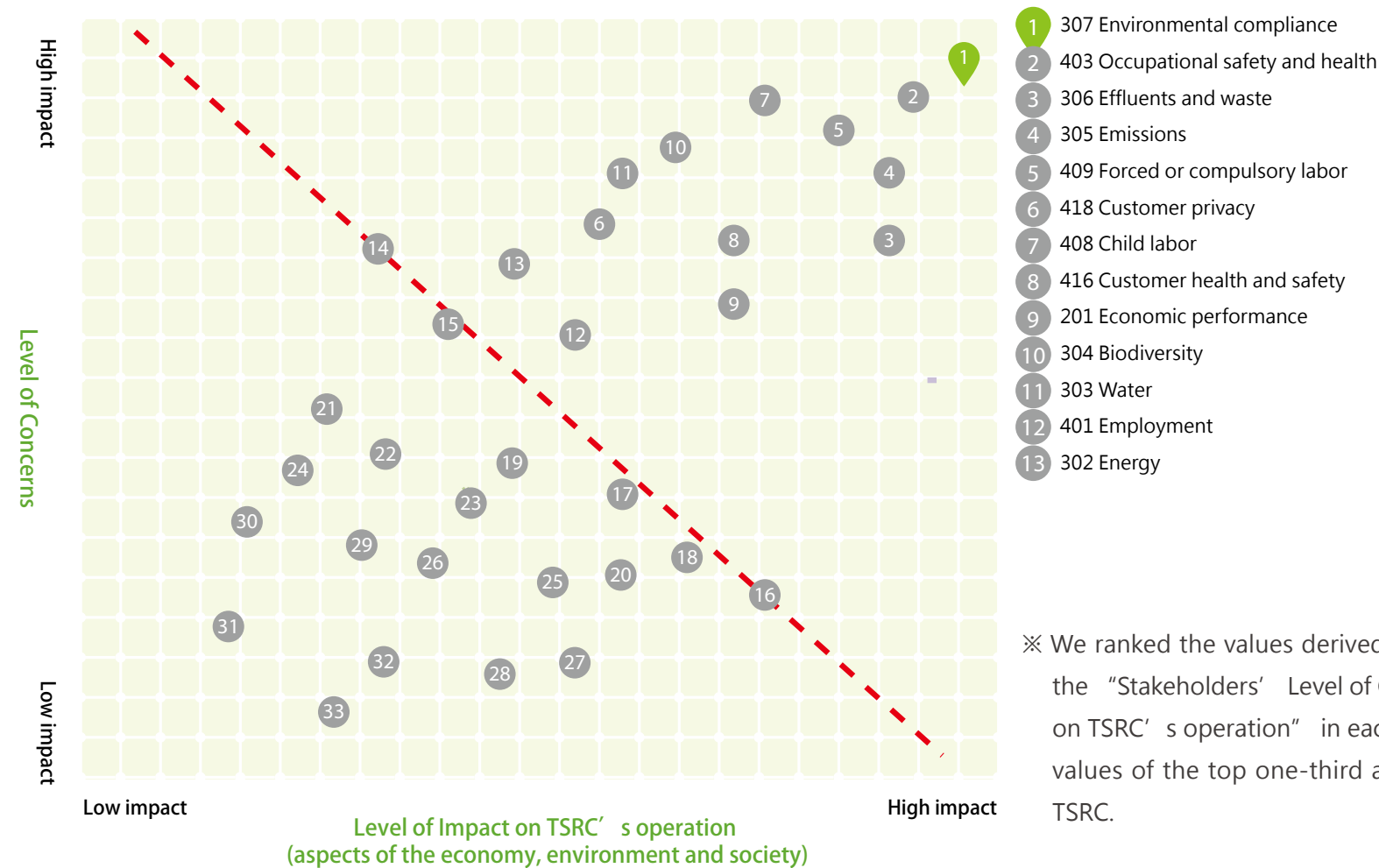
1. Included the community/Non-Governmental Organization/residents affected by operation activities etc.

2. Mainly focused on the competent authority.

In accordance with TSRC's "Guidelines on Corporate Social Responsibility Report", the CSR Promotion Secretariat defined the 2019 material issue matrix after the approval of the CSR Steering Committee to establish the prior short-term, medium-term and long-term objectives. There are 13 material issues in total.

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Analysis Result of Material Issues



※ We ranked the values derived from multiplying the scores of the “Stakeholders’ Level of Concern” and “Level of Impact on TSRC’s operation” in each issue and used the issues with values of the top one-third as the annual material issues of TSRC.

Boundaries of Material Issues

For every material issue identified, we assess its impact and determine whether the issue has influence on the primary stakeholders inside or outside the organization.

Material Issue		GRI Specific Issues	Value Chain of TSRC				UN Sustainable Development Goals, SDGs
			Procurement Phase (Supply chain)	TSRC Production		Primary Stakeholders Affected	
				Headquarters	Subsidiaries		
UN sustainable development goals	Energy	302	---	●	●	Government	<div><div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div><div>6 CLEAN WATER AND SANITATION</div><div>13 CLIMATE ACTION</div><div>7 AFFORDABLE AND CLEAN ENERGY</div></div>
	Emissions	305	●	●	●	Society	
Green production	Water	303	--	●	●	NA	
	Effluents and Waste	306	●	●	●	Investors, media and Society	
Sustainable environmental protection	Biodiversity	304	--	●	●	NA	
	Environmental Compliance	307	●	●	●	Investors and media	
Ethical management	Economic Performance	201	●	●	●	Investors and employees	<div>8 DECENT WORK AND ECONOMIC GROWTH</div>
Labor equality	Employment	401	●	●	●	Employee	
	Child labor	408	●	●	●	Government and customers	
	Forced or Compulsory Labor	409	●	●	●	Employees and government	
Safe production	Occupational Health and Safety	403	●	●	●	Employee	<div>8 DECENT WORK AND ECONOMIC GROWTH</div>
Customer first	Customer Health and Safety	416	--	●	●	Customer	<div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div>
	Customer Privacy	418	●	●	●	Customer	

Icon	Description
NA	Not applicable
●	Fully disclosed in this Report
--	Information is unavailable

Note: There were no significant changes in the value chain of TSRC in 2019.

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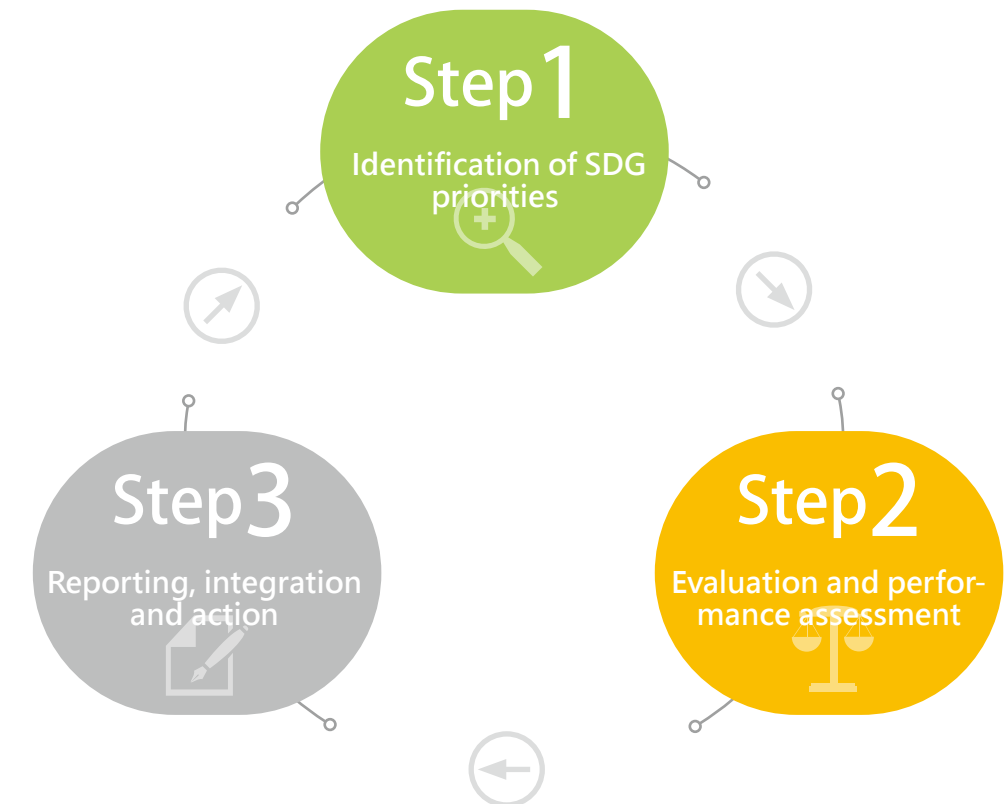
Boundaries of Material Issues

TSRC Material Issues Corresponding to UN SDGs

TSRC Material Issues Corresponding to UN SDGs

In 2015, the UN released the SDGs which have since become a common language for sustainable development around the world. The SDGs are not just a global trend in development but also contain important business opportunities for companies in the future. TSRC uses the material issues assessed with the GRI Standards as basis to conduct evaluation regarding risks to humans and environment and the provision of effective products, services or investment and to identify the sustainable development goals related to the SDGs with the aim to make vital contribution to the SDGs.

TSRC enhances its sustainability strategy to advance economic growth, social equality/progress and environmental protection on a comprehensive basis to demonstrate the long-term value of TSRC. In 2019, TSRC defined priorities for the SDGs. We will disclose our performance in sustainable development with respect to the product life cycle and value chain stages in the transition from supporting the SDGs to real action plans. We will integrate these goals into our daily activities through various approaches and keep reviewing and modifying the SDG priorities in the future to gain recognition from investors and stakeholders and create sustainable values. The issues, practices, and goals from sustainable development will be disclosed in the relevant chapters.



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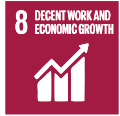
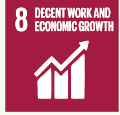

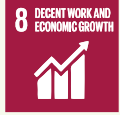
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TSRC Issue	GRI Specific Issue	Related SDGs Items	Description of UN SDGs	Practice and Goals of TSRC's Sustainable Development	2019 Achievements	2020 Goals
Energy saving and carbon reduction	GRI302 Energy		Ensure that everyone has access to affordable, reliable, sustainable and modern energy. 7.3 By 2030, double the global rate of improvement in energy efficiency.	We continue to promote the ISO 50001 energy management system and use more energy-efficient means for product production to lower energy concentration. Goal: The annual average power saving rate reaches above 1% on average.	The power saving rate increased 0.11% in 2019 compared to 2018.	The average power saving rate reaches above 1% on average.
	GRI305 Emissions		Take urgent action to combat climate change and its impact. 13.2 Integrate climate change measures into policies, strategies and planning.	We engage in greenhouse gas reduction and management in line with the goal set by the competent authorities: The greenhouse gas emissions in 2050 are 50% or less of those in 2005.	The greenhouse gas emission per unit product was 1.21 (ton carbon equivalent/ton) in 2018, which was lower than the emission of 1.25 (ton carbon equivalent/ton) in 2019.	The greenhouse gas emission in 2020 will reduce 2% compared to the emission in the base year (2005).
Green production	GRI303 Water GRI306 Effluents and Waste		Ensure that everyone can enjoy water resources and health facilities under sustainable management 6.3 Various approaches will be used to improve water quality and substantially increase the recycling volume of waste and its safe reclamation on a global basis in 2030.	TSRC actively promotes water conservation measures through increasing wastewater recycle rate of the production process, production capacity adjustment and other methods, and discusses water conservation and wastewater reduction goals in the management review meeting of ISO14001 regularly to fulfill the goal of continuous improvement.	The water consumption intensity per unit product was 10.45 (ton/ton) in 2019, which was lower than the emission of 10.71 (ton/ton) in 2017.	For the recycle project of the process water, Shen Hua Factory will meet the goal of reducing 5% of total wastewater.
Sustainable environmental protection	GRI304 Biodiversity GRI307 Environmental Compliance		Ensure to implement the sustainable consumption and production mode 12.5 We expect a substantial reduction of waste by 2030 through prevention, reduction, recycling, and reclamation. 15.1 Protect, maintain and promote the sustainable use of the ecosystem in the domain	Implement reduction of waste, recycling and management pursuant to ISO 14001 Environment Management System to ensure sustainability of the environment. TSRC Corporation actively made green and beautified the environment of all factories to reduce the impact on local species.	TSRC was the first one company in the chemical industry to complete the assessment of the material flow cost accounting (MFCA) for SBR/BR/TPE.	We will continue to comply with ISO14001 environmental risk prevention and maintain the spirit of continuous improvement.
Ethical management	GRI201 Economic Performance		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.2 Achieve higher levels of economic productivity through diversification, technological upgrading and innovation.	We continue to increase our revenues and enhance economic productivity through patents, R&D and innovation. [Goal] Substantially increase the total revenues and continue to boost the current profit rate.	We complete the transformation for differentiation, such as the medical production line in Nantong Factory and the shoe material production line in Vietnam.	Our operation gradually marches toward the direction of high-value products.

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TSRC Issue	GRI Specific Issue	Related SDGs Items	Description of UN SDGs	Practice and Goals of TSRC's Sustainable Development	2019 Achievements	2020 Goals
Labor equality	GRI 401 Employment GRI 408 Child Labor GRI 409 Forced or Compulsory Labor		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.7_Eliminate compulsory labor, modern slavery and trafficking in persons; prohibit and eliminate the most abominable child labor and terminate child labor of all kinds in 2025.	By the coordination between the ISO 45001 Occupational Safety and Health Management System and related requirements of the International Labor Organization (ILO), TSRC controls the emerging issues such as the psychosocial hazards at work and forced labor to ensure there is no complaints. Facilitate an inclusive and sustainable economic growth and realize full and productive employment, such as care of employees and prohibition of child labor. All factories continuously undertake the commitment of not using child laborers.	The case of child labor was 0.	We meet the risk prevention of labor rights specified by ILO and maintain the spirit of continuous improvement by ISO45001 and conduct CSR promotions for new suppliers
Safe production	GRI403 Occupational Safety and Health		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.8_Protect labor rights and promote safe and secure working environment for all workers.	Through the ISO 45001 occupational safety and health management system, we have established our "Safety and Health Policy" to disclose that our core value is human-focused. We will pursue the goal of zero accidents and zero injuries through the principles of "technology", "safety and health culture", "responsibility" and "communication".	We derive the requirements from ISO45001 to respond to the ILO and complete all safety signs on the site by first language	We introduce respiratory protection requirements related to VOC to meet the corresponding compliance requirements of ISO45001
Customer first	GRI416 Customer Health and Safety GRI418 Customer Privacy		Ensure sustainable consumption and production patterns. 12.6_Encourage companies, especially large and transnational companies, to adopt sustainable practices (release of sustainability reports).	Based on the concept of product life cycle, we ensure the transparent product information and the user safety via REACH Regulations inventory and SDS, and disclose the sustainability indicators and reports to all customers to gain the trust. [Goal] Release sustainability reports annually, reply to customers' sustainability questionnaires and ensure there is no customer complaints due to the disclosure of customer privacy.	The CSR annual report passed the assurance and was released publicly before June 30, 2019.	The CSR annual report passed the assurance and was released publicly before Tuesday, June 30, 2020.
Safe production	GRI403 Occupational Safety and Health		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.8_Protect labor rights and promote safe and secure working environment for all workers.	Through the ISO 45001 occupational safety and health management system, we have established our "Safety and Health Policy" to disclose that our core value is human-focused. We will pursue the goal of zero accidents and zero injuries through the principles of "technology", "safety and health culture", "responsibility" and "communication".	We derive the requirements from ISO45001 to respond to the ILO and complete all safety signs on the site by first language	We introduce respiratory protection requirements related to VOC to meet the corresponding compliance requirements of ISO45001.

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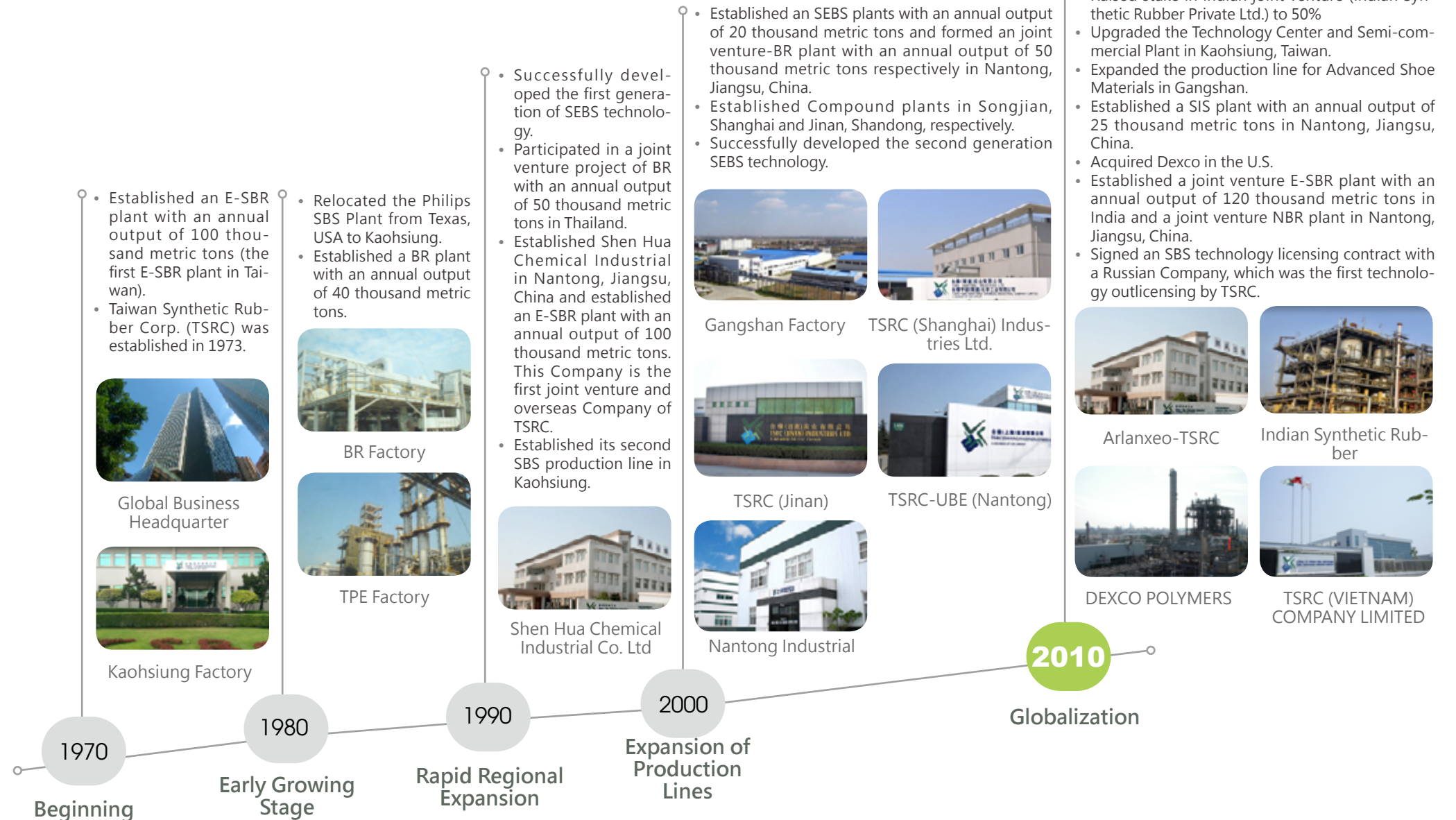
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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC' s Sustainable Development
Ethical man- agement	Economic Performance		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.2_Achieve higher levels of economic productivity through diversification, technological upgrading and innovation.	We continue to increase our revenues and enhance economic productivity through patents, R&D and innovation. Goal: Substantially increase the total revenues and continue to boost the current profit rate.

Financial Performance

As a responsible enterprise to the stakeholders, besides releasing the financial report every month, TSRC holds a shareholders’ meeting and investor conference every year. Appropriate financial information is disclosed on the Public Information Observation Post. Shareholders may submit proposals in writing in the annual shareholders’ meeting in accordance with the regulations of the Company Act. Moreover, Investor Relations Pages are set up on the Company’ s website in traditional Chinese, English and Simplified Chinese editions. Regularly updated financial information and corporation conference presentations are available for the investors’ reference. Shareholders and investors can also use the Investor Relations Mailbox to express their questions and suggestions, and all relevant information can be queried in the TSRC Investor Relations Pages or Public Infor-

mation Observation Post. We believe that all efforts will improve the operation and information transparencies of TSRC, so that the investors may have access to more relevant information when making investment decisions.

The primary products of TSRC are the bulk synthetic rubber products based on BR and SBR, followed by the widely used TPE. The Company will continue to promote the med- to long-term development strategy in the future. In addition to the primary business of bulk synthetic rubber products, we will achieve the five-year operational goals through three main strategies, namely organic growth, enhanced business portfolio and increased profit.

The consolidated revenue of TSRC was about NT\$28.9 billion in 2019. The sales of the syn-

thetic rubber accounted for 93.77% of the total revenue and the main export countries were China, USA, Thailand, Germany, Turkey, Japan and Italy; the sales of the non-synthetic rubber accounted for 6.23% of the total revenue and the main export countries were Southeast Asia, Europe and USA.



Investor conference is held on a regular basis

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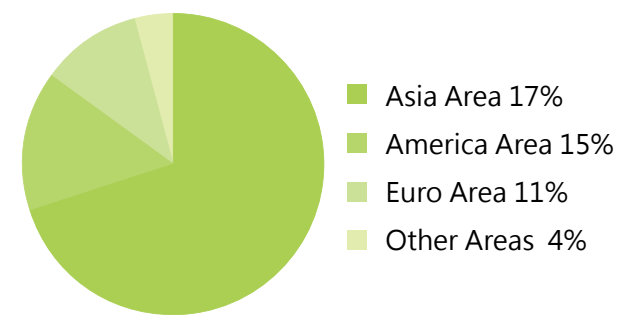
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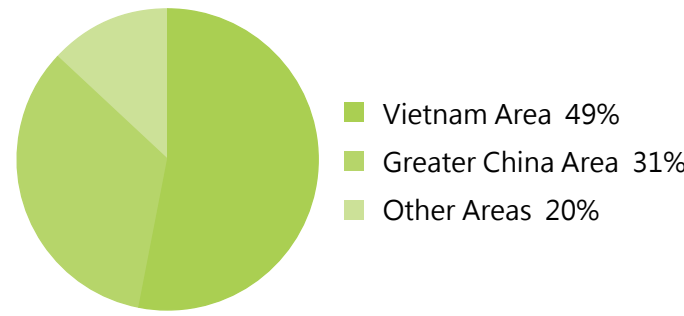
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2019 Sales territory ratio of the synthetic rubber



2019 Sales territory ratio of the non-synthetic rubber



Financial Figures

Unit: Thousand NTD

Items		2017	2018	2019
Financial Ability	Operating Revenue	31,766,237	29,751,218	28,910,723
	Total Assets	28,999,341	30,230,169	32,514,923
Profitability	Net Profit after Tax	849,717	1,233,670	817,120
	Earnings Per Share after Tax (NTD)	1.06	1.44	0.90

* Information in this table is extracted from the consolidated financial statements of TSRC and the subsidiaries.

TSRC Annual allocated economic value (% in revenue)

Year	Operating Cost	Employee Salary and Benefits	Payments to the Shareholders	Payments to the Government
2017	96.9%	6.2%	2.6%	0.9%
2018	90.4%	7.0%	2.7%	1.3%
2019	96.8%	7.6%	2.8%	1.5%

Note:
1. Operating Cost: The cost and expense for the business operation (excluding the employee salary and benefits).
2. Employee Salary and Benefits: This includes the expenses of the salary, labor and health insurance, retirement funds, and other benefits.
3. Payments to the government: This refers to all taxes paid.
※ For more detailed business performance and financial information, please see the TSRC Annual Financial Report.

Technology and R&D Overview

Unit: Thousand NTD

Items	2017	2018	2019
Operating Revenue	31,766,237	29,751,218	28,910,723
R&D Expenditure	375,550	387,948	389,840
R&D Expenditure/Operating Revenue (%)	1.2	1.3	1.3

To respond to the rising awareness of CSR operation in the world, the major R&D direction of TSRC still focused on applying advanced environmental protection process to develop new high value-added products and technology to satisfy our customers with our products and services. By solving the rubber usage problems of the customer, we created a win-win situation.

Through the R&D centers in Kaohsiung and the USA and a complete global supply chain system, TSRC has built a platform for communication with the R&D teams of the main customers to jointly develop high-quality and innovative products, accelerate product differentiation and transformation of industrial application, and develop high-value-added markets. TSRC seeks a place in high-value markets including medical treatment, lubricating oil viscosity modifier, high-quality shoe materials and environmental protection tires. TSRC also gradually boosts the sales and profit of new products, including assessment on the application of materials in the operational integration plan for the Greater China region with the aim to increase economic benefits. The total amount of the R&D expenditure was NT\$ 389 million in 2019.



Planned new product development

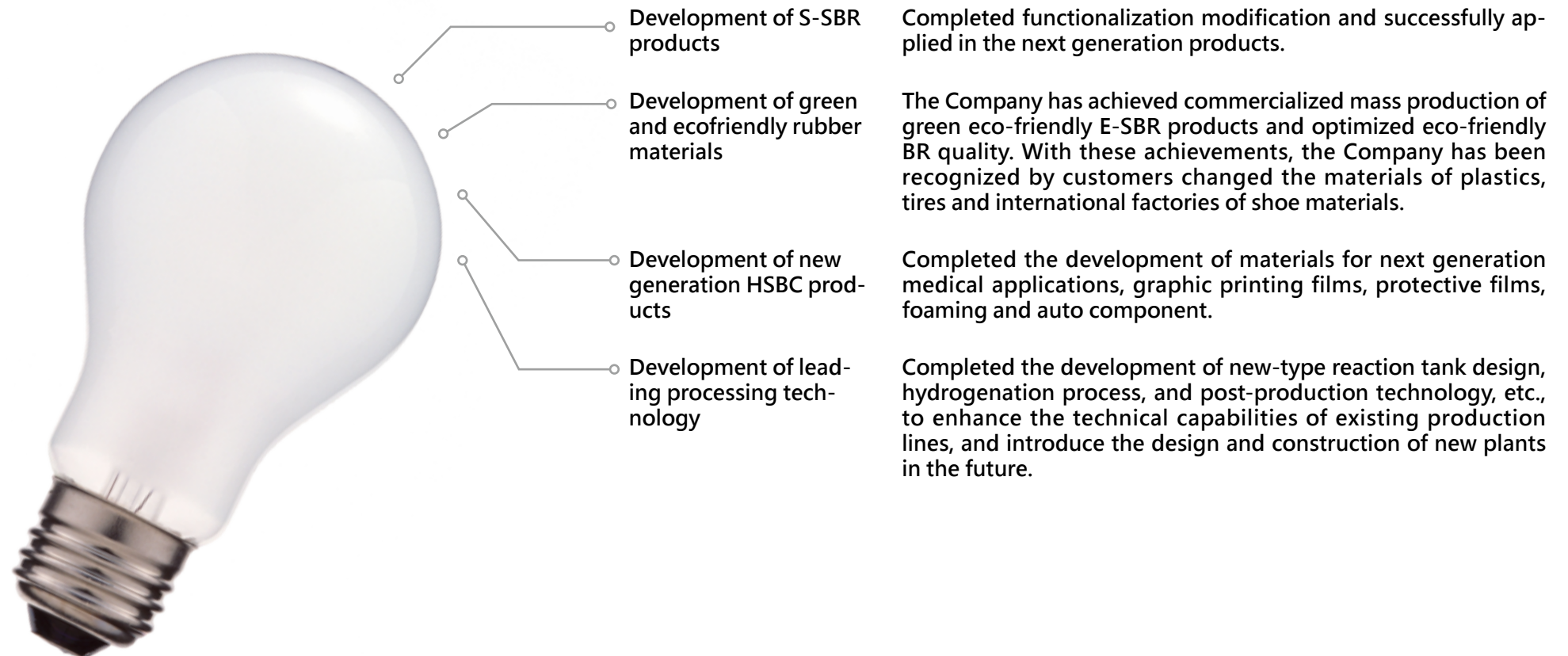
- Continue to develop microstructure control technology platform for next generation of S-SBR products and build partnership with customers to jointly develop in customized products.
- Develop differentiated application for the SBC products, such as high-end medical materials, customized shoe materials, thin printing and protective film, lubricant viscosity modifier, etc.
- Continue to develop new BR technology platform and apply it in the development of new products to fulfill the high shading and impact resistance needs for customers who changed the materials of plastics while enhancing the processability, rolling resistance and abrasion resistance of tire and shoe materials.
- Continue to build the optimal process technology and integrate into the new factory design with the highest quality products.



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TSRC actively applies for patents to protect the results of Research and Development and advance production processes as differentiated tools against the competitors. 11 patents were awarded in 2019.

Successfully developed technologies or products



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Memberships in Association and Organizations, Cooperation

To fulfill its CSR and meet the expectations of external stakeholders, TSRC has adequately assessed and actively participated in the plans of domestic and foreign industrial associations and organizations. TSRC is firmly committed to its CSR and gives concerns and work from all aspects in order to make substantial contribution regarding sustainability issues. Key industrial associations and organizations where TSRC has memberships:

Association name	Operation	Expected benefits
Petrochemical Industry Association of Taiwan	<ul style="list-style-type: none">The general meeting is held annually.The Petrochemical Industry Journal is published every month/The Petrochemical Industry Annual Report is published every year.	<ul style="list-style-type: none">Develop the whole petrochemical industry and collect information about the petrochemical industry.Maintain good relationship with other petrochemical companies to solve common problems.
Taiwan Rubber & Elastic Industries Association	<ul style="list-style-type: none">The general meeting is held annually.Information about rubber technologies is provided.	<ul style="list-style-type: none">Maintain and develop good relationship with downstream manufacturers.Collect information about rubber processing technologies.
Dashe Petrochemical Industrial Park Manufacturers Association	<ul style="list-style-type: none">Hold regular meetings to discuss and solve the common problems of the companies in the industrial park (including Good Neighbor Feedback activities).	<ul style="list-style-type: none">Participate in the operation of the Association to protect the rights and interests of the Company in the industrial park, collect the information on other companies, and solve common problems.
The Institute of Internal Auditors - Chinese Taiwan	<ul style="list-style-type: none">Organize theoretical and practical researches, workshops, discussions and visits with respect to the internal audit and promote audit education.	<ul style="list-style-type: none">Introduce the latest theories and practices of internal audit, improve the audit capability, and exchange experience in internal audit techniques with other companies.

Association name	Operation	Expected benefits
Human Resource Managers Association of Petrochemical Companies	<ul style="list-style-type: none">Organize regular activities, exchange information, and communicate and coordinate human resource related policies.	<ul style="list-style-type: none">Understand the status of the industry and keep close contact with other companies.
Industrial Safety and Health Association of the R.O.C.	<ul style="list-style-type: none">Hold one general meeting every year to review the operation of the Association.	<ul style="list-style-type: none">Collect relevant information on occupational safety and health to facilitate inspection and coordinate of industrial safety.
Ren Da Industrial Park Association for Promoting Labor Safety and Health	<ul style="list-style-type: none">The administration center holds regular meetings.	<ul style="list-style-type: none">Exchange safety and health information with other factories, provide supports with safety equipment, discuss safety and health issues and propose relevant suggestions.
Taiwan Responsible Care Association	<ul style="list-style-type: none">Hold the general meeting on a regular basis, reflect the opinions of the members to the government, and organize relevant training courses.	<ul style="list-style-type: none">Understand the responsibility of the petrochemical industry to the society in Taiwan and improve the performance in the environment, health and safety on an ongoing basis.
International Institute of Synthetic Rubber Producers (IISRP)	<ul style="list-style-type: none">Hold the annual meeting every year.	<ul style="list-style-type: none">Collect the information on the global synthetic rubber to form international horizons.

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Association name	Operation	Expected benefits
Chinese National Association of Industry and Commerce, Taiwan	<ul style="list-style-type: none"> Provide members with relevant information and promote international economic and trading cooperation. Organize trading and investment events as well as technology discussion and visiting activities for the industries. 	<ul style="list-style-type: none"> Understand the status quo of the industry and facilitate communication with other companies.
Safety & Health Association of Taiwan	<ul style="list-style-type: none"> Hold one regular meeting every year. 	<ul style="list-style-type: none"> Prevent accidents with respect to safety, health and environment and perform relevant investigation, research, implementation and prevention.
Association of Bio-based Material Industry	<ul style="list-style-type: none"> The members hold regular meetings by rotation. Provide e-paper for the members to collect more information about the industry. 	<ul style="list-style-type: none"> Explore the development trend of biomass technology, promote technical exchange in the industry, facilitate cooperation with other companies and participation in large-scale cooperative programs, and strive for external supports.
Taiwan Chemical Industry Association	<ul style="list-style-type: none"> Hold the annual industrial forum and TSRC dispatches representatives for the forum. 	<ul style="list-style-type: none"> This is the window for international communication and cooperation. It follows the international development trend and leads the chemical industry in Taiwan to bring innovation and transformation into practice.

Association name	Operation	Expected benefits
Benjou Industrial Park Manufacturers' Association, Gangshan, Kaohsiung	<ul style="list-style-type: none"> Hold regular meetings to discuss and solve the common problems of the companies in the industrial park. 	<ul style="list-style-type: none"> Participate in the operation of the Association to protect the rights and interests of the Company in the industrial park, collect the information on other companies, and solve common problems.
China Rubber Industry Association	<ul style="list-style-type: none"> Hold one industrial production technique exchange meeting every year. Hold forums and seminars on an irregular basis. 	<ul style="list-style-type: none"> Communicate the information of the industry and the latest development in the technique, production, safety and environment. Facilitate the healthy and long-term development of the industry.
Nantong Standards Association	<ul style="list-style-type: none"> Hold one annual meeting every year. Hold forums on an irregular basis. 	<ul style="list-style-type: none"> Understand the development of the international standardization in a timely manner, give effective guidance in the evaluation of quality indicators, and improve the quality development of the products.
Production Safety Management Network, Nantong Economic and Technology Development Area	<ul style="list-style-type: none"> Hold one board meeting every quarter 	<ul style="list-style-type: none"> Maximize the capability of corporate safety production management and continue the improvement of the self-control, mutual control and joint control capability for the safety production in the area where the factory is located to effectively prevent occurrence of accidents.


 SUSTAINABLE DEVELOPMENT

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Corporate Governance

To comply with the spirit of corporate governance and implement it effectively, TSRS adopts the candidate's nomination system for the director election and the directors selected at the shareholders' meeting form the Board of Directors, which is TSRC's business execution organization. The chairperson of the Board of Directors presides over the shareholders' and board of directors' meetings internally and represents TSRC externally. The Board of Directors of TSRC participates in the relevant corporate governance course organized by the Taiwan Securities and Futures Institute (SFI) and Taiwan Corporate Governance Association (CGA) every year and acquires the annual advanced study credits of the directors. We establishes the "Board of Directors Authority Regulations" and "Level of Authority Table for TSRC and Subsidiaries", to specifically regulate the authority of the Board of Directors and authorization of the management, clearly divide the responsibilities between the Board of Directors and the management and constantly enhance the functions of the Board of Directors for effective management and supervision.

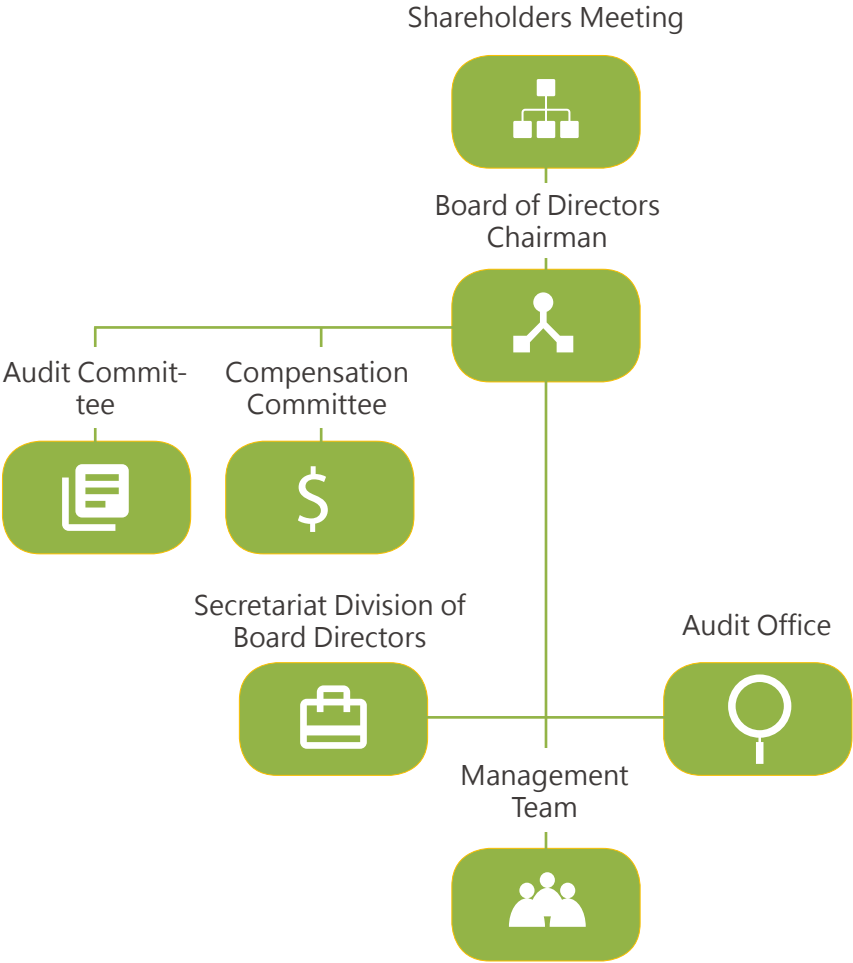
All the directors and employees shall comply with the "Ethics Code of Conduct" and "Official Business Operation Code of Conduct" when performing their duties. We bring our decision on ethical management

into practice in our corporate culture declaration of mission, vision and core competences. The above-mentioned regulations explicitly provide that violations of any regulations are subject to the punishment specified in our "Rewards and Disciplinary Operating Regulations"; no employee is allowed to make use of his/her duties for personal benefit or to obtain any gains for his/her relatives when dealing with business or carrying out any procedures; an internal procedure for reporting violations, punishment and appeal is available. We regularly review the "Corporate Mission, Vision and Value," the "Core Competencies" and "Management Competencies," request compliance from all relevant personnel, and implement these in the annual performance evaluation of employees. Any violation of the regulations shall be subject to the "Rewards and Disciplinary Operating Regulations".

The CSR Steering Committee of TSRC established the "CSR Declaration" in 2012, including the compliance with respect to the trade, investment, contracting, supply, and operational development and all the rest business and employee relationships. Regulations on ethics, labor, environment, health and safety, management system, corporate governance, and social engagement are also available to ensure fulfillment of our corporate social responsibility.

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TSRC Corporate Governance Organization Chart



Board of Directors

TSRC Board of Directors is the highest governance unit of the Company. The directors are elected at the shareholders’ meeting. The Company business shall be conducted based on the resolutions of the Board of Directors, except for the business to be resolved at the shareholders’ meeting in accordance with the provisions specified in the laws and regulations or the “Articles of Incorporation” . The main responsibilities are to establish the Company’ s internal control system and procedures related to financial risks, determine and approve the Company’ s development strategies, supervise the Company’ s operational objectives, appoint and supervise the Company’ s management team, ensure effective operations of the governance systems, verify the audit systems for the internal financial accounting, and assess the operation risks. Currently, the Board of Directors has 7 directors (among them, three are 3 independent directors) and there are functional committees such as the Audit Committee and Compensations Committee set up under the Board of Directors. Each Committee assists the Board of Directors in enhancing its management and supervision functions within their individual authorities.

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The members of the TSRC Board of Directors shall have the wealth of knowledge, business experience and industrial judgment capable of executing their job duties (note), including operating judgment, accounting and financial analysis capabilities, business management capabilities, crisis management capabilities, industrial knowledge and international market perspectives to achieve the ideal goals of the corporation governance.

Note: Please see the annual report of TSRC for the educational background and experience of the directors

Anti-Corruption, Confidential Non-Disclosure Policies

TSRC has established and announced the ethical code of conduct on external official website to reach the consensus on ethical standards with the Company' s directors and managers and enable the stakeholders of the Company to understand more about the Company' s ethical standards. Also, this prevents the insider trading, avoids a conflict of interest between the Company and individuals and eliminates the opportunity for personal benefit. Any non-public information that may potentially influence the Company' s stock price shall be kept strictly confidential.

Since the promotion of CSR, TSRC has expected the voluntary actions that transcend law compliance and sustainable growth by integrating CSR into core operation process. For the compliance of all employees, we establish internal regulations such as "Confidential Information Management Regulations," "Personal Information Operation Management Regulations" and "Official Business Operation Code of Conduct" to protect the Com-

pany' s intellectual property rights, confidential information and the personal information of the customers and employees. Through the new employee training, electronic bulletin board and other publicity means, we clearly request the employees to use the resources and assets effectively, protect the business secrets, prevent insider trading and antitrust regulations, conduct fair trade, avoid conflict of interest between the Company and the individual, eliminate the opportunity to take private interests, prohibit bribery, follow the network access regulations, and comply with part-time job rules when executing relevant internal and external business within the scope of the work assigned by the Company. A corresponding punishment system is also available.

TSRC upholds the position on not to participate in public policy lobbying and does not make political contributions, but encourages employees to fulfill their civic responsibilities and participate in public election voting. We approve leave for these reasons according to relevant laws. TSRC is concerned and pays attention to the public affairs that affect the industry, economy and the life of the employees.



General shareholders' meeting is held on a regular basis

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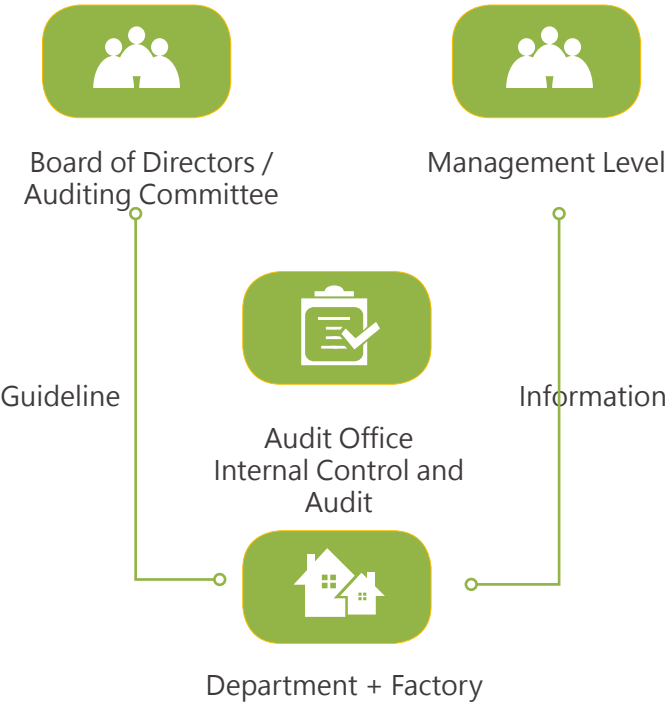
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TSRC Risk Management



Internal Control, Establishment and Implementation of the Internal Audit System

The Audit Office is directly under the Board of Directors. It is responsible for auditing the internal control system and following up dis-

covered defects and abnormal activities until they are improved. Audit reports and self-evaluation results are submitted to the Board of Directors and the management for review. The internal control system includes the internal audit system. In addition to the annually scheduled self-evaluation of the internal control system, we review, amend and establish or revise important control operations at any time in response to the internal and external environmental changes. Such review, amendment and establishment or revise must be reviewed and approved by the Board of Directors. With the internal audit and control system, TSRC promotes the soundness of the corporate operation.

The risk management of TSRC is conducted through existing departments or functional units in the organization. Our external related issues includes economic issues, social / cultural issues, political issues, regulation / law issues, technique / technology issues, competitor / market (industrial status) / customer and environmental issues. Internal related issues includes the corporate value, corporate culture,

corporate knowledge, corporate performance, production management capability, sales capability, human resources management capability, product development capability, financial capability, information capability and environmental management etc.

We identify possible risks / incidents that may have impact on business objectives, decide appropriate response measures after assessment to mitigate, transfer or avoid risk. The functioning department of the TSRC reports to the management about the risk environment, risk management emphasis and risk assessment that the Company encounters and the adaption measures every year in compliance with the internal control system, assessment system, and management system review. The auditing unit reports to the Audit Committee on a regular basis. The Audit Committee made suggestions with respect to the risk assessment and its impact and reports to the Board of Directors.

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Scope of TSRC Risk Management

Strategy Aspects

- Compliance and adjustment to law changes
- Policy development
- Impact of the change in the corporate image on the crisis management of the Company
- Industrial market changes and market demand
- Impact of the change in the technology and industry on the financial cooperation of the Company

Operation Aspects

- Intellectual property rights
- Recruitment of talents
- Corporate image
- Expected benefits from expansion of the factory building
- Risk brought about by concentrated purchase or sale

Finance Aspects

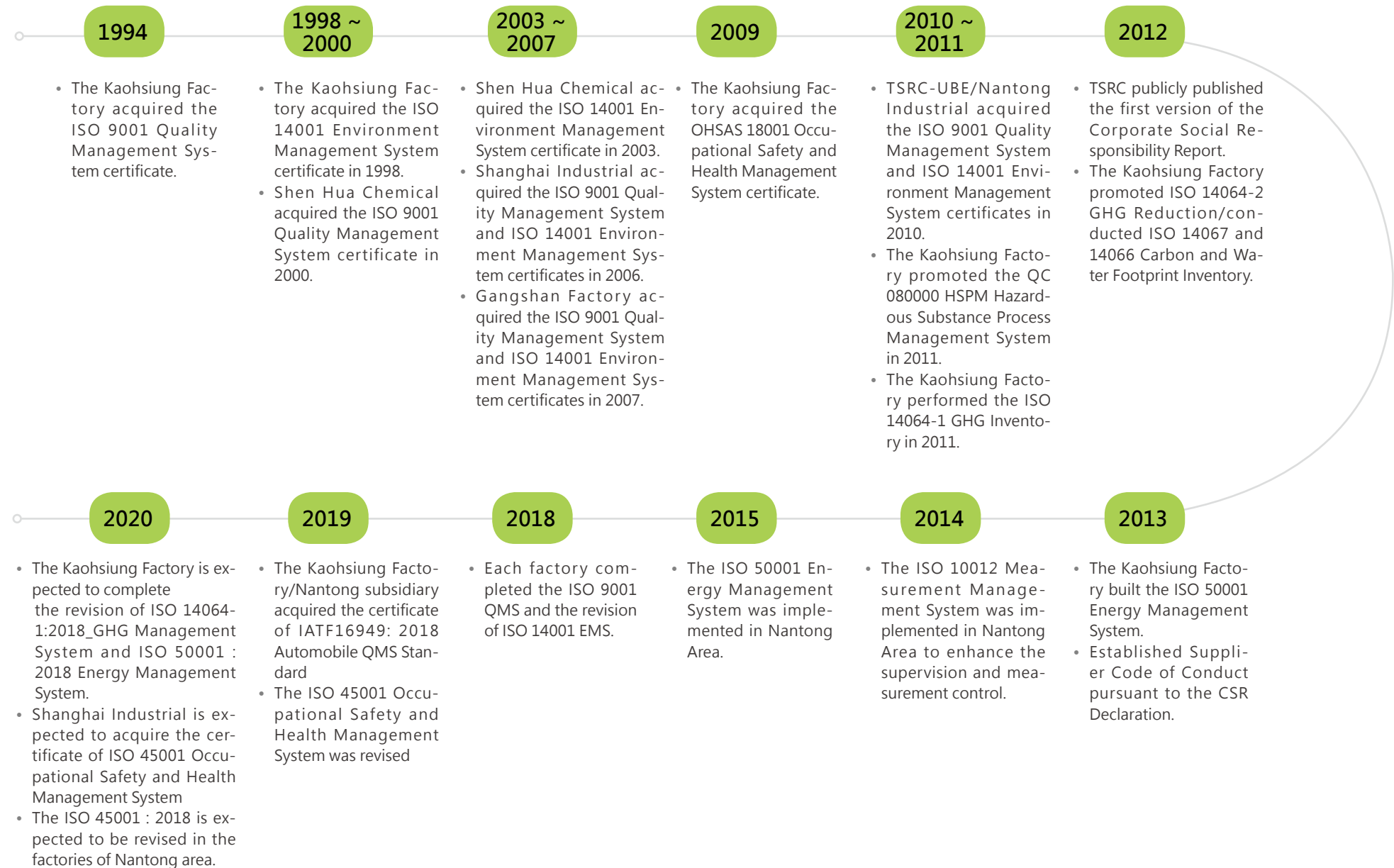
- Interest rate and exchange rate
- Inflation
- Strategic investment

Hazard Aspects

- Earthquake and other natural disasters
- Fire or chemical spills
- Energy resources supply interruption
- Information safety risk

For the risk management, there is an explicit division between the Company and each affiliate in the management objective and authority with respect to the personnel, assets and finance. We establish a firewall mechanism for information safety. The audit unit executes internal audit and control measures to ensure control of the risk and compliance with relevant laws and regulations. In addition, we establish corresponding standard operation procedures, such as the “Crisis Operation Management Regulations” and “Emergency Response Operation Management Regulations” to ensure the crisis management of material emergencies such as fire, chemical leak, information service interruption, supply chain interruption, environmental events or external water and electricity supply interruption.

External advocacies



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Supply Chain Management

TSRC is devoted to creating good partnership. Being a leading company in the synthetic rubber industry, we are committed to the sustainable development of the service value chain in cooperation with the suppliers and dealers. Our supply chain management system is established based on creation of value. Instead of the traditional mode in which the quality, cost, and trading procedure are the core, we select partners carefully and find potential opportunities by identifying and managing the risk they may occur to the supply chain in the governance, environment and society aspects in the hope to build a supply chain structure that can provide sustainable competitive advantages and create a new business model for sustainable development. Mean-



while, TSRC pays attention to the close partnership with the supplier chain. There was no significant adjustment to the suppliers of the main materials in 2019.

Basic Policy of TSRC's CSR Procurement

- TSRC is devoted to CSR and encourages our partners to promote open and fair competitive business activities based on fairness and ethics for the long-term profits and sustainable operations of us and our partners.
- TSRC believes that the members of the supply chain play a very important role in the execution and development of the CSR and expects that our partners will agree on and spare no efforts to fulfill their social and environmental responsibilities, and take these as a guideline of their business.
- We expect that our partners will follow TSRC's Partner Code of Conduct (PCC), including the categories of environment, occupational safety and health, human rights/ethics and labor policies, and ensure that the products and services provided comply with all national and other applicable laws and regulations.
- TSRC will first select the suppliers that are in compliance with the PCC.

Hazardous Substances Free Policy

Comply with HSF (Hazardous Substances Free) related laws and regulations. Meet customer product's environmental requirements. Continuous improvement in environmental protection standards and production of HSF (Hazardous Substances Free) products.

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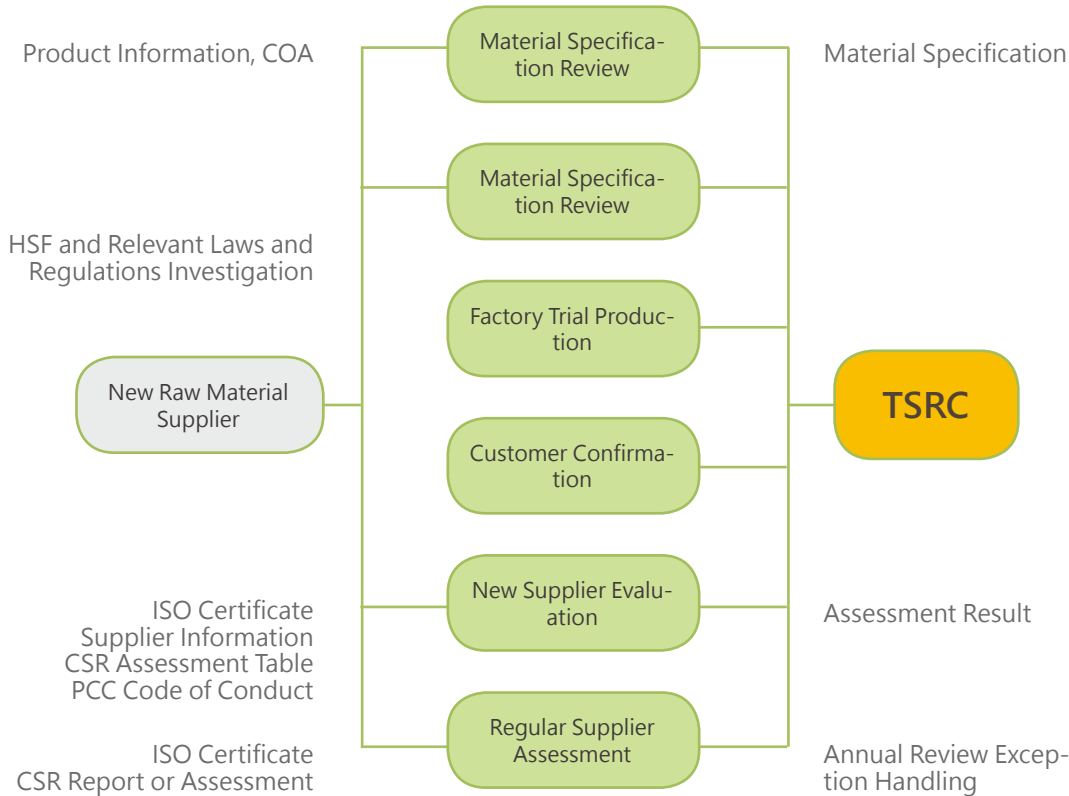
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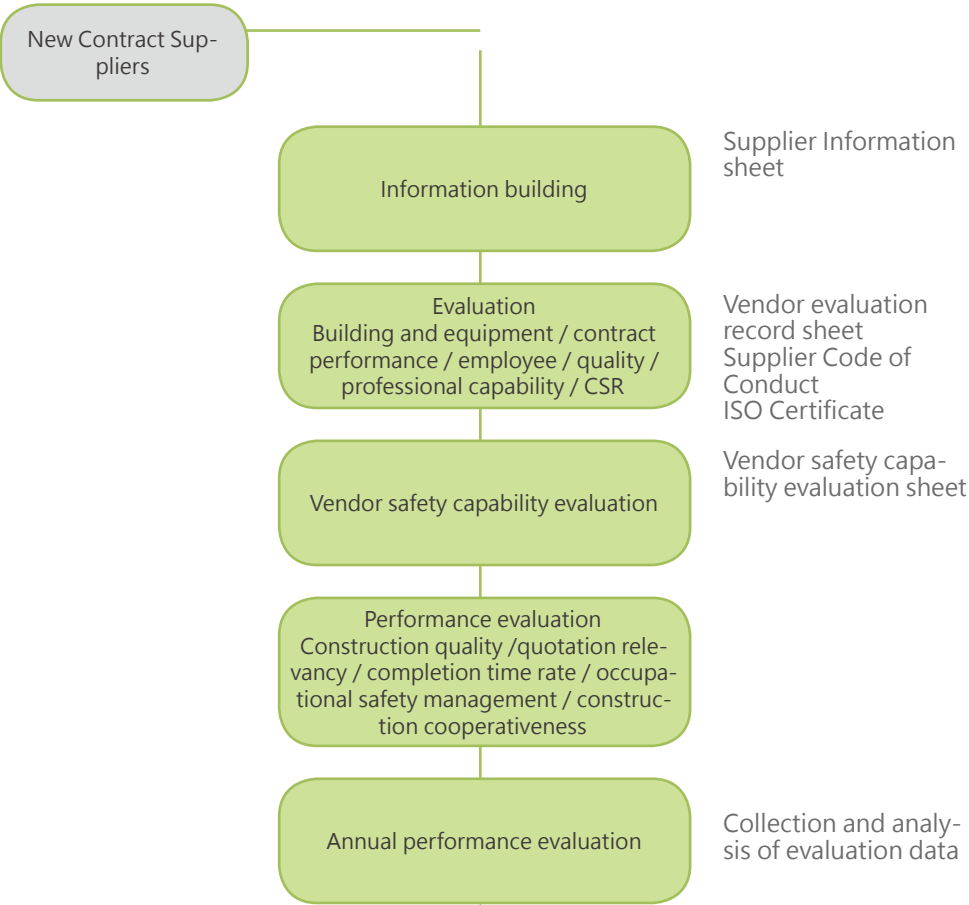
TSRC is devoted to creating good partnership. Being a leading company in the synthetic rubber industry, we are committed to the sustainable development of the service value chain in cooperation with the suppliers and dealers. By implementing the supplier HSE management audit and CSR dissemination system in the development of the occupational safety and health/environment management systems, we identify and manage the risk they may occur to the supply chain in the governance, environment and society aspects in the hope to build a supply chain structure that can provide sustainable competitive advantages.

New Supplier Selection

Raw Materials Supplier Selection Procedure



Contract Supplier Selection Procedure



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In supplier selection, the procurement department implemented “Hazardous Substance Free (HSF)” graded management and control measures and request a Chemical Material Safety Data Sheet from the supplier, even for trial chemicals, to ensure the raw materials in the TSRC products are in compliance with the HSF specifications. All departments shall select the suppliers that have passed relevant system certification; all new suppliers are required to pass the TSRC’s CSR evaluation process in all three aspects of environmental, economy and society (e.g. supplier CSR report or CSR evaluation sheet). We uphold the principle of fairness to select suppliers.



Green Procurement Excellence Award

Supplier Cooperation and Win-Win Situation

We evaluate and score the qualified suppliers every year with respect to the product quality (including the demand for Hazardous Substance Free), delivery punctuality, cooperativeness, and industrial safety management. In the communication between the suppliers and TSRC, in addition to the routine communication between TSRC purchasing personnel and suppliers, both parties can communicate via the established SAP, such as amendment of the supplier data, and purchase order inquiry and confirmation.

In addition, TSRC establishes the “Partner Code of Conduct (PCC)” pursuant to the CSR Declaration, including categories of the environment, occupational safety and health, human rights/ethics and labor policies. We encourage the suppliers to follow all national and other applicable laws and

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公告編號	公告主旨	截止日期
ANN1503001	新增車輛加裝滅火器	2015-12-31
ANN1502001	轉知二次工業區服務中心對道路交通安全要求	2015-12-31
ANN1411001	採購車輛認作廠說明	2015-12-31
ANN1312001	台橡供應商行為準則	2015-12-31

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明日橡膠，今天開始

關愛社會及環境，共創和諧

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supplier platform of TSRC <http://srm.tsrc-global.com>

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regulations of their respective countries to become a sustainable leading company. We also encourage them to establish their own code of conduct and extend this action to the supply chain.

We request our partners to observe the local laws and regulations, ban forced / compulsory labor, and ensure legal work hours, wages, and welfare benefits. TSRC has included ISO 9001, RoHS (HSF), QC 080000, ISO 14001, ISO45001, CNS45001, and CSR as important indicators in the selection of the suppliers. We request our suppliers to observe the regulations on the

freedom of assembly and association, abolition of child labor, and elimination of forced/ compulsory labor to maintain the basic human rights. No violations were found in 2019 pursuant to the evaluation results in accordance raw materials supplier CSR evaluation sheet.

In addition to the strict prohibition of child labor, we conduct investigation of the suppliers via the CSR evaluation sheet and request the partners to develop and engage in activities related to the overall welfare of employees under local laws and regulations. If any supplier is found violating any of the aforementioned reg-

ulations, the "TSRC's Vendor Management Procedure" shall apply. According to the raw materials supplier re-assessment plan, we conducted the CSR self-assessment investigation to the targeted suppliers and the on-site audit for 2 suppliers in 2019. The investigation results all complied with the CSR requirements of TSRC.

We also expect that the partners may participate in the relevant management mechanisms of labor, safety and health, environment, and ethics to ensure sustainable development of the company and achieve a win-win situation for both parties.



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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC' s Sustainable Development
Customer first	Customer health and safety Customer privacy		Ensure sustainable consumption and production patterns. 12.6_Encourage companies, especially large and transnational companies, to adopt sustainable practices (release of sustainability reports).	Based on the concept of product life cycle, we ensure the transparent product information and the user safety via REACH Regulations inventory and SDS, and disclose the sustainability indicators and reports to all customers to gain the trust. [Goal] Release sustainability reports annually, reply to customers' sustainability questionnaires and ensure there is no customer complaints due to the disclosure of customer privacy.

Product Responsibility and Customer Relationship

From the development to waste, all products of the TSRC have passed the health and safety impact assessment and control. When marketing products in this trend, we assess the competitiveness of the products in the perspective of health and safety, and actively demonstrate the advantages of our products when contacting the customer in the product exhibition. In consideration of the global environmental protection and the energy-saving awareness leading the development trend of green synthetic rubber, we begin to develop environmental-friendly rubber material and promoted this concept to customers and communicated the efforts we made with them. We emphasize our operating philosophy of sustainable products on websites, during the visit to the customer or in any open occasions (such as conferences and product launch presentations).

Considering that the impact of a product on the environment, human health and safety in the life circle is usually decided at the phase or R&D and trial mass production. We develop all of our products with the global environment, safety management of chemical substances and other relat-

Quality Policy

We are committed to meet and exceed customer' s expectation in products' and services' quality through the principles of "Do It Right the First Time" and "Accountability" in continuous quality improvement.

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ed laws and regulations as the standards, and do not commence the mass production without confirming the conformity. The rubber products specification, performance and usage notes provided by TSRC will be listed in the Certificate of Analysis (COA) and Safety Data Sheet (SDS ^{Note)}, to allow the customers to understand the safety usage method, and the Q/A hotline to make every effort in helping the customers receive the needed information. SDS must be attached with the first shipment to each customer, clearly marked with material information, waste treatment, and conditions of use. Besides being queried on the official website, SDS can also be provided to the customer at any time upon demand.

Note : SDS (Safety Data Sheet): TSRC controls the addition, amendment and the application for preparation of the versions with different languages regarding the SDS based on the "Regulations for Product Safety Data Sheet Operation Management" .



We take the sustainability into account throughout all processes in the product life cycle. By integrating the internal responsible units to improve customer’ s satisfaction, we provide more convenient services for the customer and pay attention to the protection of privacy and transaction safety. We also conduct satisfaction surveys in terms of the quality (including HSF), delivery time and cooperativeness on an irreg-

ular basis. If the customer needs a HSF investigation, it will be checked against the Chemical Substance (Product Safety Assessment) Database established by the TSRC. We will respond to the customer’ s needs in accordance with the “Hazard Substance Free Management Operation Procedure” .

We explicitly specify the commercial ethics terms in our “CSR Declaration” and require fair transaction, advertisement and competition; standards for the fair transaction, advertisement and competition shall be established with measures to protect the customer’ s information. All of our products are produced, labeled and sold in accordance with related national product regulations, including GHS regulations, Fair Trade Act, protection of intellectual property rights and Personal Data Protection Act. There were no fines or cautions due to the violation against the product safety and health

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regulations and voluntary specifications or any voluntary violation events; there were also no violation against the marketing regulations and infringement in terms of product liability in 2019.

In 2019, TSRC did not receive any complaints from the external parties confirmed by the organization or from the regulator in relation to the customer privacy, nor violated any financial and business-related domestic or international policies or laws. We had not been penalized by any monetary fines or involved in any events of corruption or anti-competitive behavior.



CIT Training

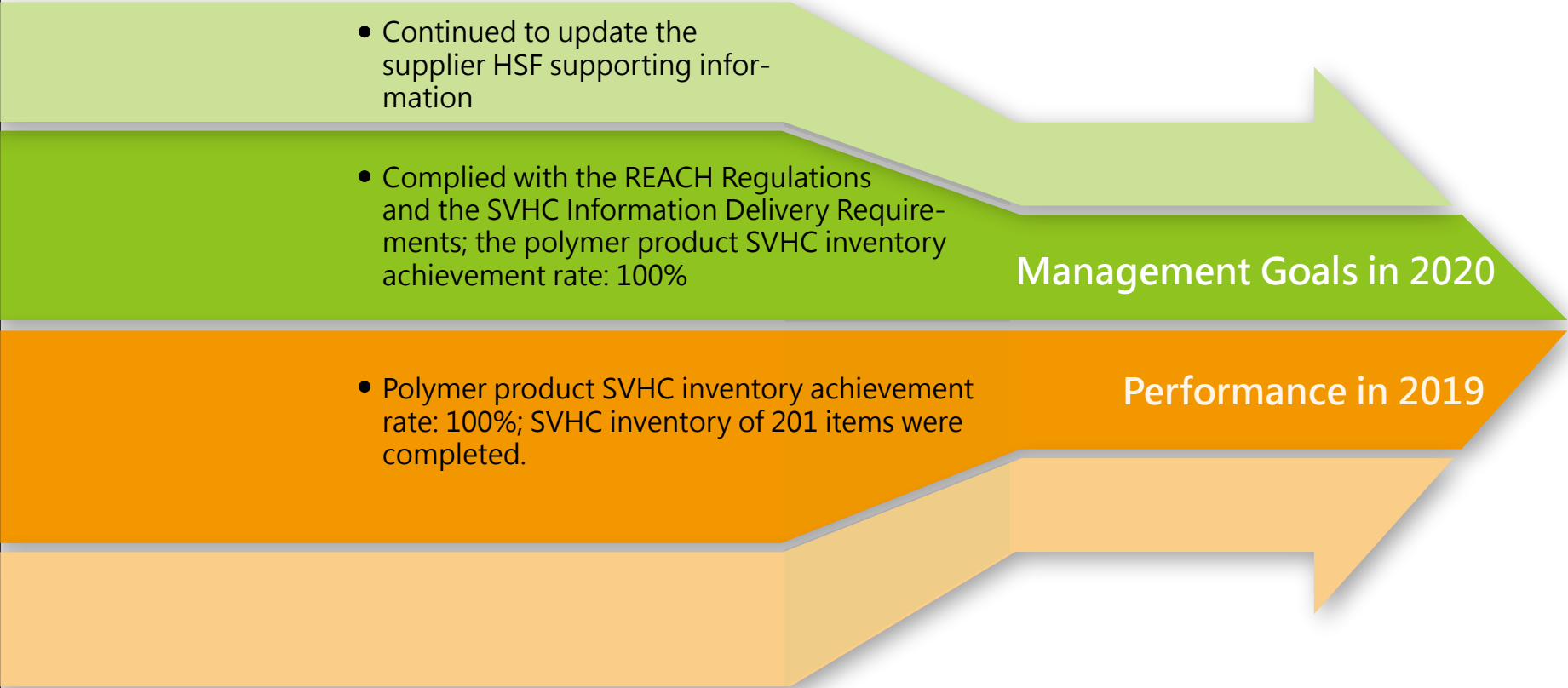
TSRC establishes the hazardous substance free management system in the Kaohsiung Factory, Gangshan Factory, and the factory in the Nantong area for compliance and continues to use the “Green Supply Chain Information Management Platform” to assess and manage the HS information on supplier’s raw materials and the chemical substance database for different products to ensure that all the raw materials are in compliance with international environmental protection directives/specifications such as the regulations on RoHS, the latest EU chemical policy (REACH), and requirements for Substance of Very High Concern (SVHC). In addition to establishing the “Hazardous Substances Free Management Procedure” to ensure providing the customer with HSF products, we continue to manage the supplier’s sustainability issues and further achieves the goal of the “Hazardous Substance Free” or “Hazard Substance

Reduction” to ensure that the composition of the chemical substance in the raw material, packaging material, semi-finished product and finished product complies with the laws, regulations, and the requirements of the customer’s specifications in the hope to reduce the residue of toxic substances in the product, improve the quality of the product, fulfill the Corporate Social Responsibility, and realize the commitment to the customers. In recent years, while the fairness and reasonableness of the raw material sources become more and more important in the international community, such as the Conflict Minerals Rule established by the US Securities and Exchange Commission (SEC) Note 1 and other relevant specifications. Therefore, after making the assessment in cooperation with the customer, we confirm that the raw materials of the supplier and TSRC’s products are in compliance with the requirements of the Conflict Minerals Free (CMF).

In 2019, TSRC received the request from the customers for inspection of the substances. All of them were assessed pursuant to the management procedure and a corresponding statement was provided as a reply.

Hazardous Substances Free Policy

- We comply with the HSF (Hazardous Substance Free) related regulations to meet the customer's requirement for eco-friendly products.
- We continuously enhance the environmental standards of the product and manufacture HSF (Hazardous Substance Free) products.



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Customer Satisfaction

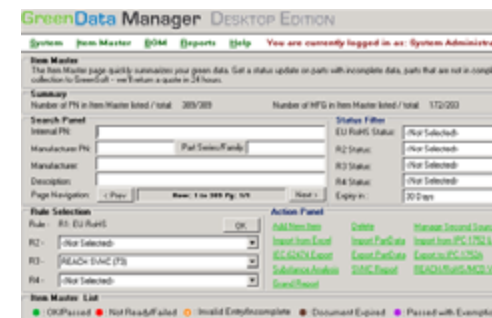
TSRC believes customer satisfaction affects customer loyalty. To understand whether the products and services meet the real needs of the customers and whether there is any needs for improvement, TSRC performs the annual customer satisfaction survey toward major customers and collects feedback via E-mail/customer interviews or daily business with customers. We classify, make statistic and graphic data based on the collected information and



CIT Achievement Presentation

proceed on the comparative analysis with 5 grades. By studying and planning improvement measures toward the customer' s dissatisfactions, we follow up the implementation of the improvement measures to further enhance the quality of our products and services.

TSRC values our customers. We always uphold the concept of "Customer First" and establish a close working relationship with



(GDM : Green Data Manager System)

customers to pursue better product quality continuously. For the comments and requirements submitted by our customers who audit our Company in the field, we have acted accordingly through our teamwork execution to operate with a more precise/stringent quality management system. In 2019, we provided customers with improvement reports for all non-compliance matters addressed during the audit. All improvement measures addressed had been implemented completely. To fully understand the needs of the customer, TSRC conducts a satisfactory survey on a regular basis and executes the review at the regular management review meetings in the hope to meet the expectations of the customer.

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Enhancing the Quality Culture of the Company

To improve the customer’ s satisfaction with our product quality, we try our best to meet the requirements of the customer. TSRC promotes the continuous improvement activities by establishing 7 Continuous Improvement Teams (CITs) (across all subsidiaries) since 2018. With the methods of QC7 / 8D / KT / DOE experimental design and a series of tests and pre-suppositions, regression analyses, professional education and training of the statistical software, TSRC uses problem analysis/logic and statistic approaches to make improvements with respect to the issues related to the quality and production process capability on an ongoing basis. The CIT with outstanding performance will be rewarded at the end of the year.

We also encourage employees to propose Error Cause Removal (ECR) proposals for improvement. In 2019, the departments of TSRC put forward a total of 95 proposals and at least 79 were adopted and rewarded with a prize above the Proposal Award. In addition, the Total Productive Management (TPM) was thoroughly implemented in Kaohsiung and Nantong factories. Each department created a full-system production and repair activity in which all the employees participated to improve the overall efficiency of the equipment and the productivity of the laborers, reduce the market complaints and minimize the losses of all kinds.

By the sustainability questionnaire survey (e.g. Supplier Code of Conduct, HRP (Human

Rights Protection Policy) or systematic collection of sustainability information (e.g. CDP Supply Chain Questionnaire, CSR Assessment-EcoVadis) in relation to the stakeholders (e.g. the customer and investor), the factory properly responds to the requirements of the stakeholders. For this, Dexco Polymers in the USA was recognized by winning a silver medal in the field in 2020.



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Energy Management Policy

Comply with regulations and carry out energy consumption audit/review.

Improve energy consumption through utilization of high-efficiency equipment.

Continuous improvement in GHG (Green House Gas) emissions reduction.



Environmental Policy

Cherish the earth resources and fulfill our responsibilities for environmental protection.

Commitment to continuous improvement and business sustainability.

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TSRC Issue	TSRC Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC's Sustainable Development
Energy saving and carbon reduction	Energy		Ensure that everyone has access to affordable, reliable, sustainable and modern energy. 7.3 By 2030, double the global rate of improvement in energy efficiency.	We continue to promote the ISO 50001 energy management system and use more energy-efficient means for product production to lower energy concentration. Goal: The annual average power saving rate reaches above 1% on average.
	Emissions		Take urgent action to combat climate change and its impact. 13.2 Integrate climate change measures into policies, strategies and planning.	We engage in greenhouse gas reduction and management in line with the goal set by the competent authorities: The greenhouse gas emissions in 2050 are 50% or less of those in 2005.

Greenhouse Gas Management and Reduction

The 2019 greenhouse gas (GHG) emissions of TSRC Group were 597,920 tons of CO2 carbon dioxide equivalent, calculated with the internal CSR indicator management system. Scope 1 was 262,458 tons and Scope 2 was 335,462 tons.

The global warming and the hazard of haze enhance the concern of the people about the air quality and GHG emission. We take proper corporate social responsibility with this respect and install air pollution control systems and monitoring equipment in all factories and continue the check of relevant facilities to prevent production of air pollutants. We also establish concrete energy management regulations and set reasonable goals, and take our responsibility

for the environment by way of audit, training, and communication.

In addition to establishing the standard procedure for greenhouse gas verification and the implementing the greenhouse gas inventory, our Kaohsiung Factory has completed the greenhouse gas inventory and external verification. The inventory results are registered in the "Environmental Protection Administration, Executive Yuan - National Greenhouse Gas (GHG) Registry" . Among the subsidiaries in China, Shenhua Chemical, Nantong Industrial and TSRC-UBE finished the 2019 GHG inventory according to ISO 14064 and the key enterprise GHG emission reporting system of Jiangsu. In 2019, TSRC used the certified method and the

TSRC CSR indicator system to finish the internal calculation of greenhouse gases. With a systematic environmental management model, we continue to increase the efficiency of the energy use (using clean fuel), reduce the operation cost and decrease the greenhouse gas emission to achieve the continuous improvement goal of carbon reduction.

Through the greenhouse gas inventory, TSRC understands the direct GHG emission with the black coal (China Area) and natural gas (Taiwan Area) as the largest sources, and indirect GHG emission mainly is the external purchase of electricity. Therefore, the focus of carbon reduction is continually focused on replacing black coal and fuel oil with low-carbon fuel and saving electricity.

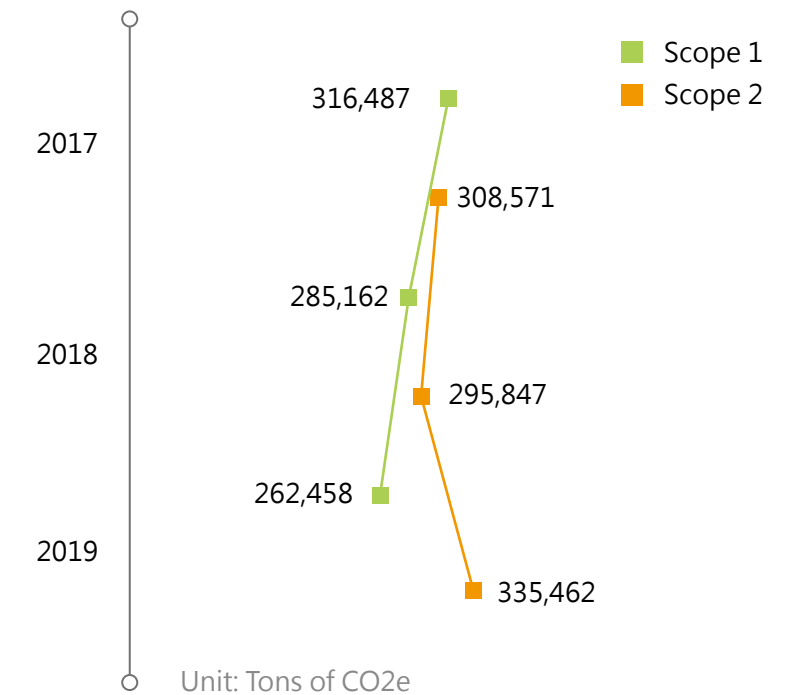
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For the low-carbon specific action, the Kaohsiung Factory uses natural gas as fuel to replace dark oil. We also broaden the assessment and use more compatible devices with the clean fuel as a substitute for the fuel oil. With all the above measures, our emission intensity per unit product was 1.2 (tons of CO₂e/ton) in 2019. We promote the clean production process, strengthen the internal autonomy to improve resource efficiency and equipment performance, reduce pollution sources, substitute raw materials, reclaim waste to minimize the environmental burden and track the change of the environment using different management systems.

In Taiwan Area, we comply with the boiler emissions standard in the "Emission Standard of Air Pollution from Combustion Equipment in Kaohsiung City". Also, we continue to monitor the air pollution emissions to make sure the emissions fit the related requirements of the air quality indicator (AQI). In China Area, we also act in line with "different energy-saving and emission-reduction requirements" and construct the LADR (Leak Detection and Repair) to monitor the emissions to set energy saving and emission reduction as an important goal of optimizing the economic structure, promote the green loop low-carbon development, and accelerate the construction of an ecological civilization.

We make capital investment to strengthen the production process improvement and equipment efficiency enhancement, and promote actionable energy saving and carbon reduction measures every year. The greenhouse gas emission of TSRC in 2019 was 16.7% lower than the emission in 2005 (Base year), and the first phase of the target had been achieved. We are committed to reducing the greenhouse gas emission by 2050 to less than 50% of the emission in 2005 to show the Company's determination in the promotion of energy saving and carbon reduction.

Annual GHG emission volume of TSRC Group



Note:

1. Scope 1: Direct Greenhouse Gas Emission: Greenhouse gas emission from the Company owned or controlled greenhouse gas emission sources.
2. Scope 2: Energy Indirect Greenhouse Gas Emission: Greenhouse gas emission from the Company purchased electricity, heat and steam and other energy.
3. Greenhouse Gas of Scope 3 is all the other indirect Greenhouse Gas emissions not directly controlled by TSRC. The fixed qualitatively identified emission source when performing Greenhouse Gas inventory includes: employee commutes, business travel, outsourced logistics/repair and outsourced waste disposal landfill and incineration, and other activities.
4. The total yield of the Group increased about 7.8% in 2019 in comparison with 2018 but the total emission only increased 2.9%.

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Other Air Pollutants Discharge Management

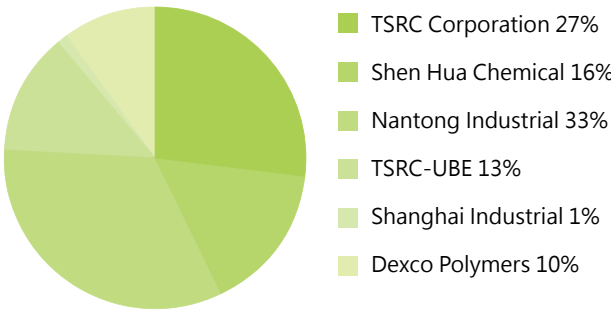
To avoid the impact on the ambient air quality, TSRC installs air pollution prevention and control equipment and automatic boiler chimney exhaust monitoring system in accordance with the requirements of the laws and regulations. The equipment and system have received the permits for installation and operation and to monitor the air quality in the factory (e.g. Kaohsiung Factory executed the OP-FTIR detection in 2017 and finished the summarized monitoring report). We continue to monitor, analyze and track the inspection results to ensure that

all the emissions in factory comply with the provisions of the laws and regulations. So far, the air pollutants discharged in all major operation bases include VOCs, NOx, and SOx.

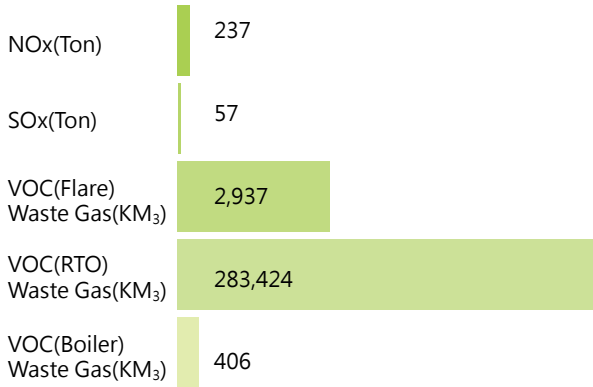
We have received legal permit for operation of the pollution prevention and control equipment and automatic boiler chimney exhaust monitoring system in the factory and conducted regular inspection of the emissions from the exhaust flues. We continue to monitor, analyze and track the inspection results to ensure that

all the emissions in factory comply with the provisions of the laws and regulations.

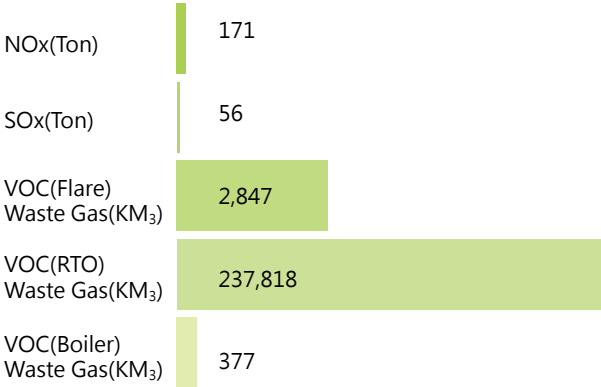
2019 GHG emission ratio of the Group's affiliates



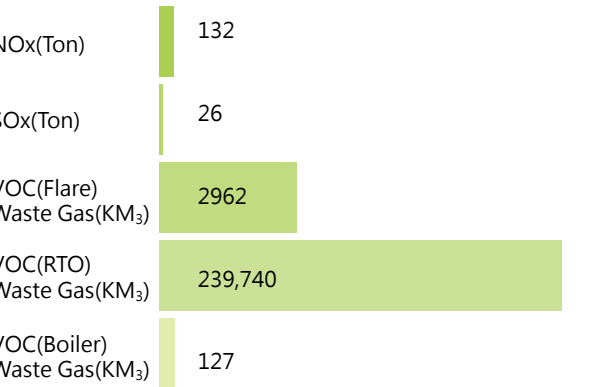
2017 Volume of Air Pollution Emitted by TSRC Group



2018 Volume of Air Pollution Emitted by TSRC Group



2019 Volume of Air Pollution Emitted by TSRC Group



Note:

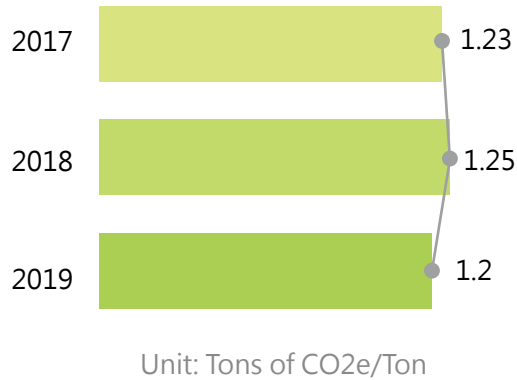
1. There was no such air pollution emission in Shanghai.

2. The great improvement in TSRC's production process has resulted in the increase of waste gas emission in the production process in 2017; the current production process is stabilized and relatively the RTO emission has decreased obviously.

3. The subsidiaries in China continually terminated the use of the boiler since the end of 2018 by enabling the RTO.

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TSRC Group' s GHG emissions intensity per unit product



Energy Conservation

TSRC uses the energy management system to perform the audit operation, which helps analyze energy use and consumption status, and we can thus establish energy performance indicator based on major energy consumption areas. TSRC strives for enhanced energy utilization efficiency to reduce energy consumption, continue to improve production process, upgrade equipment, and recycle materials to achieve the objective of energy conservation and control every year.

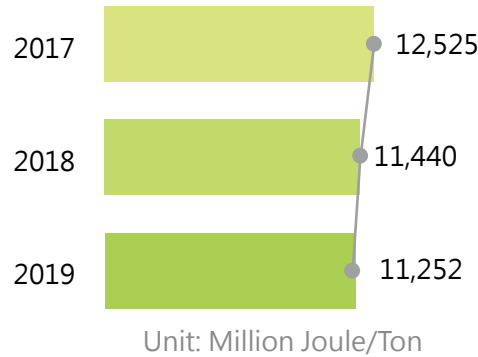
Given the fact that electricity is critical for the production, the Kaohsiung Factory is equipped with heat and power station. TSRC is also committed to equipment transformation, site management, office equipment improvement and other aspects to implement energy-conservation measures. By performing the inventory pursuant to the ISO 50001 Energy Management System, we thoroughly check the equipment consuming more energy and create baseline data to establish the energy conservation objectives. Only recognizing our own position and future direction in the global wave of carbon reduction after understanding our own GHG total emissions and energy intensity can we effectively save the energy and reduce emissions.

In terms of product development, we developed a thermoplastic rubber material in order to enhance energy conservation during the use stage. This product is between traditional rubber and plastic. It is recyclable and has the basic properties for reprocessing, and is more effective in reducing environmental pollution

and energy consumption. AMD continues to be committed to a foaming ultra-lightweight material. Through the foaming technology, the use of raw materials accounts for only 30 to 50% of the original general plastic or rubber materials. It not only greatly reduces the consumption of raw materials, but also minimizes the burden on the social environment in terms of the finished products.

To ensure a sustainable environment on the earth, the “clean energy” has become the goal internationally and green energy is being developed to facilitate the circular economy.

TSRC Group' s Energy Consumption Intensity per Unit Product



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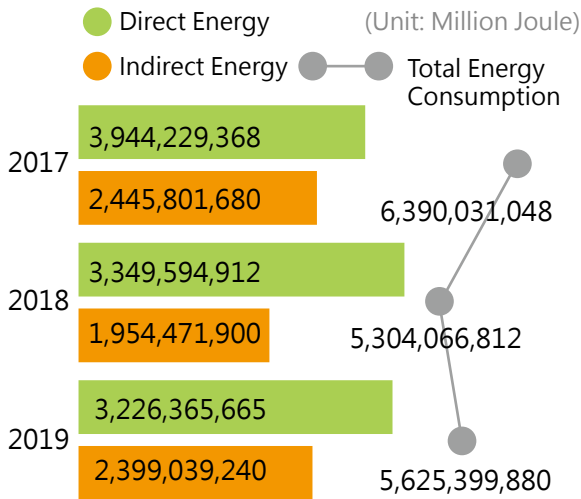
These policies are in compliance with the TSRC' s idea of clean production. We also participate in the GHG emission inventory and energy saving programs.

And, in addition to the GHG emission inventory, the department of the TSRC sets up the ISO

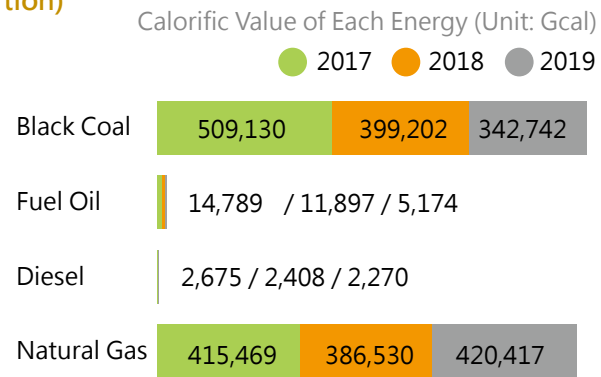
50001 Energy Management System one after another to check the process efficiency, system, and relevant regulations in order to ensure the energy efficiency of all the TSRC factories. TSRC will continue to consolidate the energy performance plans by conducting energy review aiming at the factories consuming more energy

such as Kaohsiung and Nantong, and develop energy saving objectives on the existing energy baselines, put energy saving measures into practice by implementing the ISO 50001 Energy Management System, and regularly review the operational results.

TSRC Group Energy Consumption

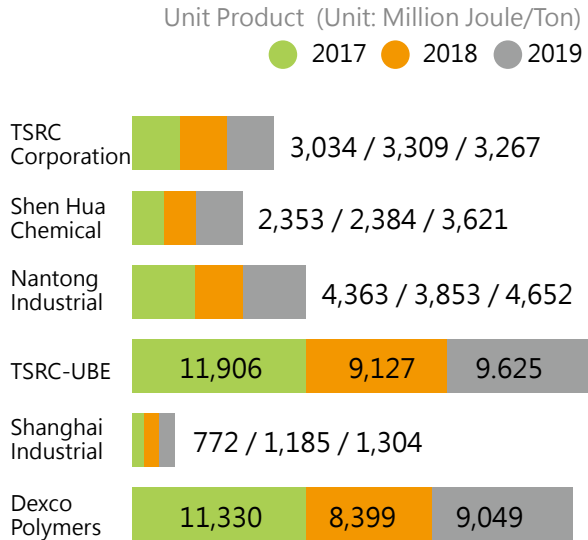


TSRC Group' s Direct Energy Consumption (Coal Oil and Natural Gas as Major Consumption)



- Note:
1. Each Metric Ton of Black Coal = 5.6 Gcal
 2. Each Kiloliter of Diesel = 8.8 Gcal (1 Kiloliter = 0.8304 Ton)
 3. Each Kiloliter of Fuel Oil = 9.6 Gcal
 4. Each Cubic Meter of Natural Gas = 9.0 Gcal
 5. 1 Gcal = 4,186.8 MJ = 0.0041868TJ
 6. 1 mscf=28.317m3
 7. For the energy consumption in each area, black coal is mainly used in the China Area while natural gas is the main energy in Taiwan Area and the USA Area.

TSRC Group' s Indirect Energy Intensity (Electricity and Steam as Major Consumption)



- Note:
1. The heat absorption needed to vaporize a ton of water = 2260000J/kg (vaporization heat of water) x 1000 kg = 2,260,000,000 J = 2,260 MJ
 2. 1 Degree = 1 Kilowatt-Hour (KW/H), 1W = 1 J/S, 1000 Degrees = 1000kW*3600S/H = 3,600,000 KJ = 3600 MJ

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The energy saving measures and items of the factories in 2019 are as follows:

Taiwan Area (Kaohsiung Factory)

- The old ammonia compressor (PC-3203) was replaced with new ones, saving 14% of power consumption
- The ammonia compressor (PC-311A) was replaced along with the installation of the corresponding high performance motor to save power consumption
- The old center pump (PP-1207) of the cooling water was replaced with new ones to increase the CW in Section 300 and reduce the energy consumption of the NH3 compressor
- The circulation pump (PP-1211S) of the BR cooling water tower was replaced
- The feed pump (PP-1302S) of the boiler was replaced

China Area-(Nantong Area)

- When operating in low yield, timely adjust the number of the shared equipment in operation such as the feed pump, compressor and vacuum pump and shut down the equipment in the production area timely to save power and steam.
- The loop water system was optimized and improved to increase its efficiency and reduce the load of the ammonia condensing.
- The stripping system in the area was optimized and improved to increase the stripping efficiency.
- A feasibility study concerning the technology of waste heat recovery for latex heating was implemented; the research and planning for the looping and recycle project of the water system was proceeded with.
- The inventory and control of nitrogen use

China Area-(Shanghai Area)

- The average power consumption of the production was 352 degrees per ton in 2019 with a decrease of 16 degrees in comparison to the average power consumption of 368 degrees per ton in 2018, i.e. 4.35% of power consumption per ton compared to 2018
- Parts of the energy-saving lamps (energy-saving LED) in the lighting system were replaced;
- The production line was planned reasonably to reduce the electricity loss of the equipment preheating due to cross-line production.

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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC's Sustainable Development
Green production	Water Effluents and Waste		Ensure that everyone can enjoy water resources and health facilities under sustainable management. 6.3_Various approaches will be used to improve water quality and substantially increase the recycling volume of waste and its safe reclamation on a global basis in 2030.	TSRC actively promotes water conservation measures through increasing wastewater recycle rate of the production process, production capacity adjustment and other methods, and discusses water conservation and wastewater reduction goals in the management review meeting of ISO14001 regularly to fulfill the goal of continuous improvement.

Water Resource

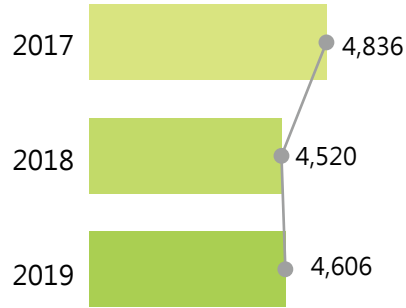
In 2019, the total water consumption of TSRC Group was 4,610 thousand tons. Water is the core of sustainable development and important to the climate system. It is a critical linkage between the human society and environment and decisive for adaptation to the climate change. It is expected that there will be about 3 billion people in the world facing water shortage and fresh water will become insufficient substantially in 40 countries and regions in 2025. About 2/3 of the people in the world will live in countries with the problem of water shortage in 2025. Due to a terrain that facilitates the formation of devastated streams, rainwater is hard to be conserved in Taiwan though heavy rainfall is common in this region.

By combining the experiences in production of synthetic rubber and water treatment, we review every water consuming node in the process and use the recycled water first. We also implement a systematic water saving and recycling plan. In the meantime, we use the data from the continuous motoring meters in the field and the data on the design of tanks to monitor the discharge of wastewater from each plant for the purpose to save water.

The main water source of the Kaohsiung Factory is from the Gaoping River, resulting in a water shortage crisis during water shortage periods or storm period, in order to effectively prevent the operational impact caused by

water shortages. TSRC actively promotes water conservation measures through increasing production process wastewater recycle rate, production capacity adjustment and other methods, and discusses water conservation and

Total Water Consumption of TSRC Group



Unit: Thousand Tons

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wastewater reduction objectives in the meeting regularly for improvement. Tap water is the only source of water used by the main TSRC business locations.

All TSRC production bases are striving for water recycling, mainly used for cooling systems. The Kaohsiung Factory's wastewater recycle rate in production process reached 37.9% in 2019. All the affiliates of the Group continued to implement water-conservation measures and focus on production process wastewater recycling and reuse. Shanghai Industrial recycled wastewater by replacing water pipes and pumping vacuum on the production lines. The total volume of TSRC's recycled water was 947

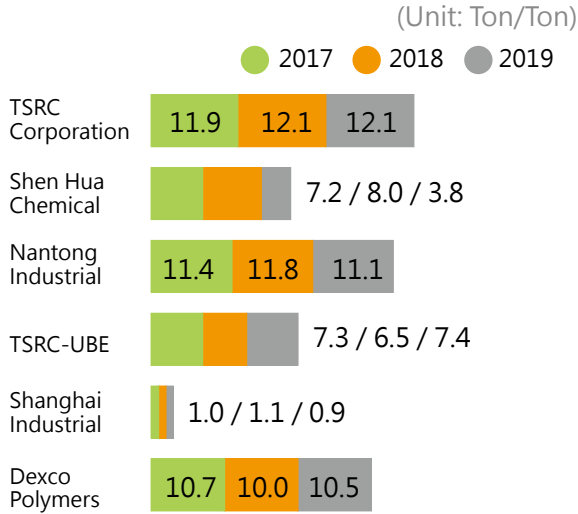
thousand tons and all factories were committed to improving the water treatment system and reducing the consumption of process water.

TSRC's total water drainage was 2,830 thousand tons in 2019. The main components of the wastewater were COD and SS. Wastewater from each factory was drained directly to the dedicated wastewater treatment plant in the industrial park and the quality of the drained water was also monitored by the industrial park. In addition to the flow of the wastewater and the real-time online monitoring of the water quality, we conducted regular wastewater testing to ensure compliance with the water standard of the wastewater treatment plant (i.e. Ren Da/Benjou

Wastewater Treatment Plant in Taiwan Area). The Kaohsiung Factory completed the installation of new wastewater treatment equipment in 2017, showing an attentive action to use environmental investment for improving the quality of the wastewater.

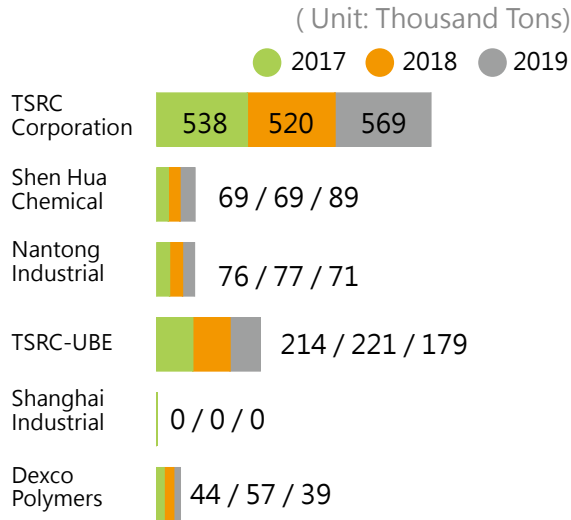
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Water Consumption Intensity per Unit Product

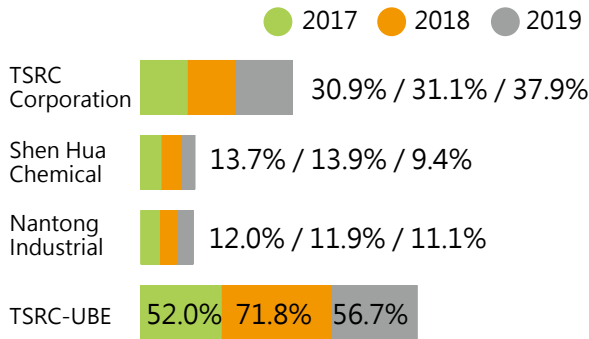


Note : In 2019, the water quality control of the wastewater system in TSRC-UBE was not stable, resulted in the increase in the replenishment of water to the cooling tower. Thus, the water consumption intensity was relatively higher in 2019.

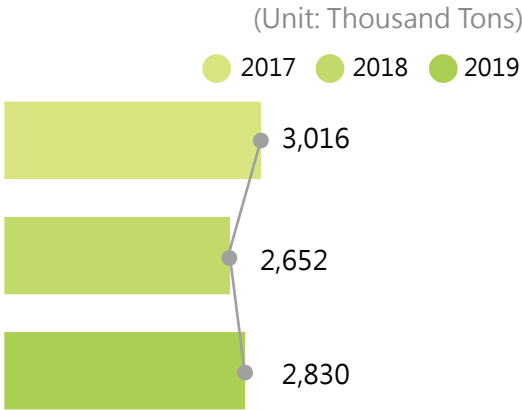
Recycled Water



Water Recycle Rate



Total Drainage of TSRC Group



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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC' s Sustainable Development
Sustainable environmental protection	Biodiversity Environmental compliance		Ensure to implement the sustainable consumption and production mode 12.5_We expect a substantial reduction of waste by 2030 through prevention, reduction, recycling, and reclamation. 15.1_Protect, maintain and promote the sustainable use of the ecosystem in the domain	Implement reduction of waste, recycling and management pursuant to ISO 14001 Environment Management System to ensure sustainability of the environment. TSRC Corporation actively made green and beautified the environment of all factories to reduce the impact on local species

Waste and Other Pollution Discharge Management

To control the business waste effectively, we conducted the removal, disposal or recycling properly in accordance with local environmental laws and regulations and confirmed the implementation status of this removal, disposal or recycling by submitting a report regularly within the required time to avoid punishment. Based on the spirit of pollution control manifested in ISO 14001, we constantly applied the environmental strategies of integration and pollution control to the processes, products and services to reduce the waste and sludge (from wastewater) on an ongoing basis in the hope to increase the ecological benefit and minimize the harmfulness to the human and environment. All the departments carried out the classification, collection, storage, management, removal and disposal of the waste in accordance with the Guidelines for Arrangement, Reporting, and Tracking of Business Waste to control the waste effectively.

We devote ourselves to the energy saving and waste reduction activities and consider them an important goals of the Company. The Kaohsiung Factory acquired the MFCA (Material Flow Cost Accounting) third party assurance in 2018 to enhance the recycling of rubber and improvement of the equipment functionality. The MFCA system was further applied to other production lines and product trademarks in 2019.

We introduced the Hazard Substances Free management and verification in the research and development phase in order to reduce the environmental impact of the products, continued to invest in the development of green production process technology, and responded to the market trend of “non-toxic environments” . For example, the Application Research Center developed the environmentally friendly gas as a foaming agent to significantly reduce the damage to the human body and the environment and achieve the effect of recycling the exhaust gas. In addition, TSRC is also committed to the non-toxic non-ferrous materials development. The relevant products are in compliance with the RSL safety certification to ensure that the Company’ s products are hazard free to the environment.

TSRC disposes waste pursuant to relevant laws and receives the approval for its waste disposal plan. The management unit systematically controls general and hazardous business waste and store, manage, report, follow up, and transport it properly to prevent pollution of the environment; we announce the waste and containers to be recycled and establish a strict classification system for recycling. In addition, various raw materials recycled and reused or applied to other usage can reduce the impact on

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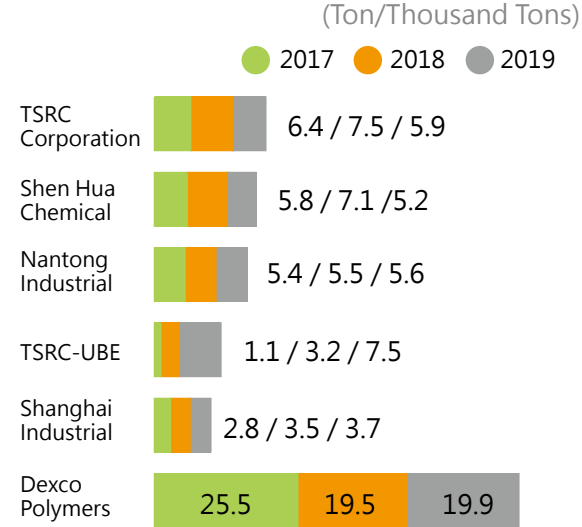
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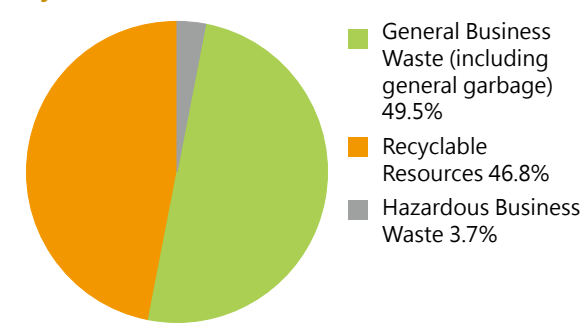
the environment through improvement of the production process and integration of various technologies.

Currently, the waste of TSRC is classified into the following categories: general business waste, hazardous business waste, and recyclable waste. They are disposed in a way complying with the requirements of the “Waste Disposal Act” and the disposal is commissioned to qualified waste treatment companies under our authorization. All of our waste is treated by lawfully contracted waste treatment companies to securely clean up and submit reports to prevent pollution of the environment. Resource waste includes rubber waste, metal waste, plastic waste, waste pallets and paper/cardboard, etc., after they are classified, collected and recycled by the local qualified recyclers. A classification and recycling system is implemented at each operation base to recycle and reuse the waste, reduce its quantity and protect the environment.

Waste Volume per Unit Product of the Group’s Affiliates



2019 Ratio of Waste Types of Kaohsiung Factory



Waste Types and Disposal of Kaohsiung Factory in 2019

General Business Waste (including general garbage)

Incineration Treatment 270.64 Ton
Physical Treatment 52.4 Ton
Landfill Treatment 65.8 Ton
Heat Treatment 65.74 Ton
Washing Treatment 42.42 Ton
Ratio of Waste Types 49.5%



Recyclable Resources

Reuse 469 Ton
Ratio of Waste Types 46.8%



Hazardous Business Waste

Incineration Treatment 37 Ton
Reuse 0.26 Ton
Ratio of Waste Types 3.7%



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Compliance with Environmental Protection Laws and Ecological Conservation

TSRC is committed to the environmental protection responsibility and emphasizes the compliance with related laws and regulations. All the global operational bases review the identification and assessment of the environmental laws and regulations in order to comply with local government's environmental protection regulations with respect to air pollution prevention, water pollution prevention and waste and toxic substances control. We promote energy saving and waste reduction, prevention of air pollution, and reduction and recycling of wastewater pursuant to the ISO 14001 Environment Management System. We performed the comprehensive reviews on a regular basis by developing the environmental management program. If the assessment reveals any potential risk of violation, such as Environmental Protection Administration's "Control Target of Greenhouse Gas Reduction", "Energy Conservation and Emission Reduction in China Area", and "The Management of Existing Industrial Pipelines", we will immediately propose improvement plans.

Underground Pipeline Maintenance

After the 731 Kaohsiung Gas Explosion, the Kaohsiung Factory gradually completed the in-line inspections of the hydrogen and butadiene pipelines and implemented the excavation verification and pipeline maintenance after the inspections during 2016 to 2018. In 2019, the Factory continued to implement the maintenance and management of the underground industrial pipelines and regularly submitted the operation and maintenance

report and operation and maintenance project according to relevant laws. Also, by the continuous implementation of the cathodic corrosion system testing, on-site survey and supervision of third-party excavation, pipeline inspection, training for operation and maintenance personnel, pipeline drawing update and emergency response drill and practical exercise, the Factory ensured the safe operation of the pipeline and protect the public safety of the citizens neighboring the underground industrial pipelines and the operation safety of the laborers.

2019 was the second year for the operation of the Local Joint Prevention Organization of Pipeline Bundle 6 after the combination while the Kaohsiung Factory still acted as the President of Pipeline Bundle 6. By effectively implementing the controlling of the joint excavation verification of pipelines, education and training inside the Local Joint Prevention Organization,



Excavation verification and inspection of pipelines



Teachers of the Guanyin Elementary School in Dashe District paid an on-site visit to the industrial park

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maintenance of the cathodic corrosion system equipment, reflection of improper third party excavation, pipeline evacuation inventory and the pipeline emergency response drill held by the organization, we won the prize of excellent pipeline model for four consecutive years.

TSRC did not have any chemical spill accidents this year. During the 2019 reporting period, the Environmental Protection Bureau Kaohsiung City Government performed a random inspection on the equipment component of the Kaohsiung Factory and discovered violation against the "Kaohsiung City Government Equipment VOC Control and Emission Standard" in the result of the random test. In addition, the equipment had odorous waste gas emission and the sulfur oxides and nitrogen oxides of the waste gas emitted from the boiler pipeline exceeded the emission standard which violated the "Air Pollution Control Act". Thus, the Kaohsiung Factory was punished with a fine of NT\$ 700,000. The factory held review and improvement meetings for the violations immediately and assisted workshops with establishment of the equipment component leak

map on a regular basis. The factory adopted an infrared VOC detector (FLIR) to improve the component testing speed and enhance the monitoring of the component. Measures will be taken to enhance the knowledge of the personnel in charge on air pollution laws and regulations; the effectiveness of improvement is obvious up to now.

All factories and offices of TSRC are located in the legal industrial parks and commercial office areas approved by the authorities of each country, and the raw materials for the production are transported by the contractor through the routes approved for the industrial park. The delivered hazardous raw materials



We won the 2019 Excellent Local Joint Prevention Organization awarded by the Industrial Development Bureau, Ministry of Economic Affairs.

must be labeled and an application shall be filed for approval. Up until now, the assessment results have shown no major impact on the environment. Besides, through the industrial park management center, TSRC, as part of the chemical industry, has long been actively investing in the creation of neighborly relationship with local communities and peaceful living environment for the residents. Though Kaohsiung Factory is facing the issue on "downgrading of the industrial zone", we, in addition to making assessment intensively and taking countermeasures circumspectly, devote ourselves to the improvement of community residents' living and local culture preservation. We encourage employees to participate in local community relationship and care in order to create a more harmonious life with local communities through social participation.

There was no community complaint in 2019. If the local community has any complaint, it can be communicated through the environmental safety and administrative unit. We also actively participate in social activities to communicate with the local community.

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Communication with the community and schools.



Underground pipeline audit by the Kaohsiung City Government: Fit testing for the wearing of level C protective clothing.

Ecological Conservation

TSRC’ s production factories and offices are neither located in the habitats that need protection or have been restored nor in any of the 6 protected areas or biologically diverse areas or genetically diverse areas specified by the IUCN (International Union for Conservation of Nature). None of the species in the industrial park is listed in the “Red List” or “National List of Protected Species in Taiwan” . TSRC Corporation planted trees and turf in the Kaohsiung Factory area to actively green and beautify the environment to reduce the impact on local species. All of TSRC’ s factories are located in the industrial parks. Employee commutes have only a limited impact on the local area and the environment of the nearby residents.

Environmental Protection Investment

Currently, TSRC’ s profits and competitiveness are not affected by the environmental pollution. TSRC is actively handling all environmental issues and complies with the laws and regulations to manage improvement work, dedicate our efforts in environmental protection to enhance the Company’ s image and strengthen our product competitiveness. The Company also advocates using video conference systems or telephone calls and E-mail communication to manage business activities whenever possible to minimize gas-consuming physical travel be-

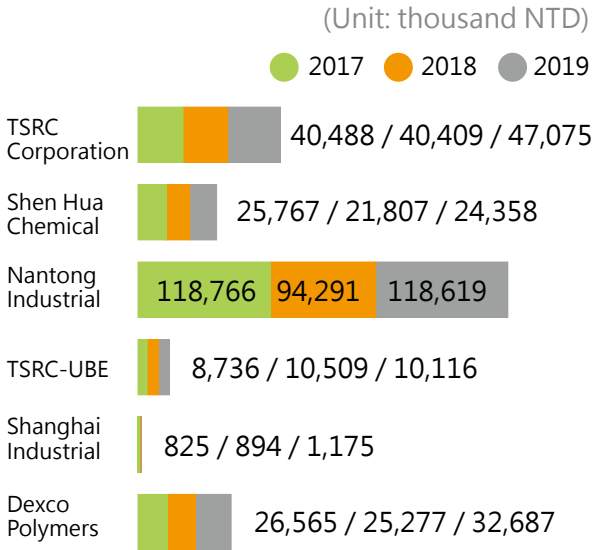
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tween colleagues, customers and vendors. We also advocate implementing resource recycling, reducing paper consumption and fulfilling our responsibility for environmental protection. Garbage, resource recycling, and kitchen waste are also subject to recycling and statistics monitoring handled by designated personnel. We introduced the new version ISO 14001 and the concept of environmental risk and prevention to evaluate and figure out material environmental risk and implement necessary environmental protection investment through the environmental management program.

In 2019, TSRC’ s expenditures in overall environmental protection and investments

were NT\$234,030 thousand with approximate items including: Environmental Operating Costs, Environmental Management Activities Costs, Environmental Social Activities Costs, Environmental Loss Compensation Costs, Environmental Fees, Taxes and other Expenses, and Environmental Research and Development Costs. TSRC continues to purchase products with energy-conservation certification and energy-conservation products such as inverters, energy-efficient lighting, energy-conservation certified air-conditioners, computer peripherals and consumables, etc. TSRC also actively promotes and sets priority to use recycling and reuse products to lower the impact to environment.

Environmental Accounting Expenditures of the Group’ s Affiliates



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Employee Structure and Employment

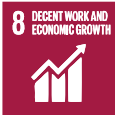
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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC’ s Sustainable Development
Labor equality	Employment Child labor Forced or compul- sory Labor		To promote inclusive and sustainable economic growth, achieve full employment and create produc- tive and decent jobs. 8.7_Eliminate compulsory labor, modern slavery and trafficking in persons; prohibit and eliminate the most abominable child labor and terminate child labor of all kinds in 2025.	By the coordination between the ISO 45001 Occupational Safety and Health Management System and related requirements of the Interna- tional Labor Organization (ILO), TSRC controls the emerging issues such as the psychosocial hazards at work and forced labor to ensure there is no complaints. Facilitate an inclusive and sustainable economic growth and realize full and productive employment, such as care of employees and prohibition of child labor. All factories continuously undertake the commitment of not using child laborers.

Employee Structure and Employment

The number of TSRC’ s employees in Taiwan Area/China Area and the USA Area was up to a total of 1,582 (at the end of 2019); in terms of the work locations, approximately 49% of employees were in China Area; in terms of gender, since TSRC was a manufacturing industry, male employ-
ees account for approximately 85%. Hiring at TSRC is based on the com-
petency only and the employees’ benefits and compensations will not be
affected because of their ethnic origin.

The wages offered by TSRC are in compliance with the provisions spec-
ified by the local labor laws and regulations and with equal pay for equal
work regardless of gender. All salary adjustments of hiring, evaluation, pro-
motion and transfer, and pay raise are determined by the competency and
annual performance evaluation result of the employee, and will not be af-
fected by the factors of their age, gender, area, religion, marital status, and
sex orientation. All employee performances shall be evaluated twice a year
in accordance with the “Employee Performance Evaluation Regulations” .
New employees are hired based on their professional competency and
work experience required for their duties, and local residents will be hired
with priority among all job applicants of identical qualifications.

In addition, TSRC’ s turnover management is controlled according to
the maximum limit of volunteer turnover rate established by each Compa-
ny and employees leave and retirement analysis report to conducted exit
interview with the leave of each individual employee to understand the
reason for leaving. Focusing on the reason analysis with the correspondent
measures (like new employees guidance information, award presentation
and employee recognition etc.), we maintain personnel stability.

All TSRC operating bases are located in the industrial parks or business
areas approved by the local competent authorities, and comprehensive as-
sessment of operational and hiring conditions, number of employees and
spending in local areas, etc. are made for this purpose. The operation of the
TSRC bases has positive benefits to local communities. The local employ-
ment opportunities are created due to operation of the factory and when
relevant suppliers deliver goods, the contractors perform maintenance and
other engineering operations during annual repair period, for which the
contractors may have higher requirements for manpower.

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Age, gender and area structure of employees

2019 Age Category	Age, gender and area structure of employees	TSRC Corporation		Shen Hua Chemical		Nantong Industrial		TSRC-UBE		Shanghai Industrial		Dexco Polymers	
		Employees	Senior Management (Local Employee)	Employees	Senior Management (Local Employee)	Employees	Senior Management (Local Employee)	Employees	Senior Management (Local Employee)	Employees	Senior Management (Local Employee)	Employees	Senior Management (Local Employee)
Age of 30 and younger	Male	56	0	51	0	105	0	26	0	3	0	7	0
	Female	3	0	5	0	4	0	4	0	1	0	1	0
Age of 30~50	Male	374	5	164	0	165	0	65	1	48	0	32	0
	Female	88	1	29	0	22	0	12	0	19	0	12	0
Age of 50 and older	Male	173	15	27	1	14	0	0	0	6	0	28	1
	Female	20	2	4	0	2	0	2	0	0	0	10	0
Regardless of Age	Male	603	20	242	0	284	0	91	0	57	0	67	0
	Female	111	3	38	0	28	0	18	0	20	0	23	0
Total Employees		714	23	280	1	312	0	109	1	77	0	90	1
Senior Management Ratio of Local Employees			3.2%		0.36%		0%		0.92%		0%		1.1%

- Note :
- 1. Senior Management is a position with a job grade of 19 or higher. There are a total of 26 persons on the Senior Management position.
 - 2. TSRC hires employees with disabilities in accordance with the law and regulations, and pays employment insurance in case of an insufficient number of employees with disabilities is hired.
 - 3. The youngest employee of the Company is 20 years old.

2019 Outsourced Employee Statistics of the Group' s Affiliates

Companies	TSRC Corporation	Shen Hua Chemical	Nantong Industrial	TSRC-UBE	Shanghai Industrial	Dexco Polymers
Outsourced Employees Count	104	81	122	42	8	44
Full-time Employees Count	714	280	312	109	77	90
Outsourced Employees Ratio	14.6%	28.9%	39.1%	38.5%	10.4%	48.9%

The nature of the works implemented by the outsourced employees mainly includes the long-term routine service/administrative work (canteen/cleaning/security)/warehousing and logistics in the factories

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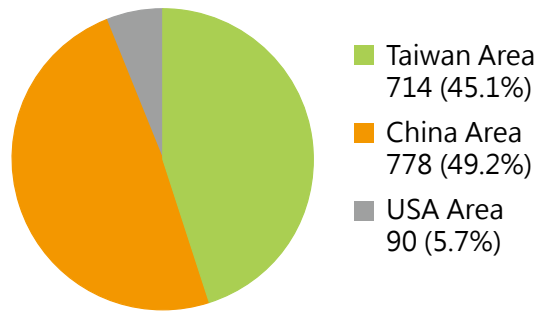
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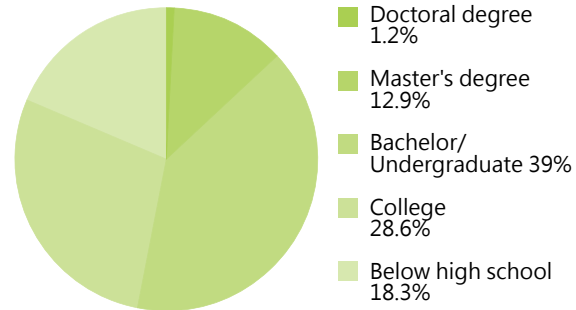
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Employee Composition of TSRC Group

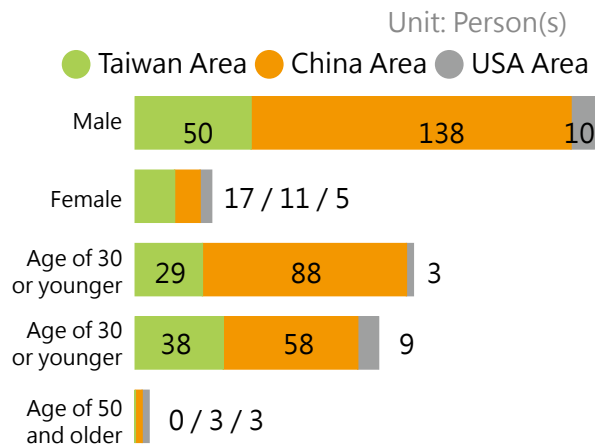
2019 Employees Count Ratio by Area



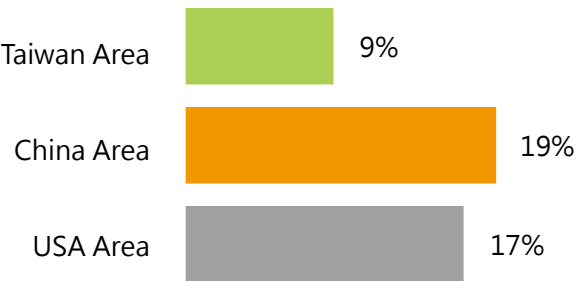
2019 Employee Composition (by educational background)



2019 New Employees Count (by age/gender)

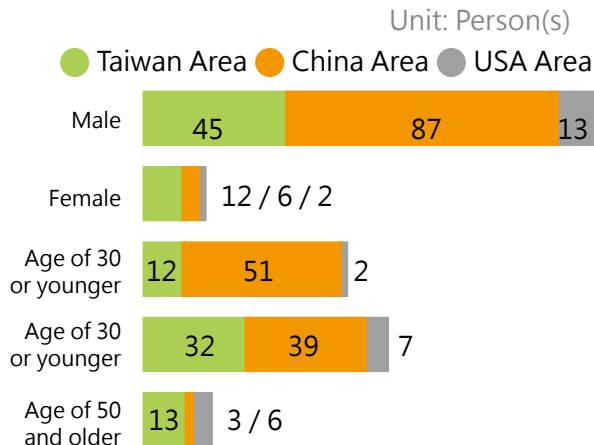


2019 New Employees Ratio

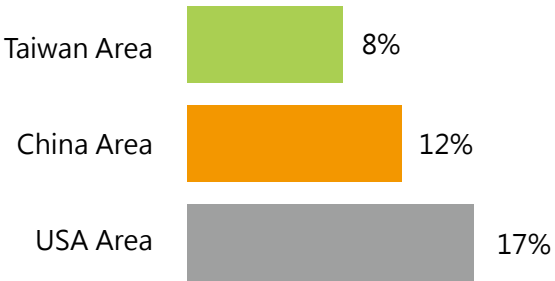


New employment ratio: New employees total count / Total employees

2019 Employee Turnover (by age/gender)



2019 Employee Turnover Ratio



Turnover Rate: Turnover number of employees (including retirement)/(Total employees at the end of the year)
The turnover rate in the USA Area was relatively higher due to a higher number of retired people in 2019.

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Employee Rights

TSRC guarantees employees with equal work opportunities and a reasonable performance evaluation system, provides a better salary and rewarding system than that required by the Laws and Regulations, and pays attention to local employment responsibilities. We truthfully execute the insurance and pension system for employees according to the law and maintain open and smooth communication channels between employers and employees. They can bring up any unfair cases at any time. In addition to pursuing the safe working environment for the employees’ physical health, TSRC pays attention to their mental health and provides



不法侵害宣導

different recreational venues to help employees’ physical and mental health as well as relieve their stress.

For significant decisions of the Company, the CEO sends an opened letter with the title of “Message to TSRC employees” to give an explanation to all the employees of the Company. In addition to the letter, he/she holds irregular communication meetings with the employees to communicate with them in person. We conducted the engagement survey in 2019 to understand the involvement of the employees and listen to their opinions in the hope to make improvement and adjust the direction of development through communication and understanding.

In addition to the announcement of “TSRC CSR Declaration” , TSRC provides Employees with Appeal Channels through the “Employees Grievance Appeal Management Regulations” and “Sexual Harassment Prevention Measures, Grievance Appeal and Punishment Regulations” to guarantee the human rights

of TSRC employees. In the process of grievance appeal investigation, the case is confidential to safeguard the privacy and other rights of the parties and no names or relevant information which can identify the parties are disclosed. The meaning complies with SA8000 Behavior Guidelines to urge our suppliers to reach the same human rights standards as the Company does. For the human rights protection and related training, the CSR Declaration of TSRC and all relevant internal regulations are executed in accordance with the relevant local laws and regulations. For example, protection of the personal freedom and prohibition of discrimination. When there is an update or publication of Human Rights-related laws and regulations (such as gender equality, sexual harassment prevention, and other Human Rights Acts), the Company will take the initiative to publicize those updates to our employees.

We comply with the requirements of internationally recognized labor rights, such as protection legal rights and interests of the employee, prohibition of child labor, and elimina-

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tion of compulsory labor in any forms. All TSRC subsidiaries are required to comply with local labor-related laws and regulations and implement the regulations of personal freedom protection and without discriminations, and TSRC has never hired child labor. Salary adjustment or hiring, evaluation, promotion and transfer are determined by the competency and annual performance evaluation result of the employee, and will not be affected by the factors of their age, gender, area, religion, marital status, and sex orientation.

No matter whether assuming office or transfer of the position, we clearly define the duties according to the position of the employee and allow them to resign on his/her own free will. Hence, there has not been any case of forced or compulsory labor. There were no violations of labor laws and regulations or offense of the rights of natives or minority groups (including aboriginal employees). There were no employee discrimination cases and no cases of infringement on human rights were filed through the Labor Union, Human Resources Department, Audit and other mechanisms this year.

TSRC supported and respected the spirit and principles of the International Labor Office Tripartite Declaration of Principles, The OECD Guidelines for Multinational Enterprises, UN Universal Declaration of Human Rights and The UN Global Compact, complied with local related regulations of labor and gender equality in employment and established related measures to human rights protection, labor policy and execution.

TSRC Corporation has a Labor Union and we hold labor/management meetings regularly and engage in discussions with employees through



Employee health examination

official meetings, including communication and coordination of freedom of speech and collective bargaining. All procedures and participation rates comply with the requirements of the laws and regulations. We have also completed the discussion of overtime pay adjustment and other topics. All subsidiaries also have open labor/management communication channels. Through these activities, all employees can enjoy the right of collective bargaining with management and their rights are protected.

The management of labor employer relations on the employee’ s transfer is also in compliance with the labor laws and regulations in Taiwan / Mainland China / USA, and supervised by the Labor Union of each factory.

Moreover, in consideration of the mental and physical health of our employees, when, in response to the needs of working overtime for business promotion, the Person in Charge of the department may assign employees overtime work for no more than the work hours specified in the provisions of applicable laws and regulations.

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Employee Welfare

Based on the status of operations, market competition, and the result of annual employee performance evaluations, TSRC designs encouraging employee remuneration^(Note 1) and rewarding system^(Note 2) under the premises of complying with the local laws and regulations. In accordance with the provisions specified in the “Labor Standards Act” , the “Labor Pension Act” and Enforcement Rules and the Pension Fund Accounting Guidelines, a monthly pension is set up by TSRC to the personal accounts of the Taiwan Bank and the staff of the Labor Insurance Bureau and regular meetings are called to review the pension fund utilization status through the “Labor Pension Reserve Supervisory Board” , to protect employees’ retirement benefits.

For the Mainland China subsidiaries, in accordance with relevant provisions of the Mainland China “Social Security Act” , both the Company and employees are contributing to basic retirement insurance, basic medical insurance, work injury insurance, unemploy-



TSRC Annual Party



Reward for long service employees



Thanksgiving Activity of “Nice to Have You”



2019 Happiness Enterprise Award



Strive as a Team for the Future

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ment insurance, and maternity insurance, and the housing provident fund according to the set percentage. After retirement, the employee shall receive the pension uniformly distributed by the National Labor and Social Security Departments in accordance with the laws and regulations. In addition, for Dexco Polymers in the USA, TSRC also provides insurance and pension funds in accordance with the local Social Security Act, and provides 401(k) ^(Note 3) Retirement Savings Plan.

In addition, TSRC has arranged insurance better than those specified by the laws and regulations, such as group insurance/spouse group insurance, to protect the work and daily life safety of employees. There are other employee benefits such as meal allowances, New Year’s Eve Banquets, annual health examinations, annual

group travel, employee long service rewards as well as cash gifts for weddings, childbirth, injury, allowances for disease and funerals, and many benefits are provided. We also provide emergency assistance for employees with difficulties. For the China Area, TSRC has also arranged a cooling subsidy for employees.

According to investigation of the private human resource agency the in Taiwan in 2019, TSRC is favored by the office workers in the category of “Rubber Processing” and was voted by the

office workers as the top 20. We also received the “2019 Happiness Enterprise Award.”

Employees are the most important asset of TSRC. A recreation room is available in every production factories with table tennis, pool table, fitness equipment and other sports and exercise equipment. We provide complete recreation facilities to promote interpersonal interaction among employees and allow employees to expand their interpersonal relationships after work to produce positive impacts.

Note:
1. For the disclosure regarding the number, the average and median salary of the full-time non-managerial employees in Taiwan Area, please visit the Market Observation Post System of Taiwan Stock Exchange (<https://mops.twse.com.tw>) for inquiry.
2. Employee rewarding programs are: Patent Application and Reward Regulations, Reward for Model Employees and Long Service Employees, Reward for Outstanding Personnel in Safety and Health and Total Production Management (TPM) Outstanding Team Performance Award.
3. 401(k): Retirement Security Savings Plan of the USA.



100 Peaks challenging event: "Mt. Qilai and Nanhua Hiking"



Badminton Contest in spring held by the Employees Welfare Committee



Employee Tour

Right to Collective Bargaining of Employees

At TSRC, we respect the freedom of association and the right to organize labor unions for all employees and set up communication channels in accordance with the local applicable laws and regulations. The labor/management meetings are held regularly in Taiwan Area and the labor rights and interests are communicated and coordinated through formal meetings. 4 meetings were held in 2019. In accordance with the provisions specified in the "Labor Standards Act" , the "Labor Pension Act" and Enforcement Rules and the Pension Fund Accounting Guidelines, a monthly pension is set up to the personal accounts of the Taiwan Bank and the staff of the Labor Insurance Bureau and regular meetings are called to review the pension fund utilization status through the "Labor Pension Reserve Supervisory Board" , to protect employees' retirement benefits. In addition, the annual Labor Union Representatives Conference invites the chairpersons of the labor unions of other local factories to attend the meeting every year to discuss specific topics on labor practices to reach a consensus. In the China Area, TSRC also organizes different kinds of communication meetings for employees to express their opinions or give suggestions for work and daily life to the Human Resources Unit, and relevant departments and the Person in Charge shall answer their questions and propose improvement solutions. The labor/management meetings are held regularly and the labor rights and interests are communicated and coordinated through formal meetings, in recent years, labor and management relations have been harmonious without any major labor disputes, the labor and management will uphold this win-win communication model in the future.

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TSRC Issue	GRI Specific Issue	Related SDG Item	UN SDG Description and Indicator	Practice and Goals of TSRC' s Sustainable Development
Safe produc-tion	Occupational Health and Safety		To promote inclusive and sustainable economic growth, achieve full employment and create productive and decent jobs. 8.8_Protect labor rights and promote safe and secure working environment for all workers.	Through the ISO 45001 occupational safety and health man-agement system, we have established our "Safety and Health Policy" to disclose that our core value is human-focused. We will pursue the goal of zero accidents and zero injuries through the principles of "technology" , "safety and health culture" , "responsibility" and "communication" .

Occupational Health and Safety Management

To fulfill our responsibility of environmental protection, ensure the occupational safety and health of employees, and maintain the rights and benefits of stakeholders, each department of TSRC actively introduces or builds relevant systems (such as ISO 14001 Environmental Management System, ISO45001 and CNS45001 Occupational Safety and Health Management System and Standardization of Safety Production, etc.). By inheriting the spirit of the Responsible Care Committee established by most companies in the chemical industry, TSRC participated in Taiwan Responsible Care Association (TRCA) and Ren Da Association for Promoting Safety and Health to observe and learn from each other' s practices in industrial safety, health and environmental protection to promote the safety and health protection of operators. Fire prevention drill and industrial safety education training are regularly held every year to enhance employee' s emergency response and self-safety management capability. We have established an emergency response operation procedure for adjusting to the emergency

such as raw materials spill brought about by work activities as well as fire, explosion and earthquake.

We establish the control procedure and the "Safety and Health Guidelines" based on the spirit of occupation safety and health management to provide a regulation on the health and safety of all the employees. We explicitly specify the safety standard, educational training, health guidance, first aid and emergency rescue, reporting of accidents, and rights and obligations in relevant procedures and guidelines. TSRC continues to improve the safety, health, and fire prevention work of "approved operation control, safety observation and inspection tours, chemical management, self-inspection, emergency response, contractor management, work environment tests, and safety health education training" to pursue the goals of zero accidents and injuries.

Safety & Health Policies

- People-centric is our core value. We strive to achieve the target of “zero hazard, zero injury” and operate based on the following principles:
1. Technology - Develop our management strategy and production technology on the basis of ensuring the health and safety of our employees.
 2. Safety & Health Culture - Establish best in class safety, health, and continuous improvement culture through goal setting, incentivization, and total participation in safety and health activities.
 3. Responsibility - It is our commitment to CSR and fundamental responsibility to comply with the laws and regulations to prevent disasters, injuries, and occupational hazards from happening.
 4. Communication - Assist employees to understand and implement safety and health responsibilities through training and related meetings.

Organization and Management System of Occupational Risks

TSRC spares no effort to provide employees with a safe work environment. In addition to the Responsible Care (RC) Committee (with functions of managing and reviewing the ISO 45001 and CNS45001 Occupational Safety and Health Management System) established with the industrial characteristics in the TSRC head office, the subsidiaries in different areas set up a dedicated committee or department responsible for labor safety and health matters in accordance with the Occupational Safety Laws and Regulations. The person in charge of the business operation or his/her designated representative also holds labor safety and health meetings on a regular

basis. The percentage of labor representatives participation also complies with the provisions specified in the local laws and regulations (for example, TSRC Corporation complies with the provisions specified in Taiwan’s laws, the percentage of labor representatives is more than one-third (Taiwan occupational safety and health management plan), to fulfill the requirements of communication and execution monitoring between the labor and management.

The TSRC Occupational Safety System is expanded from the raw material to the product in their life cycle, safety of life in the work environment during the operation, prevention and tracking of occupational diseases, consideration of the health risks in local communities to the core of “safety, health, environmental protection, greening” to comply with the industry standards and community/social expectations. In 2018, we transformed the original OHSAS18001 to the new version of ISO 45001 Occupational Safety and Health Management System. Involvement of the employees was emphasized and the management of the safety and health on the side of the contractor was enhanced in this respect. We incorporate the safety and health as part of the decision making process and placed more importance on the leadership and engagement as well as management of changes and performances.in order to protect the health of the employees, contractors, visitors and nearby residents and eliminate residents’ suspicion.

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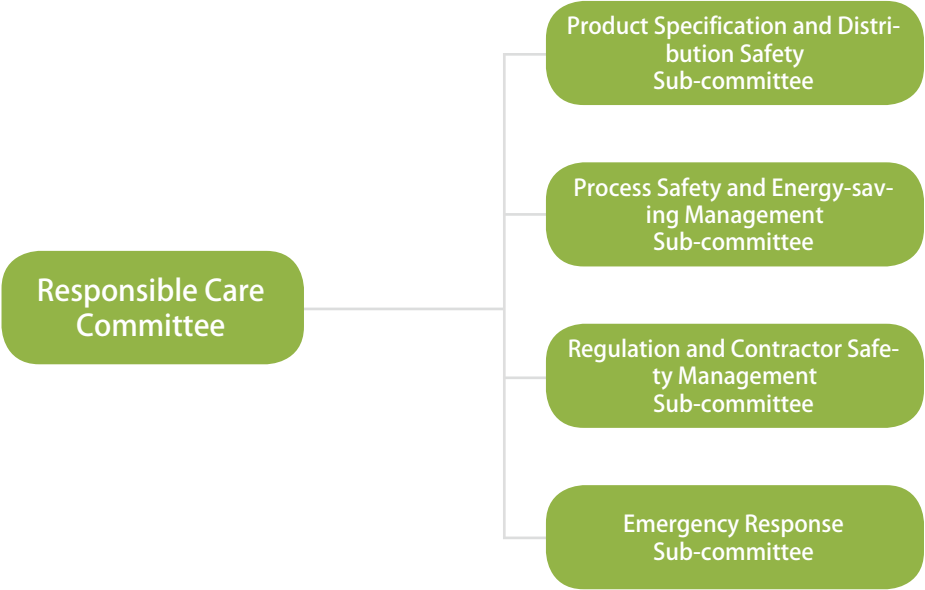
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To integrate our resources and promote the efficiency of the decision making, we integrated the sub-committees on June 2019. The organization chart after the integration is as follows:



Besides implementing the required safety and health management system in all factories of TSRC, we performed the compliance inventory of the Monthly Environmental Safety and Health Laws and Regulations and adjust and evaluate the related regulations development in 2019. The Kaohsiung Factory cooperated with the industrial park to conduct the chemical incident emergency response and local joint prevention drill. The scope of

drill increased from phase 2 to phase 3 for implementation to display the drill results supported by the local joint prevention organization and improve the employees' familiarity with the emergency response. The Kaohsiung Factory of TSRC received a Certificate of Appreciation from the Industrial Development Bureau by actively promoting the local joint prevention organization of Dashe Industrial Park to implement the safety and health tasks, strengthen the emergency response reporting and mutual support mechanism and improve the regional safety.

We also hire qualified environmental testing organizations to test our work environments in accordance with the industrial safety testing items and regulations. We also implement the concept of "Prevention Beforehand is better than Handling Afterwards" , to focus on the safe environment education for the new employees and work-related employees, such as occupational hazards and first-aid training, training for using the emergency response equipment, health and health care publicity and other trainings.

All the factories implemented the required safety and health management system in 2019. In addition to performing Monthly Environmental Safety and Health Laws and Regulations compliance inventory, TSRC adjusts and evaluates the related regulations development and always pays attention to the domestic and international environmental safety and health accidents and disasters to understand the causes and conduct self-review. We learn from other's mistake and push the improvement of similar deficiencies within the factory in parallel.

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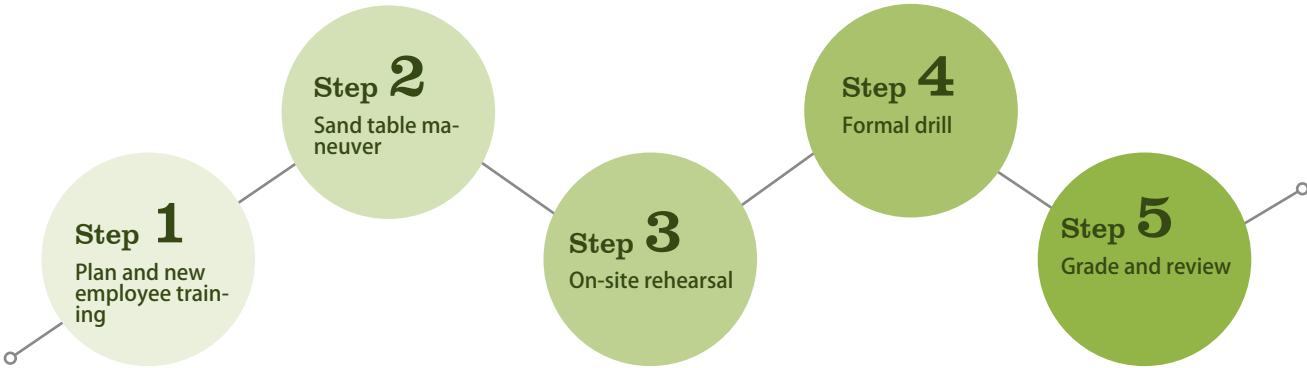


Diversified on-the-job training

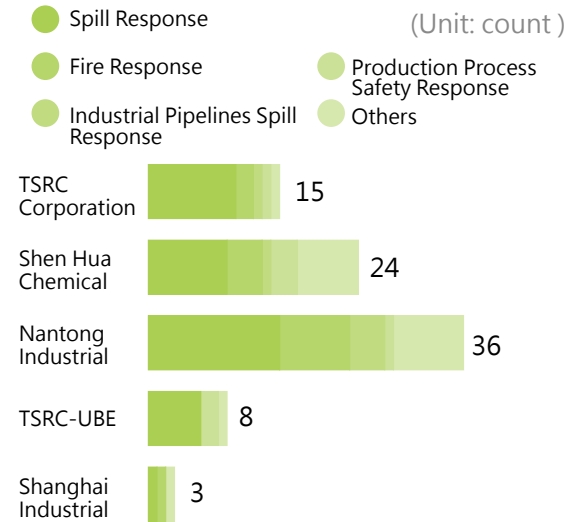


Training in factory: "Firefighting practice"

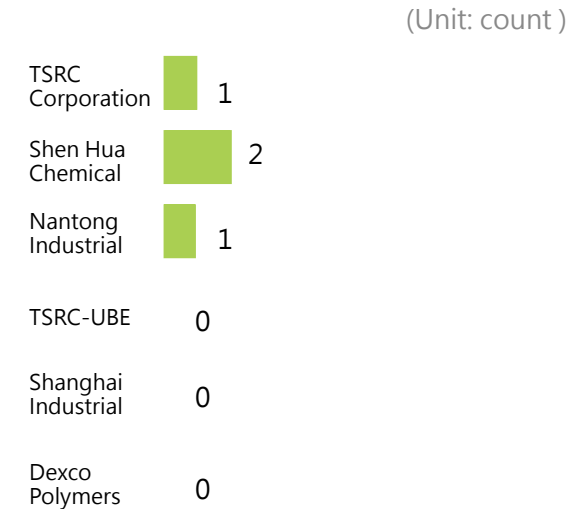
Emergency Response Implementation Process



2019 Number of Various Emergency Response Drills



2019 Occupational Hazard Injury Statistics



Note:

1. Commuting traffic accidents are not included (to be indicated on the bottom)
2. TSRC's statistics is in accordance with the Occupational Safety and Health Act.
3. China Area statistics is based on Injury Insurance Regulations of the State Council of People Republic of China.

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Lost Day Rate and Injury Rate

2019	TSRC Corporation			Shen Hua Chemical			Nantong Industrial			TSRC-UBE			Shanghai Industrial			Dexco Polymers		
Gender	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female	Total	Male	Female
Injury Rate (IR)	0.14	0.14	0	0.71	0.71	0	0.33	0.33	0	0	0	0	0	0	0	0	0	0
Occupational Disease Rate (ODR)	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Lost Day Rate (LDR)	2.4	2.4	0.0	36.07	36.07	0	11.7	11.7	0	0	0	0	0	0	0	0	0	0
Absent Rate (AR)	0.43%	0.22%	0.21%	0.9%	0.8%	0.1%	0.8%	0.7%	0.1%	1.1%	0.9%	0.2%	0.5%	0.4%	0.1%	1.8%	1.2%	0.6%
Number of Work-related Fatalities	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

Note:

1. Injury Rate (IR) = (Total occupational injuries / Total work hours)*200,000; (the coefficient 200,000 is defined as 40 hours per work week and 50 work weeks per 100 employees every year).

2. Occupational Disease Rate (ODR) = (Total number of occupational disease cases/Total work hours)*200,000. The frequency of occupational diseases within the total working time of the workforce during the report period.

3. Lost Day Rate (LDR): (Lost days/total work hours)*200,000. Lost days; the number of “days” of “lost” work hours of the workers who are unable to work due to an occupational accident or occupational disease.

4. Absent Rate (AR): (Injury leave + personal business leave + sick leave hours/total work hours); refers to the percentage of the actual number of absence days in the total number of workdays in the current year (not limited to work-related injuries and diseases but not including approved holidays such as festivals and training).

5. The LDR and IR statistics in the table do not include traffic accidents and Contractors.



Emergency Response Drill

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Employee Educational Training and Prevention of Occupational Disease

TSRC pays significant attention to the physical and mental health of employees. We implement all employee health examinations once every year which is better than the provisions specified in the laws and regulations, and under the premises not affecting personal privacy regulations, conducts tracking management with the assistance of medical personnel for the employees with major abnormal physical conditions detected from the health examination (For instance, Kaohsiung Factory has equipped with one nurse and provided interrogation enquiry services at the infirmary). Because of the active promotion of the labor health examination combined with the cancer screening service in 2019, the Kaohsiung Factory received a Certificate of Appreciation awarded by the Department of Health, Kaohsiung City Government to praise the TSRC’ s efforts in benefiting the employees.

TSRC adopted the top three abnormal physical conditions in the previous year’ s health examination as the basis for the health promotion activities in the following year. The Kaohsiung Factory continued to hold courses related to unlawful infringement, workplace bully, aromatherapy, health care and stretching activities of traditional Chinese medicine and manual therapy for musculoskeletal disorders due to the good response from the employees in 2019. There were 10 courses held with 471 participants.

- Organize the seminar of “Occupational Unlawful Infringement Prevention” .
- Provide health consultation (e.g. noise, dust, maternity health, and ergonomic hazards), health caring (e.g. shift staff, and high-risk personnel with exceptional workload) and follow-up actions.
- Organize the activity of “Free Flu Vaccination for Specific Group of People” .
- Organize the health seminar of “Prevention of Diseases Caused by Exceptional Workload” .

TSRC has been educating our employees on the correct safety and health concepts regarding the specific occupational diseases, effectively communicate occupational safety and health policies of the Company, managing the professional occupational health training for employees, and developing the employees’ good working habits, reducing human error, and arranging health examinations for employees working with special hazards in accordance with the laws and regulations. Over the years, in addition to the mandatory work environment site testing, air pollution control equipment, ambient odors and noise around the factories and other special environment items, we continued to monitor, analyze and track the test results, reduce the environmental load and impact on human health. The result of employee health examinations and work environment

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tests are fed back for further improvement of health management statistics analysis capability and effectively used as the basis of employee health management. In addition, we continuously launch and implement a series of safety and health prevention plans such as ergonomic hazard, workplace unlawful infringement prevention, exceptional workload and maternity health protection.

The Occupational Safety and Health Committee meeting is held once every quarter, with participation of each relevant Person in Charge and Labor Representatives through the entire meeting to discuss the Occupational Safety and Health Plan, including educational trainings of the respiratory protection plan, firefighting equipment operation, hazard communication, protective equipment usage/maintenance, prevention of confined space hazards and dust hazard prevention, workplace improvement measures (such as installing the sound-proof wall in the production areas of the Kaohsiung Factory and Shen Hua Factory as well as the vacuum exhaust system and movable dust removal equipment in Shanghai Factory), prevention and management, audits, contractor management, and health promotion. All factories tracked special health examination results of the special operation personnel in 2019 and the results were free from significant abnormal conditions.

On-site inspection of the work environment



On-site interview with the employee

Training in factory: "Aerial lift vehicle practice"



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With reference to the ISO45001 management system and self-safety management, the job positions of all TSRC factories that need to conduct special physical examination are as follows:

Companies	Occupational Disease Hazard Factors	Description
TSRC Corporation	Powder Dust, Noise, Chemical	TSRC arranges for relevant health examinations for employees working with occupational disease hazards every year. The results of health examinations for the special hazardous operation employees throughout the years showed no occupational diseases related to work with such special hazards.
Shen Hua Chemical	Noise, Chemical	
Nantong Industrial	Powder Dust, Noise, Chemical	
TSRC-UBE	Noise, Chemical	
Shanghai Industrial	Powder Dust, Noise	
Dexco Polymers	Powder Dust, Noise, Chemical	

To effectively manage the health of employees working in noisy work environments, other than requiring them to use noise insulation and personal protective gears and maintaining record every month, the employees working in a noisy specialty operation will be timely transferred out of the noisy work environment when they are diagnosed with grade 2 control for two consecutive years. They are tracked with a follow-up of noise specific health examination for two consecutive years to confirm their hearing does not deteriorate.

2019 Medical examination statistics of personnel with special position

2019	TSRC Corporation	Shen Hua Chemical	Nantong Industrial	TSRC-UBE	Shanghai Industrial	Dexco Polymers
Number of employees requiring examination	219	201	222	77	30	47
Actual number of examined employees	216	201	222	77	30	47

In 2019, all the affiliates of the Group completed the medical examination for special position and 3 employees of TSRC left the office before completing the medical examination.

Professional and General Education for Employees

“Elevate Workforce Capability” has always been core to our human resource development. We cultivate employees’ talents and characters in various aspects. Talents refer to the professional skills and competencies, while characters refer to the ethical qualities of the employees. The cultivation of our employees’ ethics and social caring is done through mindset and behavior change. As our organization becomes more internationalized, TSRC proactively invests in employee training and versatile learning approaches, expecting our employees to grow with the company in the face of global collaboration and competition. Our training policies and guidelines are institutionalized in the procedures, and aimed to enhance employees’ work skills, upgrade management capability, and improve quality for market competitiveness.



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We establish different training programs based on work level and experience. For example, micro-learning is a program designed for supervisors to set up learning sessions by inviting employees to participate voluntarily. In each session, participants are encouraged to share their experience in one specific management subject so the group can grow together in management method and maturity by exchanging experience and perspectives.

Every year TSRC establishes the annual training plan, according to the internal employee training procedure, by considering Company's business plan, department needs, and relevant government regulations to organize training courses for new and existing employees. The training programs cover general education, professional skill development, management capabilities, and qualification certification to realize the goal of "life-long learning" with internal and external sessions. Training requirement surveys are conducted with questionnaire (e.g. educational training requirements) and the analyzed survey results serve as an importance basis for the planning of training and development programs.



Leadership⁺

Global leaders conference
Excellent leader development plan

Senior Management

- Revolution guiding
- Innovation strategy and growth mindset
- Senior training
- Global vision
- Business acumen

Middle Management

- Situational leadership
- Inspire team performance
- Authorization skills
- Cross department cooperation
- Strategic thinking and decision making

First Level Management

- Essential leadership
- Cultivate subordinates
- Target setting and performance management
- Problem analysis and solution

General Employees

- Accountability
- Time management
- Interpersonal relationships and communication skills
- Conflict management

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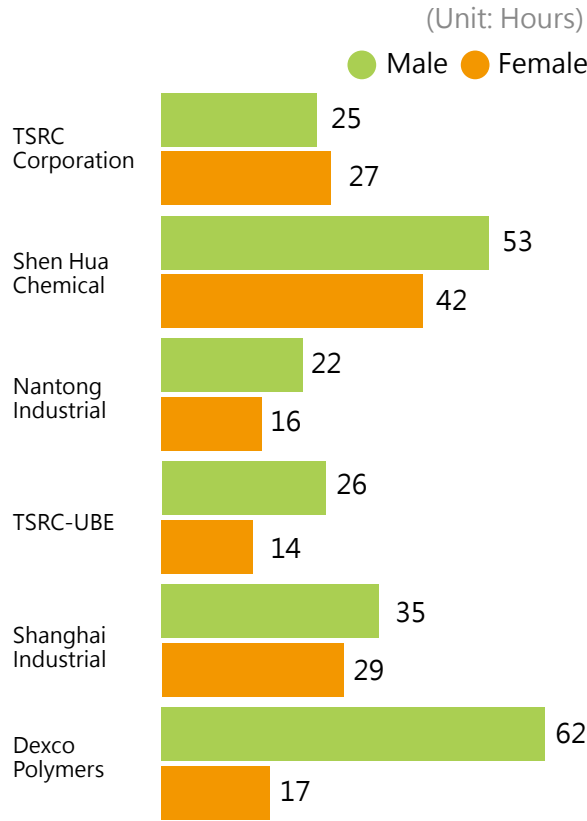
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In 2019, TSRC invested approximately NT\$ 14.47 million in training with approximately NT\$ 9,000 for each employee in average.

2019 Average employee training hours of the Group's affiliates

By Gender



By Rank



Note:

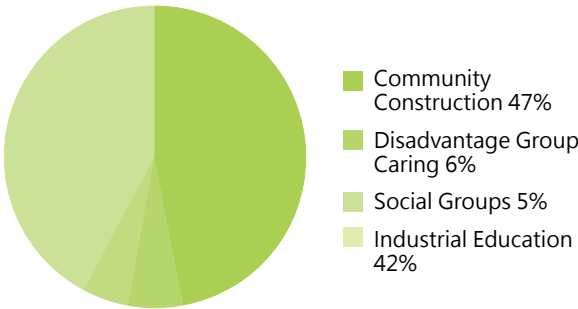
1. Senior Management includes the Senior Manager and Higher Level Management Personnel, Mid/First Level Management are the Deputy Manager to Manager Levels Management Personnel.
2. Direct Employees are the personnel including operator, group leaders whom directly responsible for production line operations.

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TSRC Social Caring Committee Operation Structure



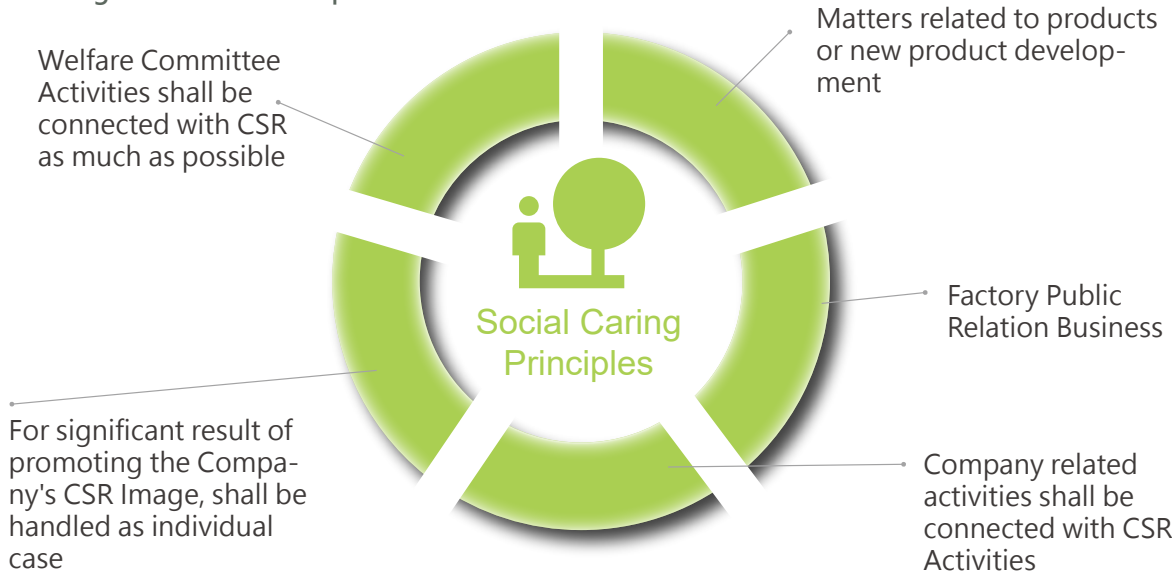
2019 Social Support



Social Support

We have promote the social support systematically since 2011, and through the Social Caring Committee and in accordance with social caring principles, operation direction and promotion methods, TSRC understands and responds to the community points of view through the daily contacts of relevant departments to symmetrically communicate in depth with local stakeholders. TSRC understands the need to maximize the effect of limited resources. Hence, we gradually promote social engagement based on our factory location and implement right activities continuously instead of repeated occasional donations, such as the chemistry education in rural areas and contributions to disadvantaged students. 2019 was the ninth year of these activities. As a member of the chemistry industry, TSRC supports chemistry education and local communities, help disadvantaged institutions and protect disadvantaged minorities to enhance the invisible power of social stability.

Social Caring Promotion Principles



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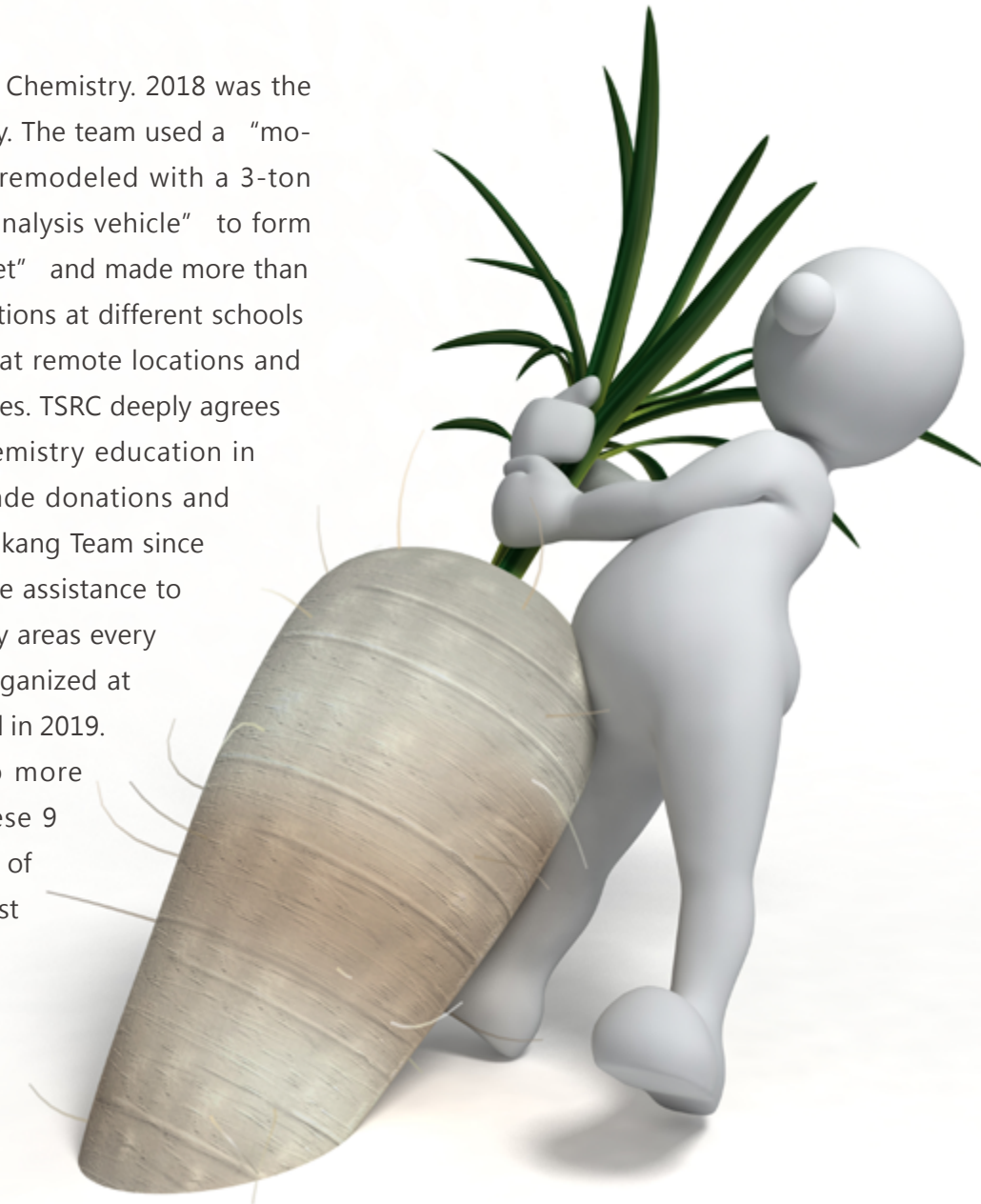
Support for Chemistry Education

We invest resources on an ongoing basis to help for the promotion and rooting of the popular chemical science. By accepting that “identification of problems” and “hands-on to solve problems” are the critical capability of a talent, we organize the chemistry learning activities relevant to life to arouse the interest of the students in this subject and enhance the popularity and awareness of the science. We execute the industry-academia integration policy by supporting the Industry-Academia Cooperation Program of Chemical Engineering through the Dashe Industrial Park Factory Association in the hope to find out and hire potential talents.

TSRC and “Chemistry On The Go”

The Tamkang University Team has organized the “Chemistry On The Go” , a popular science activity, since 2011 in line with the celebrations of the

UN International Year of Chemistry. 2018 was the eighth year of the activity. The team used a “mobile chemistry truck” , remodeled with a 3-ton truck, and a “running analysis vehicle” to form a “mobile chemistry fleet” and made more than 400 traveling demonstrations at different schools and most of them were at remote locations and nearby the industrial zones. TSRC deeply agrees with the purpose of chemistry education in rural areas. We have made donations and cooperated with the Tamkang Team since 2012. Our volunteers give assistance to the schools in our factory areas every year. One activity was organized at Dashe Junior High School in 2019. We had contributed to more than 10 activities in these 9 years and invested a total of 170 volunteers and almost one thousand hours.



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Employee Structure and Employment

Employee Welfare

Occupational Health and Safety Management

Employee Educational Training and Prevention of Occupational Disease

Social Support

2019 Chemistry On The Go Plan -
Chemistry On The Go at Dashe Junior High School



Dashe Junior High School



Enthusiastic volunteer team



Making the hand soap formula



Group practice

Local Communities

China Area

Nantong area subsidiary Shenhua Chemical and Nantong Industrial, TSRC-UBE continued to donate through Taiwanese Investment Enterprises Association and Nantong City Old District Foundation for Poverty Alleviation, donations will be used in student aid, help for families in difficulty and special groups. In October, 2019, the foundation donated RMB 90,000 at the “Building Dreams for the Student: Poverty Alleviation and Student Aid Granting” in Nantong Vocational University and encouraged the students to study hard, become a useful person to society and make contribution to society after being a successful person, hoping to continue the spirit of “When disaster struck, help came from all sides.”

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Taiwan Area

A. TSRC Social Caring Committee had set aside special funds to contribute to three elementary schools in Dashe District (Dashe Elementary School / Guanyin Elementary School / Jiacheng Elementary School) where the Kaohsiung Factory is located for nine consecutive years to sponsor meals, tuition, student clubs, and learning activities for the disadvantaged students. This activity had helped thousands of needed schoolchildren.



Grant-in-Aid Distribution Ceremony in Nantong City



Donation to the disadvantaged group



Donation to the disadvantaged students in local communities



"Local agriculture support" : The Company trip of picking vegetable soybean in Meinong

Note: Dashe District, Kaohsiung City Good Neighbor Feedback Fund Web Page: http://www.dsrtg.gov.tw/p06_07.aspx?type=5

TSRC also has exchanges of opinions with the communities through this positive activity.

B. TSRC donated Good Neighbor Feedback to the neighboring residents in the factory area through the Factory Association.

C. TSRC Employees Welfare Committee purchased various agricultural products to the employees.

D. The donation for social caring was a total of about NTD 950,000 in 2018.

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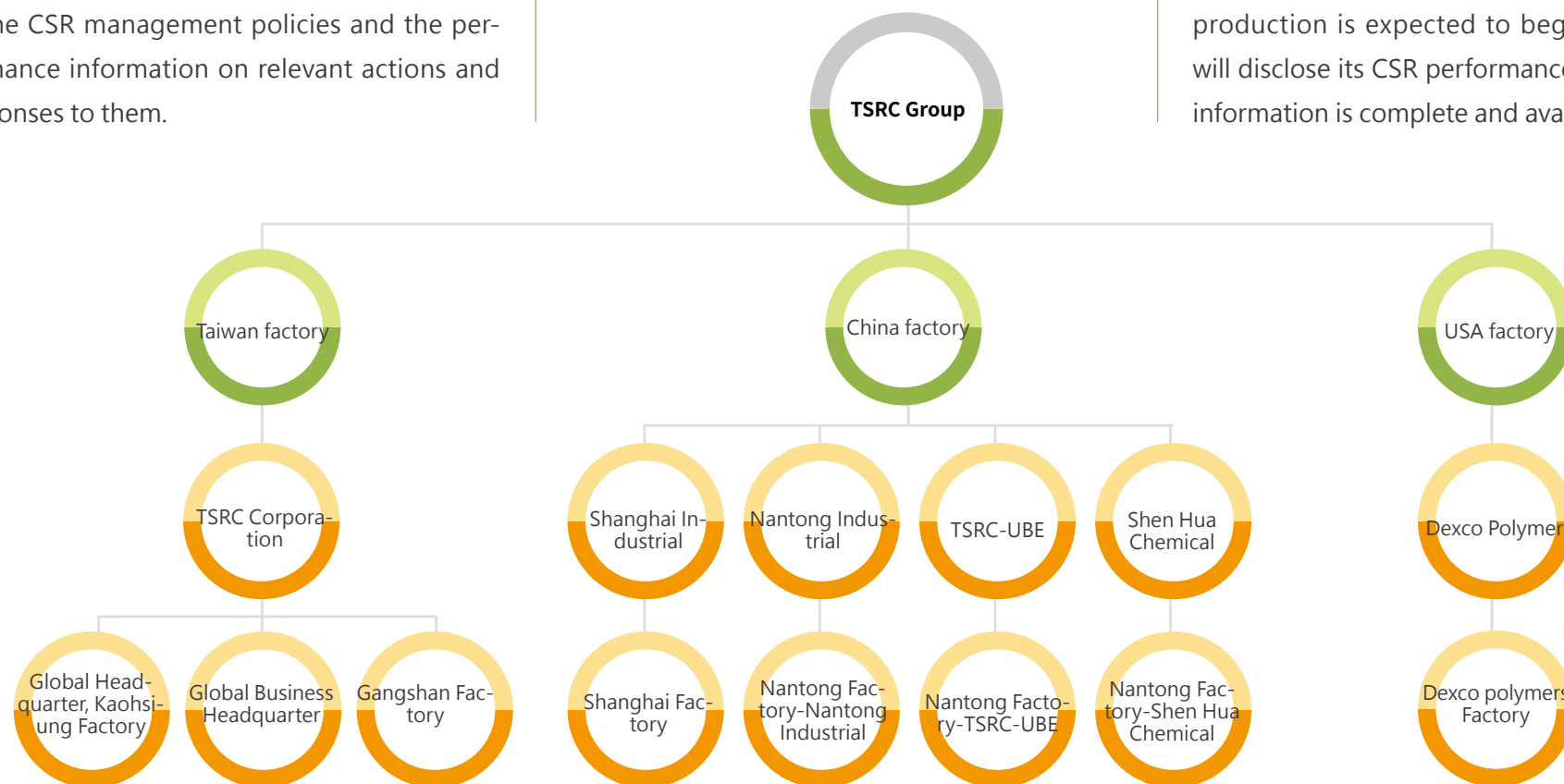
Since 2012, TSRC had publicly published the TSRC Corporate Social Responsibility Report for eight consecutive years and compiled it aiming at the economic, environmental and social aspects in accordance with the GRI Standards to expand the communication and engagement with all stakeholders and disclose all key issues of the CSR management policies and the performance information on relevant actions and responses to them.

Scope and Boundaries of the Report

As described in the previous Report, the TSRC Group CSR Report this year disclosed the TSRC Corporation in Taiwan (including Taipei Global Business Headquarters, Kaohsiung Headquarters, Kaohsiung Factory and Gangshan Factory), four subsidiaries in China (including Shen Hua

Chemical, Nantong Industrial, TSRC-UBE, and Shanghai Industrial) and the subsidiary, Dexco Polymers, in the USA as the subjects of the performance in the Report.

The TSRC Group has established TSRC (VIETNAM) COMPANY LIMITED and the official mass production is expected to begin in 2020. We will disclose its CSR performance when relevant information is complete and available.



Note: Global Reporting Initiative (GRI) Report Index Standards

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Report Period

Year 2019 (January 1, 2019 ~ December 31, 2019). And, facts that occurred before or after this Report period, and future policies, goals and plans are partially disclosed in this Report.

Report Guidelines

This Report is compiled in accordance with the Core Option of the Global Reporting Initiative (GRI) Report Standards (GRI Standards) to disclose the strategy, concept, measures and performance in the corporate social responsibility aspect of TSRC.

Figures in the financial statement in this report are expressed in New Taiwan Dollar (NTD). Relevant performance of environmental protection, safety and health are expressed in international indicators. Estimates or assumptions will be noted in each relevant chapter. Compared to the last version of report, this report does not have descriptions from the corrections of the previous report that may mislead readers.

Report Assurance

In order to provide the readers with reliable open information, this Report has received external verification by the independent third party organization TUV NORD and complied with the AA1000AS Standard. The Statement is in the Attachment of this Report.

Report Cycle - Scheduled to be published annually.

Current Report: June 2020

Previous Report: June 2019

Next report: scheduled for June 2021

Report Publication

On-line Version <http://www.tsrc.com.tw>

TUV NORD Verification Certificate



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GRI Standards Comparison Table

General Disclosures

GRI Standards	Disclosure	Page and/or URL	Notes	External Assurance
GRI 101: Base 2016				---
GRI 102: General Disclosure 2016 (in Accordance with Core Option)				---
1.Organizational profile	102-1 Name of the organization	Cover Page		86
	102-2 Activities, brands, products, and services	6		86
	102-3 Location of headquarters	Back cover		86
	102-4 Location of operations	Inside back cover		86
	102-5 Ownership and legal form	6		86
	102-6 Markets served	6,23		86
	102-7 Scale of the organization	6,22,64		86
	102-8 Information on employees and other workers	63		86
	102-9 Supply chain	34		86
	102-10 Significant changes to the organization and its supply chain	34		86
	102-11 Precautionary Principle or approach	31		86
	102-12 External initiatives	33		86
	102-13 Membership of associations	26		86
2. Strategy	102-14 Statement from senior decision-maker	5		86

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GRI Standards	Disclosure	Page and/or URL	Notes	External Assur- ance
3. Ethics and integrity	102-16 Values, principles, standards, and norms of behavior	8,30		86
4. Governance	102-18 Governance structure	11,30		86
5. Stakeholder engage- ment	102-40 List of stakeholder groups	14		86
	102-41 Collective bargaining agreements	65		86
	102-42 Identifying and selecting stakeholders	13		86
	102-43 Approach to stakeholder engagement	13,14		86
	102-44 Key topics and concerns raised	16		86
6. Reporting practice	102-45 Entities included in the consolidated financial statements	85		86
	102-46 Defining report content and topic Boundaries	16,85		86
	102-47 List of material topics	15,16		86
	102-48 Restatements of information	86		86
	102-49 Changes in reporting	86		86
	102-50 Reporting period	86		86
	102-51 Date of most recent report	86		76

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GRI Standards	Disclosure	Page and/or URL	Notes	External Assur- ance
6. Reporting practice	102-52 Reporting cycle	86		86
	102-53 Contact point for questions regarding the report	Back cover		86
	102-54 Claims of reporting in accordance with the GRI Standards	86		86
	102-55 GRI content index	87		86
	102-56 External assurance	86		86

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Topic-specific Standards

GRI Standards	Disclosure Items	Page and/or URL	Notes	External Assurance
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	22	GRI 201 Economic Performance	⊕
GRI 201: Economic Performance 2016	201-1 Direct economic value generated and distributed	22		⊕
	201-3 Defined benefit plan obligations and other retirement plans	67		⊕
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	46	GRI 302 Energy	⊕
GRI 302: Energy 2016	302-1 Energy consumption within the organization	49,50		⊕
	302-3 Energy intensity	49		⊕
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	52	GRI 303 Water GRI 306 Effluents and Waste	⊕
GRI 303: Water 2016	303-1 Water withdrawal by source	52		⊕
	303-3 Water recycled and reused	54		⊕

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GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	55,59	GRI 304 Biodiversity	⊙
GRI 304: Biodiversity 2016	304-1 Operational sites owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas	59		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	46	GRI 305 Emissions	⊙
GRI 305: Emissions 2016	305-1 Direct (Scope 1) GHG emissions	47		⊙
	305-2 Energy indirect (Scope 2) GHG emissions	47		⊙
	305-4 GHG emissions intensity	49		⊙
	305-7 Nitrogen oxides (NOx), sulfur oxides (SOx), and other significant air emissions	48		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	52	GRI 306: Effluents and Waste	⊙

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GRI 306: Effluents and Waste 2016	306-1 Water discharge by quality and destination	54		⊙
	306-3 Significant spills	56		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	57	GRI 307 Environmental Compliance	⊙
GRI 307: Environmental Compliance 2016	307-1 Non-compliance with environmental laws and regulations	57		⊙
Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	62	GRI 401 Employment	⊙
GRI 401: Employment 2016	401-1 New employee hires and employee turnover	64		⊙
	401-2 Benefits provided to full-time employees that are not provided to temporary or part-time employees	67		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	70	GRI403 Occupational Safety and Health	⊙
GRI 403: Occupational Health and Safety 2016	403-2 Types of injury and rates of injury, occupational diseases, lost days, and absenteeism, and number of work-related fatalities	74		⊙
	403-3 Workers with high incidence or high risk of diseases related to their occupation	77		⊙

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GRI Standards	Disclosure Items	Page and/or URL	Notes	External Assurance
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	62	GRI 408 Child Labor	⊙
GRI 408: Child Labor 2016	408-1 Operations and suppliers at significant risk for incidents of child labor	34,65		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	65	GRI409 Forced or Compulsory Labor	⊙
GRI 409: Forced or Compulsory Labor 2016	409-1 Operations and suppliers at significant risk for incidents of forced or compulsory labor	33,65		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	38	GRI416 Customer Health and Safety	⊙
GRI 416: Customer Health and Safety 2016	416-1 Assessment of the health and safety impacts of product and service categories	38		⊙
	416-2 Incidents of non-compliance concerning the health and safety impacts of products and services	38		⊙
GRI 103: Management Policy 2016	103-1 Explanation of the material topic and its Boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	38	GRI418 Customer Privacy	⊙
GRI 418: 客 Customer Privacy 2016	418-1 Substantiated complaints concerning breaches of customer privacy and losses of customer data	38		⊙

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In order to fulfill environmental responsibility, this Report does not issue a printed version. In order to make it easier to obtain information, mobile devices can scan QR code for entry into the website.

TSRC Corporate Social Responsibility Report over the Years



Contact mail



Company Website

Design description:

By imitating the stroke of the children, we decorate the world map with various daily necessities in simple and irregular lines while adopting natural and vivid green as the color tones to symbolize the rich and convenient life coexisting in harmony with the natural environment and respond to the environmental policy of TSRC: “Cherish the Earth’ s resources and fulfill environmental responsibility; implement continuous improvement for corporate sustainable operations.”