



# 2023 ESG REPORT



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# About the Report GRI2-2,2-5

This is the 10th report that we, Asia Polymer Corporation (APC, or We), have published. By disclosing non-financial information regarding the management and performance of material topics, it aligns with the outcomes of action plans in relation to the United Nations Sustainable Development Goals (SDGs) in terms of the Environmental, Social, and Governance (ESG) aspects. This allows stakeholders and the general public to gain a nuanced understanding of APC's achievements and prospects in corporate sustainability.

# **Principles of report compilation**

Issued Organization	In Accordance With
Global Reporting Initiative, GRI	Global Reporting Initiative Standards (GRI Standards) 2021 edition
Sustainability Accounting Standards Board, SASB	Sustainability Accounting Standards Board Standards
Financial Stability Board, FSB	Task Force on Climate-Related Financial Disclosures (TCFD)
Taiwan Stock Exchange	Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies
United Nations	Sustainable Development Goals (SDGs)
Offited Nations	United Nations Global Compact

# Reporting Period and Scope GRI 2-2, 2-3, 2-4

This Report covers operational entities (Taipei HQ, Kaohsiung Linyuan Plant, and USI Trading (Shanghai) Co.,Ltd.) included in APC's consolidated financial statements and the USI Education Foundation for the period from January 1, 2023, to December 31, 2023, and publish sustainability report annually. The report contents demonstrate the management performance in environmental, social, and governance (ESG), and the financial information is consistent with the financial data certified by accountants. Some statistics data are cited from the annual report, government agencies, and the open information of related websites. The report information has been reviewed and recompiled in accordance with the GRI Standards 2021 edition.

# Third-Party Assurance GRI 2-3, 2-5

This Report complies with the GRI Standards:2021, and it has undergone a Limited Assurance in accordance with Standard on Assurance Engagement 3000 "Assurance Engagements Other than Audits or Reviews of Historical Financial Information" issued by the Accounting Research and Development Foundation of the Republic of China conducted by third-party verification agency Deloitte Touche Tohmatsu Limited. The scope and conclusion of the assurance are detailed in the Third-Party Assurance Report in the appendix 6.6 of this Report.

### Publication Overview GRI 2-3



First issue: December 2015



Previous issue: June 2023



Current issue: August 2024



Next issue: August 2025



# **Procedures of Report Compilation and Management**



### **Data Collection and Identification**

- Hold a kickoff meeting to explain the compilation focus.
- 2. Identification of Stakeholders and Material Topics.
- 3. Collect relevant data by panel members according to their groups.
- 4. Data review by the panel chief of each unit.



### **Editing and Review**

- 1. Compilation and editing of the first draft by the ESG project secretary.
- 2. Review and revision by the panel members.
- 3. Internal review the Report by the Predictive Maintenance & Environmental Risk Management Division (abbreviated as PdM & ERM Division) of the unit responsible for Sustainable Development in USI Group.



### **Third-party Assurance**

Commissioned Deloitte Touche Tohmatsu to provide limited assurance on specific key performance information in accordance with Standard on Assurance Engagement 3000 "Assurance Engagements Other than Audits or Reviews of Historical Financial Information" issued by the Accounting Research and Development Foundation of the Republic of China.



#### **Publication**

- 1. Review and finalization by the ESG Committee.
- 2. Publication after approval by the Board of Directors.

# **Report Download**

To support environmental protection and promote paperless practices, the complete contents of this report will be published over the "ESG" section on APC website for download by stakeholders and the general public.

The download website

https://www.apc.com.tw/ESG/zh-tw/ESG82.aspx

# **Contact Information GRI 2-3**

Should you have any comment or suggestion for our report, please feel free to contact us.

# ESG Committee, Asia Polymer Corporation

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# Message from the Chairman GRIZ-22

During this challenging period, we are proactively adjusting our strategy to effectively navigate the rapidly evolving environment. Continuously promote and implement the Environmental, Social, Governance (ESG) strategy based on the core philosophy of "create sustainable value for a sustainable society". Over the past year, significant progress have been achieved across various Sustainable Development Goals, further reinforcing our commitment to social and environmental responsibility.

### Participate in the Global Enabling Sustainability Initiative

Constantly self-evaluation by following global trends in sustainable development continuously. In 2023, USI and China General Plastics Corporation (CGPC) participated in the CDP questionnaire for the first time. Through this engagement not only facilitated active involvement and response but also furthered connections with global initiatives. We introduced the concept of Double Materiality advocated by the European Union for conducting comprehensive sustainability analysis. In addition to enhance the governance effectiveness, the Board of Directors has included the ESG Committee in performance assessment for the first time.

# **Establish Carbon Reduction Goals and Green Energy Plan**

We have been dedicated to the energy-saving and carbon reduction plan for several years, ultimately achieving the 27% carbon reduction target by 2030, and this year we have extended this goal to reach carbon neutrality by 2050, aligning with the global goal of Zero emission. The accumulative grid-connected solar PV installations reached 7.2MW, with an estimated to generate over 9 million GWh of green power. We plan to complete solar PV installations with the capacity of 15MW and 20MW in 2025 and 2027, respectively. Aim to reduce the overall impact on the environment through technological innovation and enhance energy efficiency.

### Fostering a Culture of Diversity and Inclusion

Creating a diversity, equity, and inclusion workplace environment. We actively promote diversity and inclusion through

organizing employee hiking activities, collaborating with the Experimental Forest of the College of Bio-Resources and Agriculture at National Taiwan University on afforestation projects, and advocating for on-site agricultural education at Satoyama base...etc. APC, Taita Chemical(TTC), and CGPC have been honored by the Occupational Safety and Health Administration as "Outstanding Enterprise in the Proactive Evaluation of Occupational Health and Safety Indicators" for their achievements in workplace safety. Through the USI Education Foundation, we provide long-term support for vulnerable groups, remote townships, and ecological care projects, laying a solid foundation on social stability and development.

#### ESG achievements 2023

2022 ESG Report of APC participated in the 16th Taiwan Corporate Sustainability Awards (TCSA) and was honored with the "Platinum Award" and recognition as one of the "Taiwan Top 100 Sustainable Enterprises". Also, ranked as the top 6~20% at the 10th Corporate Governance Evaluation and rated AA in ESG evaluation by Cathay Securities. The GHG emissions in 2023 have been reduced by 7.7% compared to the baseline year, and demonstrate ongoing efforts in climate adaptation activities. Zero lost-time due to disabling injury have reached 5.81 million hours by 2023 in occupational health and safety, and the record is still being maintained.

Lastly, we believe that these efforts will have a positive impact on the future development of the company. Through continuous innovation, collaboration, and strategy adjustments, we can achieve corporate sustainable development by coexisting and prospering with the environment. We are confident that through the joint efforts of all team members, we can overcome various challenges and achieve our common sustainable development goals.

Asia Polymer Corporation Quintin Wu, Chairman



# **2023 Sustainability Performance**



- Decreased revenues by 31.57% to NT\$6.717 billion
- ✓ Net income after tax NT\$116 million
- ✓ Total output 132,241MT, an increase of 1.6% annually
- ✔ Platinum Award Traditional Manufacturing Industries" of Corporate Sustainability Report Awards at the 16th Taiwan Corporate Sustainability Awards (TCSA)
- ▼ "Taiwan Top 100 Sustainable Enterprises

  Award" of comprehensive performance categories
  at the 16th Taiwan Corporate Sustainability

  Awards (TCSA)
- ◆ Rated AA in ESG evaluation by Cathay Securities (Top 10%)



# **Environmental**

- ✓ In 2023, unit product energy consumption decreased by 2.16% to 6.09 GJ/MT.
- ✓ In 2023, unit product water consumption decreased by 2.9% to 3.7 M³/MT.
- ▼ The total self-generated energy (Solar) in 2023 was 2,017GJ, all of which was sold to Taiwan Power Company.
- Reduced electricity consumption by 1.57%
   on average each year during 2015-2023, which
   complies with the Energy Administration's
   regulatory requirement of 1%
- ◆ GHG emissions were 108,107 Mt CO₂e, by 7.7% less over 2017 (baseline year) in 2023
- Saved energy by 9,645GJ and reduced carbon by 840 Mt CO₂e in the 2023 Energy Saving and Carbon Reduction Program



- ▼ Employees Turnover Rate 0.43 %
- ▼ The total cumulative of zero lost-time due to disabling injury have reached 5.81 million working hours (statistics period: 14 October 2010-31 December 2023)
- Employees received a total of 4,779 hours of occupational safety training in 2023, accounting for approximately 84% of APC's total of 5,711 hours educational training.
- Donated NT\$5 million to the USI Education Foundation to support in caring for the remote townships' education, public welfare, assist community development and promote domestic cultural development, etc.
- ✓ Honored by the Occupational Health and Safety Administration as the top 10% outstanding enterprise in the "Proactive Evaluation of Occupational Health and Safety Indicators in Corporate Sustainability Reports".



# **Awards**



"Platinum Award - Sustainability Report Categories" of Corporate Sustainability Report Awards at the 16th Taiwan Corporate Sustainability Awards (TCSA) in 2023



"Taiwan Top 100 Sustainable Enterprises Award" at the 16th Taiwan Corporate Sustainability Awards (TCSA) in 2023



"Net-Zero Industry competitiveness" -Distinguished Honor Award in 2023



"Air Quality Purification Zone Adoption Program"in Wang Gung **Elementary School at Kaohsiung** City in 2023



Top 10% enterprise in the "Proactive Evaluation of Occupational Health and Safety Indicators in Corporate Sustainability Reports" by the Occupational Health and Safety Administration in 2023

# **2023 Sustainability Activities**





2023 "Earth Hour", a global voluntary energy-saving and carbon reduction activity



2023 "Add a Touch of Color to the Earth, USI Group Plants a Field of Green" afforestation activity





The 9th "Neihu Technology Park 1,000-People Blood Drive" in 2023



# 1.1 About Asia Polymer

### **Overview APC**

Asia Polymer Corporation (Stock code: 1308) was established on January 25, 1977, with its operational headquarters based in Taipei. In response to the government's policy of promoting investment intention by constructing a polyethylene plant in the Linyuan Petrochemical Industrial Park in Kaohsiung. Its primary business focuses on the development, manufacturing, and sales of low-density polyethylene resin and ethylene vinyl acetate copolymer resin.

After two production line expansions in May 1984 and September 2015, the current annual production capacity is 145,000 MT.

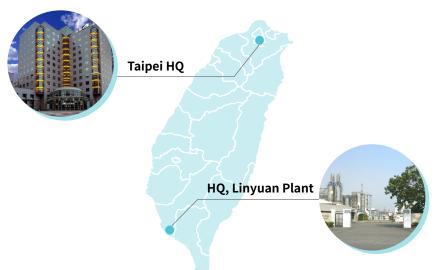
In compliance with the "Autonomous Ordinance for the Management of Existing Industrial Pipelines in Kaohsiung City" the corporate headquarters was relocated to the Linyuan Plant in Kaohsiung in June 2016.

### Basic Information GRI 2-1, 2-8

Name of Company	Asia Polymer Corporation
Establishment Date	January 25, 1977
Industry	Plastics industry
Chairman	Quintin Wu
President	Pei-Chi Wu
Capital	NT\$5.937 billion
Number of employees	233 people (by December 31, 2023)
Head Office	No. 3, Industrial 1st. Rd., Linyuan Dist., Kaohsiung City
Taipei HQ	12F, No.37, Jihu Rd., Neihu Dist., Taipei City
Revenue	NT\$6.717 billion
Total Production	132,241MT
Major Products	Low Density Polyethylene Resin (LDPE) Ethylene Vinyl Acetate Copolymer Resin (EVA)

# Geographical Distribution of the Organization GRI2-1

APC's major operational hubs are all located in Taiwan, including Taipei HQ and Linyuan Plant. Taipei HQ oversees product sales, whereas Linyuan Plant is dedicated to research and development, product manufacturing, and shipment.



# **Operational Deployment**

Become the leader of EVA manufacturing by keeping innovative R&D capabilities in Taiwan, developing higher-valued products and high-end applications, and also remains flexible in adjusting its product portfolio to meet market demands. In addition, deploying the Greater China market, enhancing global market competitiveness, re-investing in the "Gulei Integrated Refinery Project" in Zhangzhou, Fujian, through a third area, vertically integrating steam cracking, petrochemical intermediate materials, and plastic products, combined with investments in the Port of Kaohsiung Intercontinental storage and transportation project Phase II to reduce transportation costs and enhancing competitive niche.



# **Corporate History**













### 1977

- · Company Establishment
- · Constructed a polyethylene plant in Linyuan Petrochemical Industrial Park in Kaohsiung



### 1986

- Publicly offered on the Taiwan Stock Exchange (TWSE)
- Australian BTR NYLEX invested in APC and acquired 51% of our shares and transferred the shares to its subsidiary BTRN Asia in the same year

### 1984

· The 3rd production line was constructed and started mass production

### 1998

· Passed ISO 14001 certification

### 1997

BTRN Asia transferred 51% of its shares to Bermuda Belgravia One Limited coinvested by USI and UPC Technology Corporation

### 1994

· Passed ISO 9002 certification

### 2009

· Passed SONY GP certification · The Board passed the

### 2001

 Passed OHSAS 18001 certification

### 2019

- The Board passed the investment in the Kaohsiung Intercontinental Container Terminal Project Phase II
- · Passed ISO 50001 certification
- · Passed ISO 45001 certification

### 2017

· Started the construction of the Gulei Project in Fujian

### 2016

- Relocated the head office to Linyuan Plant in Kaohsiung
- Completed and started the commercial operation of the 4th EVA production line

### 2011

 The Board passed the construction of a 45,000MT EVA production line in Linyuan Plant



### 2023

 Gulei Integrated Refinery Project has been completed and fully operational

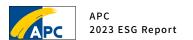
### 2022

Completed the ISO 14064-1
 GHG inventory and verification of APC Linyuan Plant

### 2021

 Implemented the process safety management (PSM) system





# Major Products GRI 2-6

APC operates in the plastics industry, mainly produce the following two types of resins: low density polyethylene (LDPE) and ethylene vinyl acetate copolymer resin (EVA).



# **Business Philosophy and Goals**

As a member of USIG, APC upholds USI's business philosophy: "solid operations, professional management, seeking excellence, and serving society" to pursue operational excellence and sustainable development. Through investment in upstream material ethylene and continual product innovation and R&D, we stabilize raw materials supply and fulfill the product customization of customers to create economic benefits and enhance production efficiency to achieve the vision of corporate sustainable operations and social responsibility.



## Membership Associations **GRI 2-28**

Industry intelligence exchange is a drive for corporate growth. APC actively participates in various professional groups and enhance influence by combining with external powers. Through this interaction and business association, we share and promote professional technologies and competencies in various fields. We also sponsor associations to publish journals and organize activities so as to promote industry development.

# Major External Associations Participated by APC in 2023

Name of Organization	Petrochemical Industry Association of Taiwan	Taiwan Synthetic Resins Manufacturers Association		Industrial Safety and Health Association of the ROC	Kaohsiung County Industrial
Member	•	•	•	•	•
Supervisor/Director	•		•		



# 1.2 Sustainable Development Visions and Goals GRI223

# **USIG Vision:** Create sustainable value for a sustainable society

We aim to continuously create sustainable value with our core competency to contribute to social sustainability.



Based on the sustainable vision, we have developed three core strategies: "R&D and innovation," "steady operations", and "social inclusion", hoping to create value with stakeholders together. We extend the contents of the core strategies into seven key topics as the foundation for honest and reasonable partners to build visions.

# **APC Sustainability Vision: Leader of Innovation and Sustainability**

Sustainability Strategy and Principles	Innovative Technology, Sustainable Development, Safety and Harmony
Sustainability Approach	More economic benefits, good governance, higher production efficiency, environmental sustainability and survival, people-oriented management, corporate social responsibility fulfillment

As a member of USIG, APC has set the vision, strategy, principles, and approach of sustainable development based on the group's sustainability vision. We have also combined the key issues of USIG for the reference of realizing our sustainability visions and goals.





# Response to UN SDGs GRI 2-24

Setting out from the core value of sustainable development, we combine the UN SDGs with our sustainability approaches. Through the following three stages: "analysis and identification", "goal setting", and "response and disclosure", we have identified the association between our sustainability approaches and the SDGs and set the relevant goals for operational management.



# 9 corresponding SDGs

- We analyzed and identified the corresponding SDGs based on the results of material issues identification and during operations.
- · In 2023 there were 9 corresponding SDGs.





# 24 sustainability indicators

- · By linking SDGs with APC material issues, we set goals and evaluate their performance.
- · In 2023 there were 24 sustainability indicators.





Through disclosing the performance in implementing the plans in relation to the sustainability indicators, APC understands the insufficiencies required for improvement and make continual innovation and improvement to bring substantive social contributions.

# **Correspondence and Actions Between SDGs and Sustainability Approaches**

	SDGs Sus	tainability Approaches
3 COODWAITH 3 AND WILL TERMS	Good Health and Well-being (3.7, 3.9, 3.d) Provide employees with high-quality healthcare service through a well-established welfare system and reduce causalities and accidents through management of highly hazardous chemicals.	
4 QUALITY	Quality Education (4.3, 4.5) Support and sponsor education and sustainable development in remote townships to ensure equal opportunity of education for vulnerable children.	ESG fulfillment
6 CLEANWAITER AND SANTATION	Clean Water and Sanitation (6.3, 6.4, 6.5) Enhance water efficiency and reduce impacts on water and ecosystems through the quality control, recycling, and reuse of effluents.	Environmental sustainability and survival
7 ATTORSABLE AND CLEAN BREET	Affordable and Clean Energy (7.2, 7.3, 7.a)  Enhance energy efficiency and develop renewables for environmental sustainability through clean production and green manufacturing.	Enhance production efficiency Environmental sustainability and survival
8 DEFENT WORK AND EDWARD GROWTH	Decent work and economic growth (8.2, 8.5, 8.7, 8.8) Improve economic performance, provide a safe workplace environment, ban child labor, and ensure remuneration equality to maintain human rights and the right to work for workers.	Implementing a People-Centric Approach Good Corporate Governance
9 ADUSTIV INDIATION AND AND AND AND AND AND AND AND AND AN	Industry Innovation and Infrastructure (9.5, 9.b)  Provide R&D resources and engage in product innovation and R&D to increase product added value.	Create economic benefits
11 SUSTAINABLE OTIES AND COMMUNITIES	Sustainable Cities and Communities (11.6)  Reduce air pollutant emissions and improve waste management to reduce the production o hazardous substances and enhance environmental quality.	Environmental f sustainability and survival
12 RESPONSIBLE CONSIDERATION AND PRODUCTION	Responsible Consumption and Production (12.2, 12.4, 12.5, 12.7)  Enhance materials efficiency, recycling, and reuse to reduce waste generation and practice sustainable resource management; Implement green procurement to practice sustainable purchasing.	Environmental
13 ACTION	Climate Action (13.2, 13.3) Assess risks and opportunities due to climate change and integrating countermeasures into policies and action plans to lower the environmental impact brought by climate change.	Environmental sustainability and survival

Note: ( ) represents detailed goals of the SDGs



Note: (★) represents unachieved targets; Currency: NT\$

	Note: (*) represents unachieved to						
SDGs	Goals	2023 Performance	Improvement/Optimization Methods	Response			
3 DOOD HEALTH AND WELL-SEING	Provide insurance/healthcare benefits     Promote process safety management (PSM)	<ul> <li>Employee group medical insurance</li> <li>Birth allowance for 9 people, NT\$10,000 each</li> <li>Four sessions of employee health checkups, 210 people</li> <li>On-site service of contracted physicians for 6 times</li> <li>Promoting the PSM system and 14 other items</li> </ul>	_	5.2 Talent Development 5.4 Healthy Workplace			
4 COMMITY EDUCATION	Setup scholarships and grants     Practicing education for remote townships	· Sponsoring NT\$5 millions to USI Education Foundation for caring vulnerable groups, remote townships education, and setup scholarships		5.5 Social Engagement			
6 CLEAN WATER MAG SAMEATION	<ul> <li>Water reclamation (reuse) rate &gt;95.0%</li> <li>Water consumption per unit product: &lt;4.0 M³/MT</li> <li>Effluent water quality, COD &lt;90 mg/L</li> </ul>	<ul> <li>Water reclamation rate: 99.2 %</li> <li>Water consumption per unit product: 3.70 M³/MT, a 2.9% decrease compared to the previous year.</li> <li>Effluent COD 32.77 mg/L</li> </ul>		4.1 Resource Management			
7 STORMATE AND COLUMN TERMS	<ul> <li>Electricity consumption per unit: 1,480kWh/MT</li> <li>Set energy conservation target: Electricity conservation rate 1.0%</li> <li>Build green power (solar PV) installations</li> </ul>	<ul> <li>Electricity consumption per unit is 1,461kWh/MT</li> <li>Electricity conservation rate 1.13%</li> <li>Linyuan Plant plans to procure about 2.5 GWh of green power (solar PV) in 2025</li> <li>Linyuan Plant is expected to install self-generation and self-consumption solar PV system with a capacity of 499 kW in 2025</li> </ul>	Continue to undergo equipment replacement     Replace energy-saving equipment and increase green procurement expenditure     Implement energy efficiency improvement projects	4.2 Climate Change and Energy Management			
8 INCREM AND AND RESIDENCE CONTROL	<ul> <li>Maintain corporate growth through sustainable investment</li> <li>Ban child labor and ensure remuneration equality</li> <li>Maintain human rights and the right to work for workers</li> <li>Zero occupational accidents</li> </ul>	<ul> <li>Net income after tax is NT\$116 million</li> <li>Ratio of salary and remuneration of men to women: Intermediate and junior management 1.02:1 and general employees 0.93:1</li> <li>Employment of persons with disabilities: 2; No child labor.</li> <li>Employee injury rate: 0; The total cumulative of zero lost-time due to disabling injury have reached 5.81 million working hours.</li> </ul>		2.2 Economic Performance 5.2 Talent Development 5.3 Human Rights Policy 5.4 Healthy Workplace			
9 MOSSEY MONEON AND HELSTRUCKE	<ul> <li>At least 1 product development or quality improvement per year</li> <li>Proportion of R&amp;D funds in total revenues &gt;0.6%</li> </ul>	<ul> <li>Product development: 1, Quality improvement: 1</li> <li>R&amp;D Funds were NT\$47,506 thousand, accounting for 0.71% of the total revenues</li> </ul>		3.1 Technology R&D			
11 SEEDMANA CORE	<ul> <li>Air pollution emission monitoring and improvement, regular walk-through inspection of equipment components, with monthly inspection points ≥ 280</li> <li>Effective waste management reduces environmental impact</li> </ul>	<ul> <li>Monthly inspection of 420 points for equipment and component leakage</li> <li>The SOx emission amount of 3,930 kg is higher than the Emission Standard (1,352 kg) (X) (Note 1)</li> <li>Waste disposal is outsourced to qualified vendors. The total amount of waste in 2023 was 575.04MT, reflecting a 110% increase from the previous year (X) (Note 2).</li> </ul>	We plan to engage the approved pollutant emissions in accordance with the "Total Emission Allowance Management of Pollutants in the Kaohsiung-Pingtung-Chiayi Area" with external vendors to comply with relevant regulations.	4.3 Emissions Management			
12 REPROGRAFI ADVINCTION ADVINCTION	<ul> <li>Ethylene efficiency ≤ 1.009</li> <li>Flexible intermediate bulk container (FIBC) recovery rate &gt;78%</li> <li>Circular economy, waste metal recovery</li> <li>Green procurement amount &gt; 5 million</li> </ul>	<ul> <li>Ethylene efficiency 0.9969</li> <li>Flexible intermediate bulk container (FIBC) recovery rate 78.3%</li> <li>Waste metal recovery 185.34MT</li> <li>Reported green procurement amount is NT\$14.13 million</li> </ul>		4.1 Resource Management 4.3 Emissions Management			
13 CUMARE	<ul> <li>Climate Change Risk Management</li> <li>Establish the carbon reduction commitment to reduce emissions by 27% over baseline year 2017 by 2030, and reach carbon neutral goal by 2050</li> </ul>	<ul> <li>We have identified 24 climate-related risks and opportunities, identifying 10 significant climate topics and formulated countermeasures to address the potential financial impacts based on the TCFD framework.</li> <li>Establish the ISO 50001 energy management system (EnMS) and monitor energy efficiency indicators</li> <li>2023 emissions reduced by 7.7% over the baseline year</li> </ul>		4.2 Climate Change and Energy Management			

Note: 1. The primary cause of the increase in SOx emissions is the Department of Environmental Protection revised the calculation method for SOx emissions from RTO equipment.

2. In addition to experiencing two full-plant shutdowns for maintenance in 2023 (one more than in previous years), which led to an increase in waste, this year also saw an increase in the reported volumes of waste designated for "landfill disposal" and "recycling." This was done following verification by a third-party certification body, resulting in a higher total waste volume.



APC establishes the following short-term action plans and medium- to long-term plans in accordance with the SDGs-linked sustainability approaches are as follows:

### **Sustainability Approaches**

### Short-term Action Plans (2023-2025)

### Medium- to Long-term Plan (2026-2028)

### Governance



- ▼ Enhance materials dispatch flexibility for Kaohsiung Intercontinental Container Terminal (ICT) Phase II investment project
- Gulei Petrochemical Integrated Plant has officially begun production, with optimal adjustments to the process.
- Remains flexible in adjusting its product portfolio in the domestic production line
- Actively developing markets outside of Mainland China (Southeast Asia, South Asia regions)
- ✓ Integrate product and production lines to enhance market influence
- Continuous developing the products of higher-valued and high-end applications

### **Environmental**



Enhance production efficiency Environmental sustainability and survival

- Implement the progress of GHG inventory and assurance, in compliance with government regulations
- ▼ Enhance resource efficiency and reduce effluents and waste
- Equipment replacement, implement energy saving and carbon reduction programs, and climate adaptation actions
- Plan to install self-generation and self-consumption solar PV power plant (499kW)
- Procured 1.913 million kWh of green electricity from USI Green Energy Corporation.

- Align with International Financial Reporting Standards (IFRS)
   Sustainability Disclosure Standards
- ✓ Promote clean production and green manufacturing
- Response to the potential financial impact of risks and opportunities on the topic of climate change
- ✓ Implement the Group's 27% carbon reduction goal by 2030 and reach carbon neutral goal by 2050

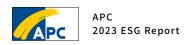
### Social



People-oriented management ESG fulfillment

- Execute human rights due diligence, identify human rights risks, reduce measures of human rights risks, provide training on human rights protection practices, and implement the protection of human rights.
- ✓ Promote process safety management (PSM)
- ✓ Implement Occupational Health and Safety management and maintain a record of zero occupational accidents
- Invest resources in caring for vulnerable groups, the remote townships education, assist community development, and promote domestic cultural development, and other charitable activities.

- ✓ Value employee rights, ensure workplace safety, and foster an environment of respect and dignity for all employees
- Successor training
- Enhance industrial safety checks for zero accident
- Continuously sponsor charitable activities to enhance social service capacity

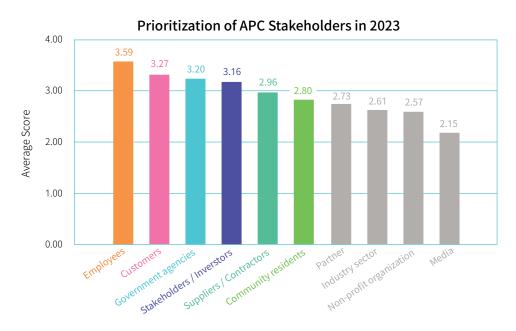


# 1.3 Stakeholder Engagement GRI 2-12, 2-29

# **Identification of key stakeholders**

The annual assessment is conducted by a working group under the "ESG Committee" comprised of representatives from 19 APC departments. Each group member lists the stakeholders with close contacts and influence by business, such as employees, stakeholders/investors, customers, suppliers/contractors, community residents, government agencies, non-profit organizations, industry representatives, partners, and the media.

According to the Responsibility, Influence, Dependency, Diverse Perspectives, and Tension items in the AA 1000 Stakeholder Engagement Standard (SES 2015), stakeholders are evaluated based on the closeness of their relationship to each standard on a scale of 0 to 4. The results of the stakeholder identification assessment are sorted by average score, as diagrammed below:



Evaluation based on AA 1000 SES 2015: Responsibility, Influence, Dependence, Diverse Perspectives, Tension

After discussing the results of stakeholder identification and evaluation by the project secretary and three team leaders of the ESG Committee, determined the following six major stakeholder categories based on the evaluation score "employees, customers, government agencies, stakeholders/investors, suppliers/contractors, and community residents". Stakeholder engagement results, including stakeholder identification, concerned topics, communication channels and frequency, and APC response methods were approved by the "ESG Committee" and reported to the "Board of Directors".

# APC Major stakeholders in 2023

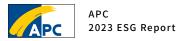




# **Concerned Topic and Response**

Through the external business communication in routine operations, the ESG Committee working group collected the "Concerned Topics and Communication Channels/Frequency" of the six major stakeholder categories and addressed to the concerned issues and the status of implementation. The concerned topics, communication channels, and responses of major stakeholder groups in 2023 are tabulated below:

Major Stakeholder	Materiality	Concerned Topic	Communication Channel (Frequency)	APC response (responsible unit)	Implementation Status	Response
Employees	Employees are essential assets in APC. Through well-structured salaries, welfare system, and education and training, strengthen the cohesion of employees, enrich and enhance their professional knowledge and skills, and achieve mutual prosperity with the Company's sustainable development.	Economic Performance     Talent attraction and retention     Occupational Health and Safety     Climate Change and Energy Management	Employee Welfare Committee (3 times/year)     OHS Committee (once/quarter)     Employee Health Checkup (Once/year)     Educational Training (as planned)     Enterprise Labor Union Members General Meeting (Once/year)     Enterprise Labor Union Board Meetings (4 times/year)     Supervisory Committee of Business Entities' Labor Retirement Reserve (Twice/year)     Performance Interview (Once/year)     Material Topics questionnaire survey (Once/2 years)	<ul> <li>Hold the shareholders' annual general meeting regularly, and disclose the annual report and financial statements periodically as required. (Accounting Division)</li> <li>Through occupational health and safety educational training and emergency response drills, we aim to achieve the goal of zero accidents in industrial safety. (Industrial Safety Office)</li> <li>Provide appropriate remuneration and well-structured welfare system, adjust salaries based on annual performance evaluations, and offer comprehensive job educational training to achieve the goals of talent cultivation and retention. (Human Resources Division, Personnel Section)</li> <li>USI Green Energy Corporation will sign a green power purchase agreement with various plants within the USI group. (Equipment Preventive Maintenance and Environmental Risk Control Division, (PdM &amp; ERM Division), Technical Division)</li> <li>APC passed the project of install self-generation and self-consumption solar PV power plant. (PdM &amp; ERM Division)</li> </ul>	<ul> <li>The shareholders' annual meeting is convened on May 30, 2023. The annual reports and financial statements are disclosed as required</li> <li>Employee Welfare Committee meeting 4 times</li> <li>Annual performance evaluation and salary adjustment once.</li> <li>OHS Committee 3 times</li> <li>Supervisory Committee of Business Entities' Labor Retirement Reserve twice</li> <li>Employee health checkup 4 stages</li> <li>Contracted physician provided health services 6 times</li> <li>Occupational health and safety educational training for 705 people with a total of 4,779 hours</li> <li>Signed corporate power purchase agreement in 2024, with plans to distribute green power to each plant by 2025.</li> <li>Asia Polymer Corporation will install selfgeneration and self-consumption solar PV power plant in June 2025.</li> </ul>	4.2 Climate Change and Energy Management 5.1 Talent Selection 5.2 Talent Development 5.4 Healthy Workplace
Customers	Customers are important partners of APC's operation and development. Through technical cooperation and product improvement, we provide customers with satisfactory product quality and services.	Climate Change and Energy Management     Technology R&D     Supply Chain Management	Sales visit customers (irregularly every month) Customer satisfaction survey (at least once/year) Market survey (Irregularly) Customer feedback and customer dispute resolution (irregularly)	Set energy conservation and carbon reduction goals, Identification of Climate Risks and Opportunities, and Potential Financial Impact. (PdM & ERM Division) APC mandates that the raw materials provided by suppliers must be devoid of any restricted substances to comply with sustainable material specifications (Procurement Section I and II) Complete the signing of the supplier commitment, conduct supplier factory audits, and for suppliers who fail to meet APC Social and Environmental assessments, they will be provided with guidance and required to improve. (Logistics Division)	<ul> <li>APC's carbon reduction results, carbon emissions had reduced by 7.7% as the end of 2023 compared with the baseline year (2017).</li> <li>All APC products do not contain relevant restricted substances</li> <li>Sales representatives visited customers 13 times/month on average</li> <li>Technical service for 86 customers were provided throughout the year</li> <li>The overall Customer Satisfaction is 98%</li> <li>Achievement rate of customer feedback handling 100%</li> <li>Signing of the Supplier Social Commitment has been included as part of the supplier evaluation criteria</li> </ul>	3.1 Technology R&D 3.3 Supply Chain Management 4.2 Climate Change and Energy Management



Major Stakeholder	Materiality	Concerned Topic	Communication Channel (Frequency)	APC response (responsible unit)	Implementation Status	Response
Government agencies	Government agencies are an important indicator and direction for business development and market expansion. Responding to legal compliance from government agencies is the fundamental concept and principle for corporate survival and development.	Compliance with Laws and Policies Compliance with laws and regulations and coordination with activities Transparency and the Disclosure of Information Process Safety Management (PSM) Cocupational Safety and Health Water resources management Air Pollution Control Climate change and Energy management	Exchange of official documents and report of material information and data (as required by regulations)     Law and regulation outreach activities or public hearings (as required by regulations)     Forums, seminars, or annual meetings (as required by regulations)     On-site audit (as required by regulations)     Market Observation Post System (as required by regulations)	<ul> <li>Promote the 14 PSM items based on regulatory requirements and reduce process risk through USIG audits. (Inspection Section)</li> <li>In compliance with the regulations of government agencies, we aim to achieve the OHS policy goals of "zero accidents in occupational health and safety". (Industrial Safety Office)</li> <li>Established water conservation plans and measures to align with government water rationing implementations. (Manufacturing Section)</li> <li>Air pollutant emission monitoring and control. (Ecofriendly Section)</li> <li>In accordance with USIG's 2030 carbon reduction target, we aim to achieve a 27% reduction in energy consumption and carbon emissions compared to the baseline year. (PdM &amp; ERM Division, Technical Division)</li> <li>Meets the annual average electricity conservation target of 1% set by the Energy Administration. (Technical Division)</li> </ul>	<ul> <li>The average exchange of official documents with government agencies is 15 cases/month</li> <li>Zero Process Safety Incidents in 2023</li> <li>The average legal outreach is 4 sessions/month</li> <li>The average forums or seminars is 3 sessions/month</li> <li>On-site audit: 35 cases/year</li> <li>Industrial safety: 15 cases; Eco-friendly: 20 cases</li> <li>APC's 2023 GHG emissions have decreased by 7.7% compared to the baseline year (2017).</li> <li>The average electricity conservation rate from 2015 to 2023 was 1.57%, in compliance with the regulations requirements by the Energy Administration.</li> </ul>	4.1 Resource Management 4.2 Climate Change and Energy Management 5.4 Healthy Workplace
Shareholders/ Investors	Shareholders/ Investors are the important supporters of APC survival and development. Through capital investment and governance oversight, they enable the Company's sustainable survival and development.	Economic Performance     Occupational Safety     and Health     Technology R&D     Climate change and     Energy management	Shareholders' Annual general meeting (once/year) Market Observation Post System (as required by regulations) Publication of financial statements, annual reports (as required by regulations) Contact information of spokespersons (Irregularly) "Investor Service" section on the corporate website (irregularly) Information of the "United Stock Affairs Web" on the corporate website (Irregularly and immediately) Publish the ESG report (once/year) Audit Committee Email (irregularly) Investor conference (twice/year) Material Topics questionnaire survey (once/every 2 years)	<ul> <li>Hold "Investor conferences" to present the status of corporate operations and future prospects. (Sales Division, Accounting Division)</li> <li>Financial statements (quarterly) and annual report (annually) are published as required by regulations (Accounting Division)</li> <li>Immediate release of material information. (Accounting Division)</li> <li>Establish the "USIG Safety Incentive Policy" to achieve the goal of "Zero Accident". (Industrial Safety Office)</li> <li>Complete one or more product research and development projects annually. (Technical Division)</li> <li>In accordance with USIG's 2030 carbon reduction target, we aim to achieve a 27% reduction in carbon emissions compared to the baseline year. (PdM &amp; ERM Division, Technical Division)</li> <li>Plan to install self-generation and self-consumption solar PV power plant and sign the Corporate Power Purchase Agreement (CPPA) with USI Green Energy Corporation. (PdM &amp; ERM Division, Technical Division)</li> </ul>	<ul> <li>Shareholders' Annual General Meeting (May 30, 2023)</li> <li>Financial statements (quarterly) and annual report (annually) are published as required by regulations</li> <li>Held investor conferences twice in 2023 (2023.05.16, 2023.11.16)</li> <li>Zero lost-time due to disabling injury have reached 5.81 million working hours in 2023.</li> <li>One new product was under development in 2023</li> <li>One case of quality improvement.</li> <li>Self-generation and self-consumption solar PV power plant (499kW) will install in June 2025.</li> <li>Signed the Green Power Purchase Agreement (CPPA) in 2024 to purchase 1,913,000 kWh of green electricity in 2025.</li> </ul>	2.2 Economic Performance 4.2 Climate Change and Energy Management 5.4 Healthy Workplace

Major Stakeholder	Materiality	Concerned Topic	Communication Channel (Frequency)	APC response (responsible unit)	Implementation Status	Response
Suppliers/ Contractors	Suppliers are crucial partners for APC, providing essential raw materials and equipment that impact production operations and product quality.	Supply Chain     Management     Process Safety     Management (PSM)     Occupational Safety     and Health     Raw material     management	Procurement procedures (on-demand)     Supplier questionnaire survey (when new suppliers are added, once/year)     Performance review meeting (on-demand)     Face-to-face review meeting (by product category)     Purchaser visit (irregularly)     Market survey (weekly)     Confirm Materials supply stability (Irregularly)     Contractor consultative organization meeting (Irregularly)	<ul> <li>Complete the signing of the supplier commitment, conduct supplier factory audits, and for suppliers who fail to meet APC Social and Environmental assessments, they will be provided with guidance and required to improve. (Logistics Division / Procurement Department)</li> <li>Promote the 14 PSM items based on regulatory requirements and reduce process risk through USIG audits. (Inspection Section)</li> <li>Establish the "USIG Safety Incentive Policy" to achieve the goal of "Zero Accident". (Industrial Safety Office)</li> <li>The goal of flexible intermediate bulk container recovery rate ≥ 78% (Finished Products Division)</li> </ul>	<ul> <li>Survey on topics that concerned suppliers, once</li> <li>Secondary Material Purchasing Planning Meeting, irregularly</li> <li>Market survey report, once a week</li> <li>Purchaser visits several times, irregularly</li> <li>Zero Process Safety Incidents in 2023</li> <li>Zero lost-time due to disabling injury have reached 5.81 million working hours in 2023.</li> <li>2023 Flexible intermediate bulk container recovery rate 78.3%</li> </ul>	3.3 Supply Chain Management 5.4 Healthy Workplace
Community residents	Community residents are APC's close partners. Apart from being one of the main workforce sources, but also the supervisor of our operations, industrial safety, and environmental protection.	Social Engagement     Occupational Health and Safety     Air Pollution Control     Underground Pipelines Transportation	Neighborhood visits (irregularly) Participation in community activities (irregularly) Organize community friendly matches (at least once/year) Set up scholarships, promote Talent Development (once/year) Government agencies on-site inspections (irregularly) Educational activity investment (irregularly) Third-party destruction prevention (irregularly)	<ul> <li>Establish sound interactive relationships with community residents through participation in community activities and visits, allowing them to understand the operation of the plant to avoid misunderstandings. (Human Resources Division/General Affairs Section)</li> <li>By organizing community friendship and charity sports events, the needs and expectations of community residents are understood. (Human Resources Division/General Affairs Section)</li> <li>Establish the "USIG Safety Incentive Policy" to achieve the goal of "Zero Accident". (Industrial Safety Office)</li> <li>By regularly conducting VOCs leakage detection through internal and external units to ensure the health and safety of the work environment and community residents. (Ecofriendly Section)</li> <li>Utilize the opportunity of pipeline construction site inspections and presence to explain the current status of pipeline operation and related topic descriptions to community residents. (Inspection Section)</li> </ul>	<ul> <li>Irregular community visits chief of village and neighborhood</li> <li>Adopted the air quality purification zone in Wang Gung Elementary School, Linyuan District (2023.07.19~2024.07.18)</li> <li>Participated in the Eco-friendly activities of the Environmental Protection Bureau Kaohsiung City</li> <li>Wang Gung Elementary School's Greenhouse Gas Emissions Reduction Matching Plan (2023.06.01~11.30)</li> <li>One match of the USI Cup Community Tennis Friendship Tournament</li> <li>Charity softball and basketball matches, a total of 2 games</li> <li>USI Education Foundation held 2 social charity events</li> <li>On-site inspections, 20 Eco-friendly cases</li> <li>280 inspection points for equipment components monthly</li> <li>To prevent third-party damages, pipeline construction surveys are conducted irregularly</li> </ul>	4.3 Emissions Management 5.4 Healthy Workplace 5.5 Social Engagement

# 1.4 Materiality Analysis GRI2-14

APC follows the GRI Universal Standards 2021 for the identification process, building around the three major steps of identification, analysis, and verification. Materiality analysis is conduct every 2 years, incorporating a double materiality mindset, analyzing the "level of impact on operational performance" and "level of impact on the economy, environment, and people (including human rights)". The identification process and result of material topics, after discussion by the Group's ESG experts, were reported to the ESG Committee and finally approved by the Board of Directors, ensuring that the direction of sustainable operations and the contents of the reports align with the concerns and expectations of internal and external stakeholders.

# **Process of Determining Material Topics GRI 3-1**

Identification

### **Communication Target**

Following the five aspects of the AA1000 Stakeholder Engagement Standard (SES), the ESG working group manager distributes stakeholder identification questionnaires biennially and coincides with the analysis of material topics in the same year. After the statistical results are verified by the project secretary and group leaders of the ESG Committee, stakeholders are categorized into six core groups based on their identification scores: employees, customers, government agencies, investors, suppliers/contractors, and community residents.

6 types of



### **Collect topics**

In line with International Sustainability Regulations and Standards (GRI Universal Standards: 2021, SASB, SDGs, TCFD) as well as the company's operational goals and visions, the working group compiled 35 actual and potential sustainability topics, both positive and negative.

35 sustainable topics



### **External Impact Topic Survey**

The questionnaire was conducted for core stakeholders in 2022, with scores given based on the positive and negative impact levels of the topics. A total of 213 valid feedback was received, including: employees (149), customers (13), investors (14), suppliers/contractors (16), government agencies (4), community residents (17).

213 valid external responses



### **Internal Impact Topic Investigation**

A survey was conducted among internal managers and directors at APC in 2023, scoring each topic based on its positive and negative impact levels and likelihood of occurrence. A total of 23 valid responses were received. Weightings were adjusted according to the results of the questionnaire at the highest governance body for the statistical analysis.

23 valid internal



### **Materiality Analysis**

Materiality Analysis is a methodology that includes evaluating the impacts on economic, environmental, and human (human rights) of sustainable development. It incorporates the concept of Double Materiality into the analysis of materiality topics, with a frequency of once every two years. Based on the questionnaire analysis results, 15 significant ESG topics were selected from 35 sustainability topics. They were classified according to the environmental, social, and governance aspects and underwent double materiality analysis, converging into 9 material topics.

**15** Significant Topics

Confirm

**Analysis** 

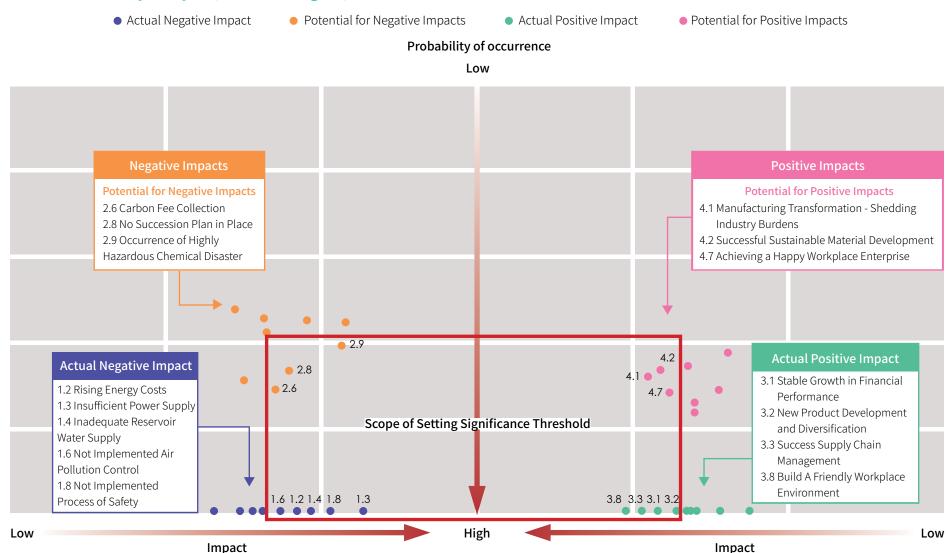
# **Material Topics**

To continue the tracking of material topics management of 2021, the working group has incorporated (raw material management) into 2022 material topics, a total of 10 items, and the result has been approved by the members of the ESG Committee and reported to the Board of Directors.

**10** Material Topics



# **Method of Materiality Analysis (Continued Figure)**

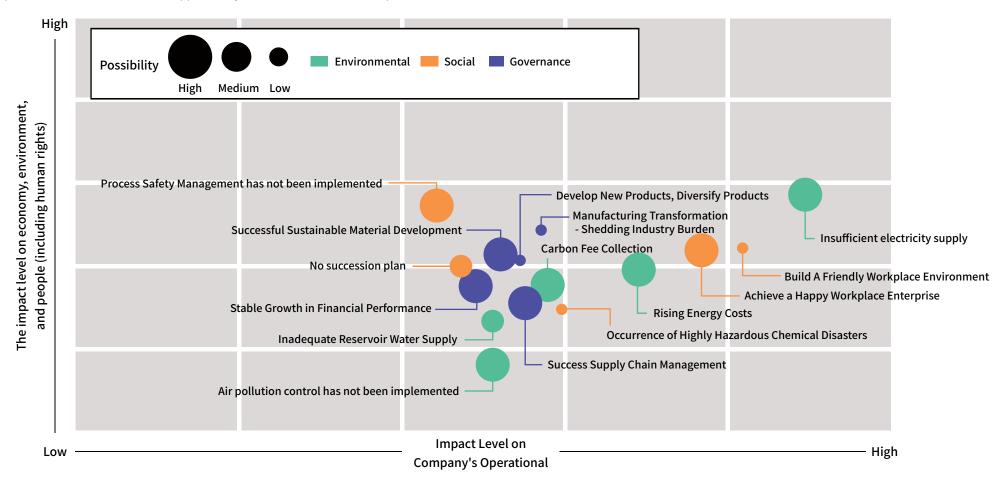


Descriptions: 1. The 35 sustainability issues have been categorized into four dimensions: "Actual Positive," "Potential Positive," and "Potential Negative." The numbers represent the issue numbers within each dimension, not scores.

- 2. The impact is rated from low to high (0 to 5 points), and the likelihood of occurrence is also rated from low to high (0 to 5 points). The significance threshold is set at an impact score above 3.7 and a likelihood score
- 3. A total of 15 issues that fall within the significance threshold have been selected as "Significant Issues."

# **Material Topics Selection**

[APC] categorized the 15 significant topics based on the environmental, social, and governance aspects. We performed a double materiality analysis based on the "level of impact on operational performance" and "level of impact on the economy, environment, and population (human rights)", which led to convergence into 9 material topics. In addition, to continue tracking the Material Topics management in 2021, the working group has incorporated [Raw material management] into the Material Topics in 2022, totaling 10 topics, and the results have been approved by the ESG Committee and reported to the Board of Directors.





# List of Material Topics GRI 3-2

		15 Signif	icant Topics	10 Material Topics
	1	(Negative Actual)	Insufficient electricity supply	
90	2	(Negative Actual)	Rising Energy Costs	1 Climate change and energy management (GRI 302 Energy)
	3	(Negative Potential)	Carbon Fee Collection	
Environmental	4	(Negative Actual)	Inadequate Reservoir Water Supply	2 Water management (GRI 303 Water and Effluents)
	5	(Negative Actual)	Air pollution control has not been implemented	3 Air pollution control (GRI 305 Emissions)
	6	(Positive Actual)	Build A Friendly Workplace Environment	Occupational Health and Safety (GRI 403 Occupational Health and Safety)
Social	7	(Positive Potential)	Achieve a Happy Workplace Enterprise	occupational reality and safety (on 103 occupational reality and safety)
	8	(Negative Actual)	Process Safety Management has not been implemented	Process Cafab Managament /DCM)
	9	(Negative Potential)	Occurrence of Highly Hazardous Chemical Disasters	5 Process Safety Management (PSM)
	10	(Negative Potential)	No succession plan	6 Talent attraction and retention (GRI 401 Employment)
	11	(Positive Potential)	Manufacturing Transformation - Shedding Industry Burden	
	12	(Positive Actual)	Successful Sustainable Material Development	7 Technology R&D
	13	(Negative Actual)	New Product Development and Diversification	
Governance	14	(Positive Actual)	Success Supply Chain Management	8 Supply chain management (GRI 308 Supplier Environmental Assessment) (GRI 414 Supplier Social Assessment)
	15	(Positive Actual)	Stable Growth in Financial Performance	9 Economic Performance
Co	ontinui	ng the tracking of 20	21 material topics management	10 Raw material management

Descriptions: 1. The 15 significant topics have been converged into 9 material topics and one continued tracking topic management for 2021, totaling 10, and corresponding to the GRI Material Topics.

<sup>2.</sup> The Material Topics of APC in 2023 remained the same as in 2022, continuing to monitor the implementation results of the policies for Material Topics Management.

# **Prioritize the materiality and identify boundaries**

Ten material topics were determined through materiality analysis. A double materiality analysis was conducted based on the "level of impact on operational performance" and the "level of impact on the economy, environment, and population (human rights)" to identify the order of material topics. Correspond to specific topics and boundaries according to GRI standards, outlining their level of involvement and scope of impact, along with corresponding sections of GRI management approaches, as follows:

				Corresponding	Торі	c Boundaries			GRI Management
Materiality Sorting	Aspects	Material Topics	Reasons for Materiality	GRI Standards	Level of Involvement		Approach Corresponding		
				Material Topic	Level of involvement	Upstream (Note 1)	Company	Downstream (Note 2)	Section
1	Environ- mental	Climate Change and Energy Management	All businesses must confront the challenges posed by extreme weather events resulting from climate change. The imperative to enhance energy efficiency and reduce greenhouse gas emissions becomes indispensable for enterprises to address.	GRI 302 Energy 2016 GRI 305 Emission 2016	<ul> <li>The compliance with the Greenhouse Gas Reduction and legal compliance with energy regulations enhance energy efficiency, directly impact APC Linyuan Plant and indirectly impact government agencies and community residents.</li> <li>The exchange of related experience in energy conservation and carbon reduction technology also indirectly influences partners.</li> </ul>	O Government agencies O Partners (Note 3)	● Linyuan Plant	O Community residents	4.2 Climate Change and Energy Management
2	Social	Occupational Safety and Health	A healthy and safe workplace environment concerns workers most. Hence, APC must value the implement safety and health management and provide employees and non-employees with a healthy and safe workplace environment.	GRI 403 Occupational Health and Safety 2018	<ul> <li>Implementing safety and health management can prevent accidents and directly impact APC employees and workers engaging in the relevant operations and activities in Linyuan Plant.</li> <li>Legal compliance indirectly impacts government agencies.</li> </ul>	<ul><li>Suppliers/ Contractors</li><li>Government agencies</li></ul>	● Linyuan Plant		<u>5.4 Healthy</u> <u>Workplace</u>
3	Social	Process Safety Management (PSM)	Petrochemical plants often cannot afford a single process accident, and the implementation of the PSM system has become a trend in Taiwan's petrochemical sector. To prevent low-probability high-hazard major accidents, PSM is extremely important for USI.	N.A.	<ul> <li>Process safety accidents directly impact plant operations and employee safety, with the scope of impact covering Linyuan Plant, investors, government agencies, and customers.</li> <li>Indirectly affect customer demands and community residents safety.</li> </ul>	<ul><li>Investors</li><li>Government agencies</li></ul>	● Linyuan Plant	<ul><li>Customers</li><li>Community residents</li></ul>	<u>5.4 Healthy</u> Workplace
	Gover-	Technology	New product development and product	N.A.	· Technology R&D capacity affects product competitiveness	O Investors	● Taipei HQ	<ul><li>Customers</li></ul>	3.1 Technology
4	nance	R&D	quality improvement can enhance market competitiveness, and fulfilling customer demands is the foundation of APC's sustainable development.		<ul><li>and company operations, making a direct impact on employees and customers.</li><li>The growth of corporate operations indirectly impacts investors and partners.</li></ul>	O Partners	● Linyuan Pla	ant	<u>R&amp;D</u>
5	Gover- nance	Supply Chain Management	Issues in relation to sustainable operations and supply chain risk management are gaining importance. Hence, it is very important for APC to understand the impacts on corporate operations, society, and the environment of suppliers and implement supplier management.	GRI 308 Supp- lier Environmental Assessment 2016 GRI 414 Supp- lier Social Assess- ment 2016	<ul> <li>Add the Supplier ESG Commitment as a requirement for new supplier evaluation directly impacts APC's suppliers/ contractors.</li> <li>Undersupply or quality instability of suppliers directly impact Linyuan Plant and customers.</li> </ul>	<ul><li>Suppliers/ Contractors</li></ul>	● Taipei HQ ● Linyuan Pla	• Customers ant	3.3 Supply Chain Management



Materiality (		   Material		Corresponding	Scope of Impact			GRI Management — Approach	
Sorting	Aspects	Topics	Reasons for Materiality	GRI Standards			Scope of Impact	Corresponding	
				Material Topic	Level of involvement	Upstream (Note 1) Company Downstream (Note 2)			
6	Social	Talent attraction and retention	Employees are essential assets of the company. Through well-structured salaries, welfare system, and education and provide a safe working environment to attract and retention excellent talents, bringing constant development momentum to the Company.	GRI 401 Employment 2016	Salary, welfare system, and workplace environment have a direct impact on APC's employees.		<ul><li>Taipei HQ</li><li>Linyuan Plant</li></ul>	5.1 Talent Selection 5.2 Talent Development	
7	Gover- nance	Economic Performance	Operational growth is essential for corporate survival, therefore economic performance is the primary topic in sustainable development.	GRI 201 Economic Performance 2016	· Economic performance relates to corporate profits, directly impacting employees and investors.	<ul><li>Investors</li></ul>	<ul><li>Taipei HQ</li><li>Linyuan Plant</li></ul>	2.2 Economic Performance	
8	Environ- mental	Water resources management	Due to abnormal global warming and climate change, water shortages have become increasingly severe in Taiwan in recent years. The government's water rationing measures will directly affect the operation of APC's production lines.	GRI 303 Water and Effluents 2018	<ul> <li>The government's water rationing measures unable to optimal operation of production lines and affect production costs to directly impact on the operational cost of Linyuan Plant</li> <li>Decreased raw materials demand and product supply indirectly impact suppliers and customers.</li> </ul>	O Suppliers/ Contractors	● Linyuan	4.1 Resource Management	
9	Environ- mental	Air Pollution Control	Air pollutant emissions not only violate environmental regulations but also affect the air quality of the living environment.	GRI 305 Emission 2016	<ul> <li>Compliance with air pollutant emissions regulations and the execution of reduction plans have a directly impact APC Linyuan plant.</li> <li>Air pollutant emissions affects the air quality around the plant, directly impact on community residents.</li> </ul>		● Linyuan Plant ● Community residents	4.3 Emissions Management	
10	Environ- mental	Raw material management	Circular economy is an increasingly prioritized environmental topic for businesses, as it not only reduces waste generation but also enhances the efficiency of raw material utilization, thereby lowering production costs.	GRI 301 Materials 2016	<ul> <li>The control of raw material production efficiency and material recycling and reuse directly impacts the operating costs of Linyuan Plant.</li> <li>Indirect impact on the suppliers and contractors related to raw materials.</li> </ul>	O Suppliers/ Contractors	● Linyuan Plant	4.1 Resource Management	

Note: 1. Upstream Boundary: Suppliers/Contractors, Investors, Partners, Government Agencies, etc. are the inputs that affect the Company's operations.

<sup>2.</sup> Downstream boundary: Output affected by the Company's operation such as customers, community residents, etc.

<sup>3. •</sup> Direct impact; • Indirect impact

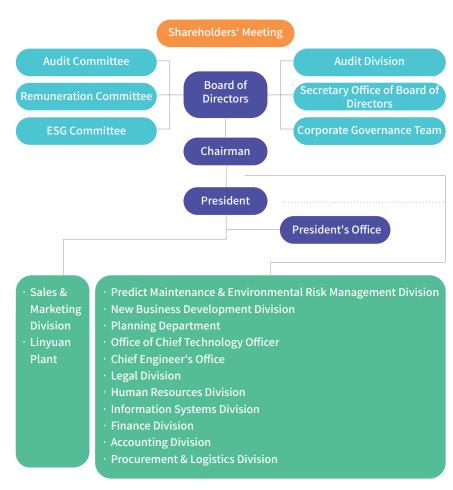






# 2.1 Corporate Governance

### **Governance Structure GRI 2-9**



Note: In terms of organizational framework, the Procurement & Logistics Division, Group Accounting Division, Group Finance Division, Group Information Systems Division, Group Human Resources Division, and other common departments belong to USIG, and each department has responsible staff to take charge of APC's business.

# **Board of Directors operation GRI 2-9, 2-10, 2-11**

We adopt the candidate nomination system for the directorial (including independent directors) election. The Board along with shareholders holding over one percent of the total issued shares may propose the candidates to add to the List of Candidates for Directors and Independent Directors. After candidate qualification by the Board, the proposal is presented at the meetings of shareholders for shareholders to vote on from the List of Candidates for Directors and Independent Directors. The current board of directors was elected in 2022 and is composed of nine directors with rich experience in their respective professional fields. Among them, four positions are assigned to independent directors, who make up 44% of the Board.

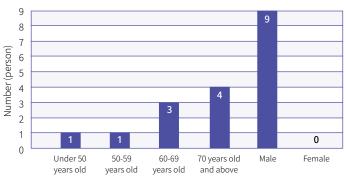
The directors of the Company serve a term of three years and may be reelected for consecutive terms. Please refer to the table below for information about the Board of Directors members.

Current term	May 27, 2022 - May 26, 2025				
Member  Directors: Quintin Wu (chairman), Kuo-Hung Li, Pei-Chi Wu (president), Hung-Chi-Hsiao Ko Independent directors: Frank Chen, Shang-Hung Shen, Tung-Chein Cheng, Chier					
Gender of members	Male: 9, Female: 0				
Age of members	Under 50 years old: 1, 50-59 years old:1, 60-69 years old:3, 70 years old and older: 4				

A total of four board meetings were held in 2023 by the Company, with a personal attendance rate (including independent directors) of 91.67% (100% including attendance by proxies). For more operational information of the Board led by the chairman. Please refer to the APC Annual Report 2023 p.27 of the Annual Report and APC corporate website Board of Directors Information.

The chairman convenes and chairs at least one board meeting each quarter (please refer to the Rules of Procedure of Meetings of Board of Directors). Under the Board there are functional meetings including the Remuneration Committee, Audit Committee, and ESG Committee. Each committee holds committee meetings to report, discuss, and resolve proposals before referring them to the Board for reporting, discussion, and resolution.

# Age and Gender Distributions of Board Members



### Process of proposal submission to the Board of Directors GRI 2-12, 2-16

The business responsible unit submits proposals to the functional committee(s) for discussion. After making the resolution, the functional committee(s) forward the proposals to the Board of Directors for discussion and resolution. After the meeting, functional committees and the Secretary Office of the Board produce the meeting minutes containing the resolution results. The process for submitting board meeting proposals is as follows:





# **Responsible Units**

**Proposal Submission** 





#### **Functional Committees**

Meetings shall be convened according to the relevant scope of authority, where agenda proposals are reported, discussed, and resolved, with the resolution results in meeting minutes.





#### **Board Submission**

Proposals are reported, discussed, and resolved, with the resolution results in meeting minutes.

For the process of proposal submission to the Board of Directors, responsible unit, and important Board resolutions of 2023, please refer to the table below.

Important Board Resolutions of 2023. (Please visit the Significant Board Resolution section of the Company's website or refer to pp.113-115 of the APC Annual Report) Additionally, we have established the "Secretary Office of Board of Directors" to plan and prepare matters relating to the Board meeting so as to enhance the efficiency of board meeting and help implement Board resolutions.

### Performance of the board member diversity policy

### I. Performance of the board diversity policy GRI 2-10

In accordance with Article 20 of "Corporate Governance Best Practice Principles", diversity should be considered for the Board of Directors composition, and board members should be equipped with the knowledge, skills, and competencies required by their duties.

To achieve the ideal goal of corporate governance, the board of directors shall possess the following abilities:

- Ability to make operational judgments
- 2 Ability to perform accounting and financial analysis
- 3 Ability to conduct administration management
- Ability to conduct crisis management

- **5** Knowledge of the industry
- 6 An international market perspective
- 1 Leadership ability
- 8 Ability to decision-making

In addition to the above eight professional abilities required for carrying out their duties, and in response to the increasing global concerns about topics relating to corporate governance and environmental protection, three directors are also "legal" and "environmental" specialists. All current members have the knowledge, skills, and qualities required for their duties, and they each have expertise in finance accounting, International market, legal, environmental, and more.

### II. Targets for management of board diversity GRI 2-17

To recruit external excellent talent into the Board of Directors to achieve the Board diversity, the number of seats for Independent Directors was added from original 3 to 4, and elected on May 27, 2022. Mr. Chien-Ping Chen is a newly appointed Independent Director, with a master's degree in Business Administration from the University of California, USA. He has previously served as the Chairman of Ta Chong Commercial Bank and extensive experience in the financial industry. He specializes in financial risk control, which would contribute to the improvement of the deliberation quality of finance-related proposals by the Board of Directors and thus accomplishing the aim of the board diversity policy. In the future, a director with professional experience in sustainability development will be the next goal for the board diversity. Such experience could assist the Company achieve carbon reduction goals and implement green power policies. A director specializing in operational risk control is another goal to enhance the Company's sustainable competitiveness. With such an establishment, the Board functionalities will be more complete. (Performance of the board member diversity policy: Pages 43~46 of the APC 2023 Annual Report and the Company's official website).

# III. Performance of the board member diversity policy: GRI 2-17

						Diversifica	ation Items				
Name of Director	Gender	Operation judgments	Accounting finance	Management administration	Crisis management	Industry background knoledge	International market	Ability to lead	Ability to make policy decisions	Law	Eco-friendly
Quintin Wu	Male	•	•	•	•	•	•	<b>Ø</b>	•		
Kuo-Hung Li	Male	•	•	•	<b>Ø</b>	•	•	<b>Ø</b>	•		•
Pei-Chi Wu	Male	•		•	•	•	•	<b>Ø</b>	•		
Hung-Chu Wu	Male	•		•	•			<b>Ø</b>	•		
I-Hsiao Ko	Male	•		•	•	•	•	•	•		
Ta-Hsiung Chen	Male	•	•	•	•		•	•	•	•	
Shang-Hung Shen	Male	•	•	•	•		•	•	•		<b>Ø</b>
Tun-Chien Cheng	Male	•	•	•	•		•	•	•		
Chien-Ping Chen	Male	•	•	•	•			<b>Ø</b>	•		

Note1: Currently, 22% of directors at APC are also employees, and 44% of them are independent directors.

Note2: All four independent directors have not served more than three consecutive terms.

### Enhancement of director's professional competence

To improve the professional competence of directors, the Company regularly provides information of related continuing education courses for directors and plans a total of 6 hours of internal continuing education courses. In 2023 we arranged 72 hours of external continuing education courses for all directors and independent directors. All directors completed the training hours as stipulated for the "Directions for the Implementation of Continuing Education for Directors and Supervisors of TWSE Listed and TPEx Listed Companies." Please refer to Page 31~33 of the APC 2023 Annual Report for more information regarding the continuing education courses and their lengths.

### Avoidance of conflicts of interest of the Board of Directors GRI 2-11, 2-15

The Board of Directors has established comprehensive regulations for avoiding conflicts of interest, adopted measures of avoidance in procedures, and recorded the process in the minutes of meetings, as described below:

1 In order to strengthen Corporate Governance, the Board of Directors has established a comprehensive system to avoid Conflicts of Interest among directors to safeguard the rights and interests of investors. (Please refer to Procedure for the Board of Directors Meetings Regulations, the Code of Ethical Conduct for Directors and Managerial Officers, Ethical Corporate Management Best Practice Principles, and Procedures for Ethical Management and Guidelines for Conduct).

- 2 Measures for avoidance of conflicts of interest: When discussing a proposal constituting a conflict of interest for one or more directors during the meeting, the chairman shall remind such directors to recuse themselves from the discussion. If there is a conflict of interest for the chairman, the chairman shall recuse and assign a director having no conflict of interest with the proposal to act as the chairman.
- 3 In accordance with the Rules of Procedure for the Board of Directors Meetings Regulations, the Board Secretary Office has detailed the reasons for avoidance and the implementation status in the board meeting minutes related to proposals that involve a conflict of interest with the directors.
- 4 The board of directors' execution of avoidance for conflicts of interest proposals in 2023 complied with the law (please refer to the operation of the board of directors in page 29 of the APC 2023 Annual Report).
- **5** For the responses to the conflicts of interest between Board of Directors members and stakeholders, please refer to the "Member Information of the Board of Directors", "Shareholders Among the Top Ten in Shareholding Ratio", and "Related Party Transactions" in the 2023 financial statements.

APC Board of Directors' performance in avoidance of conflicts of interest in proposals in 2023 is as follows:

Name of Director	Motion Content	Reasons for Avoidance P due to Conflicts of Interest	articipation Voting	in Note
Quintin Wu Pei-Chi Wu Han-Tai Liu	Donation to the "USI Education Foundation".	Directors recusing themselves from the proposal were also the directors of the Foundation.	Abstained from voting	The 1st meeting in 2023 March 3, 2023
Shang-Hung Shen Ta-Hsiung Chen Tun-Chien Cheng	Proposal of abolition on directors of non- compete restriction	Directors recusing themselves from the proposal were also the directors with non-compete restrictions.	Abstained from voting	The 1st meeting in 2023 March 3, 2023
Pei-Chi Wu	Non-compete behavior of managers.	A conflict of interest with directors.	Abstained from voting	The 4th meeting in 2023 November 3, 2023

# The Board of Directors Performance Evaluation Implementation Status GRI 2-18

Set assessment methods and approaches for the performance of the Board of

Directors, execute regular self-assessment of the performance of the Board as a whole, individual directors, and Functional Committees every year. The Board Secretary Office is responsible for conducting these assessments through self-evaluation, using the assessment results as a reference for the company's review and improvement.

The overall internal performance assessment results for the Board of Directors, individual directors, and Functional Committees in 2023 are as follows:

### (1) Overall board performance

Aspect of Evaluation	Score (Note)	Results of evaluation and supplementary notes
Participation in the Company's operations	4.67	The results of the overall
Improvement of the decision quality of the board of directors	5	Board performance evaluation show that the
Composition and structure of the board of directors	5	average score of the five major aspects is 4.6, whicl means "good".
Selection and continuing education of directors	5	
Internal control	5	
Note: Score range: 0-5, 5 is the highest.		

### (2) Individual Director Performance

Aspect of Evaluation	Score (Note)	Results of evaluation and supplementary notes
Corporate targets and mission control	4.88	The results of director self-
Duty awareness of directors	5	assessment show that the average score of all six
Participation in the Company's operations	4.84	major aspects is over 4.7,
Internal relationship development and communication	4.88	which means the overall assessment result is good.
Expertise and continuing education of directors	4.79	
Internal control	4.83	
Note: Score range: 0-5, 5 is the highest.		



### (1) Performance assessment of the Audit Committee

Aspect of Evaluation	Score (Note)	Results of evaluation				
Participation in the Company's operations	4.75	The results of Audit				
Duty awareness of the Audit Committee	4.75	Committee self- assessment show that the				
Improvement of the decision making quality of the Audit Committee	4.92	average score of all five				
Composition and member selection of the Audit Committee	5	major aspects is over 4.7, which means the overall				
Internal control	4.88	assessment result is good.				
Note: Score range: 0-5, 5 is the highest.						

### (2) Performance assessment of the Remuneration Committee

Aspect of Evaluation	Score (Note)	Results of evaluation
Participation in the Company's operations	4.84	The results of Remunera-
Duty awareness of the Remuneration Committee	4.67	tion Committee self- assessment show that the
Improvement of the decision making quality of the Remuneration Committee	4.89	average score of all four major aspects is over 4.6, which means the overall
Composition and member selection of the Remuneration Committee	5	assessment result is good.
Note: Score range: 0-5, 5 is the highest.		

### (3)Performance assessment of the ESG Committee

Aspect of Evaluation	Score (Note)	Results of evaluation
Participation in the Company's operations	5	The results of ESG Commi-
Duty awareness of the Remuneration Committee	4.92	ttee self-assessment show that the average score of
Improvement of the decision-making quality of the Remuneration Committee	5	all four major aspects is over 4.9, which means the
Composition and member selection of the Remuneration Committee	5	overall assessment result is good.
Note: Score range: 0-5, 5 is the highest.		

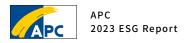
- Remarks: 1. Score range: 0-5, 5 is the highest. The performance evaluation for the period from January 1, 2023 to December 31, 2023.
  - The performance evaluation results of the overall Board of Directors, individual director members, and Functional Committees were reported to the Board of Directors in the first quarter of 2024.

### Recommendation and implementation:

In view of the increasing global attention to Environmental, Social, Governance (ESG) issues, the Company has actively implemented various measures in accordance with the Corporate Governance 3.0 Sustainable Development Roadmap issued by the regulatory authorities. The measures have been brought to the ESG Committee and Board of Directors, where directors are thoroughly briefed. The directors often provide invaluable advice during the meetings. Apart from continuously enhancing corporate governance, we have also planned carbon reduction targets and development strategies for green power to meet the international standards so as to achieve the ultimate goal of corporate sustainable development.

### Chief corporate governance officer (CCGO)

To protect the rights and interests of shareholders and improve the competence of the board of directors, the Board made a resolution on May 9, 2019 to assign Director of Legal Division, Yung-Chih Chen to be the Chief Corporate Governance Officer (CCGO) as the top officer of the Company's corporate governance. Director Yung-Chih Chen has over 20 years of experience as a practicing attorney and nearly 10 years of experience as the head of legal affairs in listed companies. His main responsibilities include handling affairs related to the meetings of the Board of Directors and shareholders according to the law, preparing minutes for the meetings of the Board of Directors and shareholders, assisting directors in taking office and continuing education, providing information needed by directors in conducting business, assisting directors in complying with laws and regulations, reporting to the Board of Directors on the results of reviewing whether the qualifications of Independent Directors are in compliance with relevant laws and regulations during their nomination, appointment, and tenure, and handling affairs related to changes in directors. In 2023, Director Yung-Chih Chen was the CCGO of the Company and received 49 hours of continuing education. Please refer to page 32 of the APC 2023 Annual Report for more information.



### Functional Committees GRI 2-9, 2-13

Asia Polymer Corporation has established three functional committees under its Board of Directors: the Audit Committee, the Remuneration Committee, and the ESG Committee. These committees are responsible for developing and reviewing policies related to their respective responsibilities, thereby enhancing corporate governance.

Title	Name	Audit Committee	Remuneration Committee	ESG Committee
Chairman	Quintin Wu			Committee Member
President	Pei-Chi Wu			Deputy Chief
Independent Director	Ta-Hsiung Chen	Committee Member	Convener	
Independent Director	Shang-Hung Shen	Convener	Committee Member	
Independent Director	Tun-Chien Cheng	Committee Member	Committee Member	Committee Chief
Independent Director	Chien-Ping Chen	Committee Member		Committee Member

#### Audit Committee GRI 2-19, 2-20

The term of the current committee commenced on May 27, 2022 and will end on May 26, 2025. All four seats of the committee are taken by all independent directors of the Company. A total of 4 committee meetings were held in 2023, with a 94% personal attendance rate

(100% including attendance by proxies). Please refer to pp. 34~39 of the APC 2023 Annual Report for more information regarding Audit Committee operation.

#### **Remuneration Committee**

- 1 The term of the current committee commenced on June 2, 2022 and will end on May 26, 2025. All three seats of the committee are taken by the independent directors of the Company.
- 2 The Remuneration Committee holds committee meetings at least twice each year. Three committee meetings were held in 2023, with a 100% personal attendance rate of members. Please visit the Remuneration Committee section on the Company's website Remuneration Committee or refer to pp. 61~62 of the APC 2023 Annual Report or Market Observation Post System (MOPS) for more information regarding the committee operation.

- 3 The Committee periodically reviews the (1) salary and remuneration policy, system, standard, and structure, and (2) performance evaluation of directors and managers. The Remuneration Committee also determines and assesses the salary and remuneration of directors and managers with references to factors such as the median earnings in the industry, individual's duration of engagement, responsibilities, achievement of personal goals, salary and remuneration for equivalent positions, accomplishment of the Company's short-term and long-term business goals, and the Company's financial condition, then submit the results to the Board of Directors for approval. Remuneration of directors and senior managers, please refer to pp. 20~24 of the 2023 Annual Report.
- Salary and remuneration: The remuneration for directors covers remuneration, director profit sharing, and income for professional practice; and the compensation for managers includes the monthly salary, fixed-amount bonuses, year-end bonus, employee profit sharing, annual special bonus, and pension contribution and benefit payments by law. The profit sharing for directors and employees are subject to Article 18 of the articles of incorporation.
- The total compensation ratio and ratio of the percentage change in total compensation in 2023 were 4.31:1 and 64.17% respectively. GRI 2-21
- Performance evaluation: The performance evaluation of directors covers the alignment with the corporate goals and missions, awareness of the directorial responsibility, development and communication of internal relationships, expertise and continuing professional development, and internal controls; The performance evaluation of managers cover the finance aspect (operating revenue, operating profits, and net income before tax), customers aspect (customer satisfaction, service quality, and others), products aspect (branding, quality innovation, and others), talents aspect (talents development, potential development, and others), safety aspect (zero pollution, zero emissions, zero occupational hazards, zero accidents, zero breakdown, and others), and program aspect (digital transformation, energy saving and carbon reduction, circular economy, net zero emissions, and others). The weight of indicators related to sustainability should be at least 5%. The performance indicators in 2023 and sustainability-related aspects for the President, include 20% for safety (comprise the five-zero goals and process safety management), 10% for carbon reduction achievement rate, and 10% for talent development programs.
- 1. Total compensation ratio: The ratio of the total compensation for the organization's highest-paid individual to the median annual total compensation for all employees (excluding the highest-paid individual).
- Ratio of the percentage change in total compensation: The ratio of the percentage change in the total compensation for the organization's highest-paid individual to the median percentage increase in the total compensation for all employees (excluding the highest-paid individual).

### ESG Committee GRI 2-13, 2-14

The term of the current committee commenced on June 2, 2022 and will end on May 26, 2025. The Committee members include the Chairman, President, Independent Director Tun-Chien Cheng and Chien-Ping Chen. The committee consists of a total of four members.

The three working groups of the Committee include corporate governance, environmental protection, and social relations.

The ESG Committee holds meetings at least twice each year. Two committee meetings were held in 2023, with a 100% personal attendance rate of members. The meeting results were reported to the Board of Directors.

Please refer to pp. 86~88 of the APC 2023 Annual Report or the ESG Committee section of the Company's website for more information regarding committee operation.

The organizational structure, composition, and responsibilities of the ESG Committee are illustrated below:



# **Committee Responsibility**

### **Committee Responsibility**

- Discussion and establishment of the ESG policy
- O Discussion and establishment of ESG strategy planning, annual plans, and project plans
- Supervision of the implementation of ESG strategy planning, annual plans and project plans, and assessment of their performance
- Review of the ESG report
- Report the annual sustainable development performance results to the Board of Directors yearly
- Other assignments instructed by the Board

# **Project Secretary and Working Team Responsibilities**

### Project Secretary

- Plan ESG policies and set ESG targets
- Follow up on the progress of action plans and improvement performance

#### **Corporate Governance Team**

- Data collection on economic topics such as corporate governance, supply chain management
- Propose topics concerning sustainable development for discussion and review by the ESG Committee
- Compile corporate governance and economic data for the ESG report

#### **Environmental Protection Team**

- Integrate data related topics such as environmental protection, energy saving and carbon emissions, and green products
- Propose topics concerning environmental protection for the discussion and review by the ESG Committee
- Compile data relating to environmental protection in the ESG report

#### **Social Relations Team**

- Collect and integrate topics that concern the employees, community residents, and general social groups
- Propose topics concerning labor-management relations and society for the discussion and review by the ESG Committee
- Compile data relating to labor-management relations, employee welfare, charitable activities, and community engagement in the ESG report

### ESG Committee Annual Tasks and Next-Year Annual Plan GRI 2-16

### Highlights of Sustainable Development Performance Reported to the Board of Directors in 2023

- ▼ The greenhouse gas inventory and assurance progress have been completed for individual companies (Lin Yuan Plant, Taipei Headquarters).
- ✓ Greenhouse gas emissions have decreased by 7.7% compared to the baseline year (2017), achieving a yearly rate of 102%.
- Results of the Energy saving and carbon reduction Program: Electricity saved: 516,000 kWh, Steam saved: 2,736 MT, Carbon reduced: 840 MT of CO₂e. Results of water conservation: Water usage per unit product is 3.70 M³/MT, a 2.9% decrease compared to the previous year.
- Implement the goals of Zero Accident" in OHS, the total cummulative of zero lost-time due to disabling injury have reached 5.81 million working hours, and the record is continuously being maintained.
- O Donated NT\$5 milion to the USI Education Foundation to support in caring for the disadvantaged, rural education, community development, and promote domestic cultural development.
- Sustainability Activities and Awards:
  - 1. Participated in the 16th Taiwan Corporate Sustainability Awards (TCSA) Won the "Platinum Award" of Corporate Sustainability Report Awards in traditional manufacturing industries; honored with the "Taiwan Top 100 Sustainable Enterprises Award" for comprehensive performance.
  - 2. Ranked the top 6~20% among all listed companies at the 10th Corporate Governance Evaluation.
  - 3. Awarded AA rating in ESG evaluation by Cathay Securities.
  - 4. Received the "Top 10% of Occupational Health and Safety Indicators in Corporate Sustainability Reports" proactive evaluation from the Occupational Safety and Health Administration.
  - 5. Organized an afforestation event on May 20th, collaborated with the Experimental Forest of the College of Bio-Resources and Agriculture at National Taiwan University on afforestation projects, participated in the ESG Sustainable Market, and sold agricultural products.

### 2024 ESG Work Plan

- 1. Complete GHG inventories for the subsidiaries in the consolidated statements
- 2. In accordance with the group's carbon reduction goals, plan the carbon reduction roadmap and review it annually.
- 3. Promote energy-saving and carbon reduction program; implement water resources management.
- 4. Implement the goals of "Zero Accident" in OHS
- 5. Implement Social Engagement
- 6. Participate in Sustainable Development related activities and various sustainability assessments

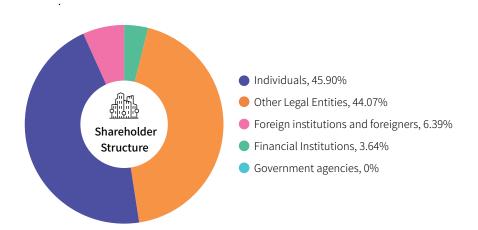


#### Shareholder rights and Information transparency

The stock transfer for the 2024 Shareholders' Annual General Meeting will be closed by April 1, 2024., the main shareholder structure of APC is dominated by individual and other legal entities. For the names of shareholders holding over 5% shares or the top ten shareholders, please refer to pp.121 of the APC 2023 Annual Report.

APC is committed to providing shareholders with transparent and real-time corporate information. Every year, we organize investor conferences and shareholders meetings regularly, publish annual reports and ESG reports, and list operating performance, financial statements, and significant news on the "Market Observation Post System" of Taiwan Stock Exchange. We also set up the "Investor Services" webpage in both Chinese and English, where disclose the Company's governance status, business announcements, financial statements, investor conferences, and updates on group dynamics. Moreover, we continuously collect shareholder opinions to provide feedback to the management team for decision-making reference.

We value the rights and interests of foreign investors and the trend of enterprise internationalization. Therefore, since 2018, we began to enhance information disclosures in English in the annual report and on the MOPS and the Company website. By actively establishing various unfettered two-way communication channels with shareholders, we maintain the rights and interests of shareholders in real action.



## **IP Rights Management**

APC established the Intellectual Property Rights Management Plan on 12 August 2020 to oversee the trade secrets relating to production operations and intellectual property from the outcomes and copyrights of R&D process to enhance the Company's competitive advantage. The performance in IP rights management is reported to the Board of Directors at least once a year. The "IP Management Practices and Implementation Status" was reported to the 4th Board of Directors meeting on November 3, 2023 to implement the company's Intellectual Property Rights management policy.

#### Patent management

#### 1 Innovation patent and invention application platform

We have established an "Innovation Patents and Inventions Application Platform" to keep a full record of and store the innovative ideas and experiment outcomes during R&D process. R&D outcomes are submitted to the relevant officers for review before forwarding to the chief R&D officer to determine the need for patent application.

Performance in 2023: 0 patent application.

## Trademark Management

In case of disputes regarding the rights of the Company's existing registered trademarks, it signifies that either the Company's trademark rights have been unlawfully infringed upon or have faced objections, assessments, or annulments raised by others. As this could significantly impact the Company's sales and eventually its revenues, it is necessary not only to reassess the adequacy of the current trademark application management but also to devise corresponding countermeasures for trademark maintenance and disputes as they arise.

Current acquired trademarks: 2 in Taiwan and 4 in Mainland China.

There was no trademark dispute at APC in 2023.



# **2.2** Economic Performance

## Material topics: Economic performance corresponding with sustainability principle: Innovative Technology GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach
Significance to APC	Positive/Negative Impacts	2022 Performance	Effectiveness Assessment
Steady growth in financial performance is the foundation of corporate sustainable development. The Company's business performance affects the expectation of investors, employee wlfare.	Positive actual impact - Steady growth in Financial performance	<ul> <li>Earnings per share after tax NT\$2.43</li> <li>Return on Equity (ROE) 9.75%</li> <li>Annual total sales 130,414 MT</li> </ul>	<ul> <li>Company Financial Statements and Annual Report</li> <li>ESG Reports</li> <li>Corporate Governance Evaluation</li> </ul>
Management Practice and Objectives	Processes to remediate and prevent negative impacts	2023 Performance	Grievance Mechanism
Enhance product competitiveness and business performance through continual product R&D and innovation and market expansion to maintain continual corporate growth and sustainable development.	_	<ul> <li>Earnings per share after tax NT0.2</li> <li>Return on Equity (ROE) 0.84%</li> <li>Annual total sales 130,335 MT</li> <li>Gulei Integrated Refinery Project has been completed and fully operational in May 2023</li> </ul>	<ul><li> "Investor Service" mailbox on the corporate website</li><li> Investor conferences</li><li> Shareholders' Meeting</li></ul>
Strategy		Short-Term (< 3 years) Goals	Adjust the management approach
<ul> <li>Product R&amp;D and innovation</li> <li>Strengthen market expansion</li> <li>Increase brand awareness or brand value</li> </ul>		The Ethylene Underground Pipelines construction of the second phase of Kaohsiung Intercontinental port area is ongoing, with a projected completion in the fourth quarter of 2024.	<ul> <li>Review through related meetings including executive meetings, production meetings, and development quality meetings to adjust the direction of market development in a timely manner.</li> </ul>
		Medium- Long-Term ( ≧ 3 years) Goals Planning	
		Integrate the products and production lines of USI, APC, and Gulei to enhance market influence.	



#### Financial Performance GRI 201-1

The consolidated operational performance this year, in terms of business, due to the initial low prices in the EVA market at the beginning of the year and increased demand during the traditional peak season, downstream plants actively stocked up, leading to enhanced market confidence and a rise in EVA prices. At the end of the first quarter, due to the off-season demand in Mainland China's traditional foam, cable, and coating industries' order follow-ups were sluggish. The prices in the photovoltaic industry chain fell, prompting EVA photovoltaic film manufacturers to adopt a bearish stance and show little enthusiasm in purchasing, resulting in a drop in prices. In addition, the added capacity of the Gulei EVA Project began mass production in the middle of the year, exacerbating the market downturn. In H2, although there was a brief rise in EVA prices due to the improvement in demand for photovoltaics and cables. However, due to an increase in inventory of photovoltaic manufacturers and weaker demand for modules combined with other applications that did not show an improvement, the price softened until the end of the year. The annual LDPE / EVA sales reduced by 1% over the last year, and the average selling price dropped 31%. In terms of production, the prices of ethylene and VAM raw materials dropped with the weakening of petrochemical derivatives. The total production of LDPE/EVA for the year was approximately 132,000 MT, an increase of 2% from the previous year. Besides, we continued to improve the process for the development of hot melt adhesive products and gradually promoted them to the application market. In addition, we replaced old equipment to enhance production efficiency and optimized some system sensing for future energy consumption and production process parameter monitoring and simulation analysis. Summarizing the operating results for the year, the decrease in sales price of products has not been able to maintain the same pace as the surging materials costs, resulting in a narrowed margin.

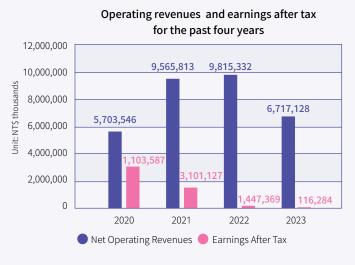
#### Consolidated Financial Information in the Past 4 Years

Unit: thousand dollars

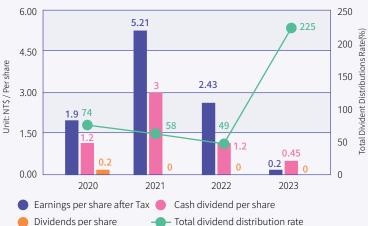
Item	Basic Element	2020	2021	2022	2023
Direct economic value	Income (including net sales, financial investment income, and asset sales income)	5,878,383	9,838,486	10,191,795	6,915,808
	Operating costs	4,411,844	5,834,461	6,468,607	5,418,126
	Employee wages and benefits	361,699	401,024	389,657	365,135
Distributed economic value	Payment to investors	857,480	1,803,975	722,804	276,297
	Payment to the government (including income tax, fines, land value tax, and property tax)	196,503	668,221	656,892	229,908
	Investments in community	4,875	6,873	7,898	8,247
Economic value retained		45,982	1,123,932	1,945,937	618,095

#### **Distribution of profit**

In 2023, the operating revenues were NT\$6,717,128 thousand, income tax (excluding estimates) was NT\$661,081 thousand, accounting for 9.84% of the operating revenues, and the distributable earnings were NT\$3.76 billion. The cash dividend was approved as NT\$0.45 per share. The charts below show the operating revenues and dividend distribution of Asia Polymer Corporation over the past four years:



#### Dividend distributions for the past four years







over the years

## **Major investments**



#### **Investment Purpose**

Many changes have emerged in the global petrochemical industry in recent years, included the rise of the petrochemical industry in emerging regions and shale oil mining in North America, which have brought not only huge impacts to the energy structure and petrochemical material supply but also significant changes to development of the petrochemical industry across the Taiwan Strait.

To get prepared for future trends and challenges, petrochemical companies of Taiwan and Mainland China co-established the Gulei Integrated Refinery Project to achieve the vertical integration of the midand down-stream products.

#### Investment Item

The project engages in the production and sales of the following petrochemical products.

- Ethylene, Propylene, Butadiene
- Ethylene Vinyl Acetate Copolymer (EVA)
- Ethylene Oxide (EO)
- Ethylene Glycol (EG)

#### **Investment Amount and Benefits**

- After the approval of the relevant competent authorities, re-investment in the Gulei Port Economic Development Zone Project in Zhangzhou, Fujian Province, mainland China, was made through a third region with a maximum amount of NT\$6 billion.
- In the future, the project will stabilize upstream material supplies, vertically integrate steam cracking, petrochemical intermediate materials, and plastic products, reduce transportation costs, and enhance competitive niche to facilitate deployment in the Greater China market and sales competition in the international market.

#### **Progress of Investment Items**

- · The steam cracker is the core processing unit, and hot commissioning was completed smoothly in August 2021
- · The first shipment of ethylene monomers from Gulei Petrochemical was already sold to Taiwan in November 2021
- · Fujian Gulei Petrochemical Co., Ltd. started commercial operations in December 2021
- · The intermediate delivery of EVA plant was completed in October 2022\*
- · Gulei Integrated Refinery Project has been completed and fully operational in May 2023

Note: Intermediate delivery refers to the delivery of a construction project in the middle of the construction period. It suggests that the contractor has completed the construction of all processing routes, including running the pressure and utilities test, while the remaining projects will not affect the trial run.

#### **Project Milestones**

Oct 2022	Intermediate delivery of EVA plant
Dec 2021	Fujian Gulei Petrochemical Co., Ltd. started
	commercial operations

May 2023 Smooth hot commissioning of EVA plant

Aug 2021 Smooth hot commissioning of steam crackers, SM, EO/EG

Mar 2021 PP hot commissioning succeeded

Intermediate delivery of the PP processing Sep 2020 units

Jun 2019 Project construction started

May 2019 Approval of the land for project planning by the Gulei Committee

Aug 2018 Official approval was granted to the Gulei Integrated Refinery Project in Zhangzhou, Fujian

Nov 2016 Established Fujian Gulei Petrochemical Co., Ltd.



# 2 Investment Plan for Storage and Transportation of Kaohsiung Intercontinental Container Terminal Phase II

In response to the Petrochemical Product Storage and Transportation Center Policy of the Kaohsiung Intercontinental Container Terminal Project launched by the Port of Kaohsiung, Taiwan International Ports Corporation, Ltd., China General Terminal & Distribution Corporation, the ethylene transportation side of Linyuan Plant, will be relocated from the old port area to the Petrochemical Product Storage and Transportation Center of the Kaohsiung Intercontinental Container Terminal Project Phase II. To ensure the steady production and transportation of ethylene, APC invested NT\$1.02 billion to build the outgoing pipelines for the ethylene cold storage at the Petrochemical Product Storage and Transportation Center of the Kaohsiung Intercontinental Container Terminal Project Phase II, hoping to continuously provide existing customers with steady ethylene supply after project completion.



Panorama of China General Terminal & Distribution Plant at Intercontinental Container Terminal Phase II

#### Financial assistance received from government GRI 201-4

On 4 January 2021 the Ministry of Economic Affairs approved APC application for the "Action Plan for Accelerated Investment by Domestic Corporations" program to the with the Kaohsiung Intercontinental Container Terminal Project Phase II, enabling us to apply for bank project financing of up to 80% of the amount of project investment. Additionally, we will also receive a subsidy at 0.5% of the financing service change from the National Development Fund, as if a kind of preferential interest reduction.

With the Kaohsiung Intercontinental Container Terminal Project Phase II investment project, APC was granted a project financing credit of NT\$1.419 billion. Apart from NT\$549 million has been drawn from the credit by the end of 2023, we also received a subsidy of approximately NT\$2.69 million from the Government's National Development Fund by 2023.



China General Terminal & Distribution Plant at Intercontinental Container Terminal Project Phase II: Ethylene Storage Plant



# 2.3 Risk Management

To strengthen the Company's corporate governance, reduce potential operational risks, and ensure the steady operations and sustainable development, the Audit Committee and the Board of Directors passed the establishment of the "Regulations for Risk Management Policy and Procedure" in December 2020. These Regulations cover the policy, structure, process, category, and mechanism for risk management implemented by the Board, Audit Committee, various risk management units, and the Auditing Division to effectively control risks in business activities so as to improve the effectiveness of risk management and protect the interest of the Company, employees, shareholders, and stakeholders.

#### Risk Management Process GRI 3-3

Based on the characteristics of the company's business and various aspects of the internal and external environment, we establish appropriate measurement methods to identify risks as the basis for risk management, and each risk management unit continues to monitor the risks of its business and propose countermeasures to report to senior management to ensure that the management structure and risk controls functions operate normally.



#### **Risk Management Category**

Based on the characteristics of APC's business and operations, include the following risk categories into management:

Risk Category	Risk Description	Risk Category	Risk Description
Financial Risk	<ul> <li>Interest rate risk</li> <li>Exchange rate risk</li> <li>Property loss risk</li> <li>Endorsement guarantee risk</li> <li>Accounts receivable risk</li> </ul>	Strategy and Operational Risk	<ul> <li>Industry risk</li> <li>Investment risk</li> <li>Operational interruption risk</li> <li>Materials and finished products inventory risk</li> </ul>
Climate Change and Environmental Risk	<ul> <li>Risks and opportunities assessment due to climate change</li> <li>Legal compliance</li> <li>Grasp the information on environmental protection laws and regulations</li> </ul>	Information Security Risk	<ul> <li>Information maintenance system</li> <li>Educational training and publicity of information security</li> <li>Security protection of customer transactions</li> </ul>
Legal Risk	Legal compliance risk     Transaction risk     Litigation settlement     Legal compliance awareness and behavior	Disaster and accident risk	<ul> <li>Accident response management</li> <li>Operational, property and personnel loss risks</li> <li>Employee operational safety risk</li> <li>Operational interruption risk</li> </ul>
Materials Prices and Supply Chain Risk	<ul> <li>Grasp the information on materials prices change</li> <li>Materials inventory and logistics management</li> <li>Production equipment and spare part plan</li> </ul>	Human Resources Risk	Legal compliance risk     Human resources shortage risk     Workforce stability risk
Occupational Safety and Health	Legal compliance audit     Contractor occupational safety management     Occupational safety educational training and publicity     Occupational hazards and safety working hours     Conduct annual group environment safety and health audit plan	Research and Development Risk	Product competitive risk Research and development information control risk Outdated technology and product development delay Intellectual property rights and patent rights risk
Technology Risk	Cyber security risk caused by new technology use     Changes in market consumption habits and outdated production technology	Other Risks	· Severe novel pathogens disease (COVID-19)

#### Operational Risk Management GRI 2-24

After analyzing the risk within its unit, each risk management unit proposes counteractions and reports the risk status to senior management based on the performance of counteractions. The president or the person designates should report the status of operational risk management to the Audit Committee and the Board of Directors at least once a year.

On November 3, 2023, the head of the Sales & Marketing Division reported the status of 2023 Operational Risk Management to the Board of Directors. Please refer to the ESG section 2023 Operational Risk Management Report on the official website for the report.

#### Information Security Policy GRI 2-23

**ISO 27001 information security management system:** The Company established the ISO 27001:2013 information security management system in 2014 and hired BSI Taiwan, an external third-party certification body, to review and audit the system. So far, the system has passed the certification by BSI Taiwan for 9 consecutive years. The current certification is valid from July 4, 2023, to October 31, 2025.

**NIST Cybersecurity Framework (CSF):** The Company included the Cybersecurity Framework (CSF) developed by the US National Institute of Standards and Technology (NIST).

By integrating ISO 27001 information security management system and NIST CSF, we enhance risk control, improve information security resilience, and equip the Company with the capabilities to tolerate, stop, and quickly recover from information security incidents to maintain business continuity of the supply chain.

## Internal control and audit systems GRI 2-23

The Audit Division of Asia Polymer Corporation is an independent unit under the direct control of the Board of Directors. It recruits professionals who have obtained the Certified Internal Auditor certificate to join the audit team and carries out its duties with an impartial and independent spirit. Each year the Auditing Division conducts internal audits according to the audit program approved by the Board of Directors, reports the audit findings and matters required for improvement and follow-up to the Auditing Committee and the Board. In 2023 the Auditing Division submitted 48 audit reports and 5 improvement follow-up reports, with a 100% improvement follow-up rate. The improvement results are highlighted below:

Audit Item	Item Recommendation	
Sales Cycle	Recommendation for adding a verification function to the discounted ERP application program.	
Industrial safety cycle	Recommendation for enhance the supervision in management of contractor entry the plant and confirm whether the related safety equipment in the plant can be used.	All corrections have been made as recommended.
Production Cycle	Recommendation for comparing whether the actual settings of production equipment alarms on- site are consistent with the standard books. Timely adjustments should be made when necessary.	recommended.

## Legal compliance GRI 2-27

In addition to ethical corporate management, APC also emphasize legal compliance in all areas. In routine operations, we continually monitor and collect information about the establishment of and amendment to laws and regulations in areas such as corporate governance, labor human rights, environmental protection, and occupational health and safetyfrom government agencies at all times. Also identify the conformity of these laws and regulations to our operations, revise relevant documents, and carry out risk management or enforce regulations.

#### SASB RT-CH-530a.1



## Ethical Corporate Management GRI 2-26

To establish a corporate culture for ethical corporate management, we have established the "Ethical Corporate Management Best Practice Principles", "Procedures for Ethical Management and Guidelines for Conduct", "Code of Ethics Conduct for Directors and Managerial Officers".

Applicability: Directors, managers, employees, or those who have substantial control over the company

#### Standardized behavior

No direct or indirect offers, commitments, requests or acceptance of any improper benefits, or any other acts of dishonesty that violate honesty, illegality, or breach of fiduciary duty, should be made in order to gain or maintain interest.

Forms of standardized benefits, including money, endowments, commissions, gold, positions, services, preferential treatment, or kickbacks, etc. in any form or name.

To ensure all employees understand legal compliance topics, we have set up the "Ethical Corporate Management" section on the internal website to publicize ethical behavior, and continuously organize related educational training sessions and hold departmental routine meetings to publicize the latest regulatory information and trends, enabling employees to acquire information regarding new laws and regulations and amendments of existing laws and regulations, while the Legal Division also provides legal consultation and advice. Additionally, apart from arranging internal training or irregular external training courses, we also invite external legal experts to hold lectures to enrich employees' knowledge and competencies in businessrelated policies and regulations. Also, we offer related courses in the educational training for new employees and request them to sign the integrity relevant statements.

To enforce ethical corporate management and ethical behavior, we continuously publicize and related training courses are held. In 2023, APC organized a total of 263 hours of education and training relating to ethical corporate management (including the Fair Trade Act, prevention of workplace violence, online copyrights and use of legal software, and the Trade Secrets Act, etc.) for a total of 131 participants.

## List of Relevant Regulatory Training Courses for APC in 2023

Item	Course Name Ho		Person	Total hours
1	[Ethics Lecture] Stop, Look, and Listen to Cybersecurity Traps	2	64	128
2	[Ethics Lecture] Legal Awareness and Response Required in the Intelligent Era	2	42	84
3	[Ethics Lecture] Legal Advocacy - Insider Trading and Gender Equality	2	18	36
4	[Ethics Lecture] Discussion on Preventing Workplace Unlawful Infringement	2	6	12
5	[Ethics Lecture] Legal Responsibility and Case Analysis of Breach of Trust	3	1	3
	Total		131	263

**APC 2023 Governance Aspect** APC 2023 Social Aspect APC 2023 Environmental Aspects No violations of relevant laws and regulations. No violations of relevant laws and regulations.

Linyuan Plant was fined NT\$150,000 by the Environmental Protection Bureau, Kaohsiung City for violated the "Air Pollution Control Act".



The relevant reasons for offense and improvement are described as follows: GRI 2-27

Item	Competent Authority	Reason for Disposal (Violation of Laws)	Disposal Date	Amount of Fine (\$10K)	Improvement Descriptions
1	Environmental Protection Bureau of Kaohsiung City	On August 31, 2023, the Environmental Protection Department conducted an inspection on the leakage concentration of volatile organic compounds in equipment components under the Manufacturing Process of Low- Density Polyethylene (M03). The results showed that the net detection value of leakages across four equipment components exceeded 2,000 ppm, as stipulated by the "Kaohsiung City Equipment Component Volatile Organic Compounds Control and Emission Standard". (Violation of Article 20, Paragraph 1 of the Air Pollution Control Act).	December 1, 2023	15	1. Strengthen the management of on-site personnel equipment component inspection work.  2. The environmental protection section conducts monthly spot checks on equipment/ components to increase the frequency of inspections.  3. The equipment components continue to undergo replacement.

## Reporting channels GRI 2-25, 2-26

On 9 November 2017 the Audit Committee and the Board of Directors passed the proposal to establish "Regulations for Handling Reports of Illegal and Unethical or Dishonest Behaviors" specifying the reporting and processing procedures and related protection mechanisms. Whistleblowers can report an illegal and unethical or dishonest behavior personally or through the report email or report hotline. All reports will be handled by the responsible units.

"Audit Committee Email" in the "Investor Service" section on the APC website. **Report Email** Report Hotline Report Hotline: (02)2650-3783

After consolidation the Audit Division reports the acceptance, processing, and improvement of each report to the Auditing Committee. There was no report of noncompliance from Audit Division in 2023.



# СНЗ

# **Product Innovation and Supply Chain Management**

46 Technology R&D GRI 3-3, 201-1

**50** Customer Service GRI 2-6

**53** Supply Chain Management GRI 2-6, 2-23, 2-24, 3-3, 308-1, 308-2, 414-1, 414-2

## **Performance Highlights**

New product development: 1, Quality improvement: 1 The ratio of R&D funds in total revenues 0.71%

Overall Customer Satisfaction 98%

Supplier CSR commitment signing achievement rate 100%

## **Material Topics**

Technology R&D, Supply Chain Management

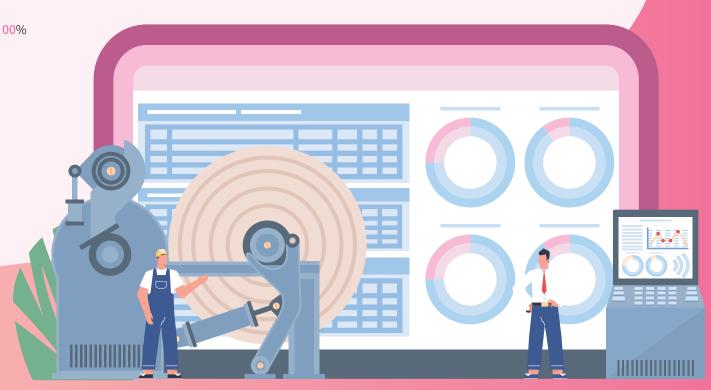
## **SDGs Correspondence**



## **Certified management system**



ISO 9001 Quality Management Systems Validity Period: 2022.05.03~2025.05.03





# 3.1 Technology R&D

## Material topics: Technology R&D corresponding with sustainability development principle: Innovative Technology

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach	
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment	
Successful sustainable materials development and corporate transformation are crucial to corporate competitiveness. Therefore,	corporate transformation are crucial industry burdens through manufacturing product quality improvement per year		<ul> <li>Control product development progress with the "Product Research and Trial SOP"</li> <li>Review R&amp;D direction through the quality</li> </ul>	
continuous improvement of product quality and	Positive potential impact - Successful	2023 Performance	meeting	
the development of new products are not only key to maintaining corporate profitability but also the foundation of corporate sustainable	sustainable materials development Positive actual impact - New product development and diversification	<ul> <li>New product development: 1, Quality improvement: (♥)</li> </ul>	<ul> <li>Exchange Technology R&amp;D through the executive meeting</li> </ul>	
development.	development and diversification	Analysis Reason:	Grievance Mechanism	
		The research and test for hot melt adhesive V19400 requires the addition key equipment, chiller, to proceed effectively. This is a cross-	Customer Management Process     Customer Dispute Management Procedures	
Management Practice and Objectives	Processes to remediate and prevent negative impacts	year program and currently in progress.		
Fulfill customer demands by collect information	-	2023 Progress Descriptions: 1. Completed V19400 Trial Production		
regarding market development trends, set directions for product quality improvement	_	Plan in September 2023. 2. Completed installation of the chiller	Adjust the management approach	
and new product development, and enhance product quality and market competitiveness.		project in December 2023.	· The Business Division collects market	
product quality and market competitiveness.		Short-Term (< 3 years) Goals	information and capture the market trends of products through technical customer service.	
Strategy		· At least one new product development or		
<ul><li>Niche product development</li><li>High-value products</li></ul>		product quality improvement per year  · The major new product research and trial quality achievement rate ≧ 80%		
Target		Medium- Long-Term ( ≧ 3 years) Goals Planning		
New product development or product quality improvement, at least 1 item per year		Development of market-leading products, at least 2.		

#### **R&D Process**

Information Collection

- The Business Division collects market information and customer feedback, proposing product development or improvement needs.
- Linyuan Plant proposes product improvement based on demand



#### **R&D Outcomes**

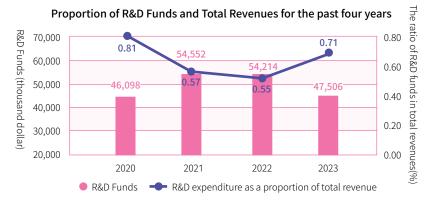
R&D Outcomes		Primary reasons for R&D
2021	High-speed Laminating Grade EVA Product (Grade V18251) Quality Improvement and Technology Enhancement	<ul> <li>The production technical threshold of low-gel grade EVA is high</li> <li>Application of high-speed laminating processing to meet market demands</li> </ul>
2022	Hot Melt Adhesive Grade EVA Product Completed trial production of (grade V08085/ V19150), The quality meets the specification	<ul> <li>The production technical threshold of hot melt adhesive grade EVA is high</li> <li>In response to the commencement of the Gulei Petrochemical, there is diversification in the products</li> </ul>
2023	Hot Melt Adhesive Grade EVA Product. The trial production planning (grade V19400) has been completed, and the additional construction of the chiller is expected to conclude by December 2023	<ul> <li>The production technical threshold of hot melt adhesive grade EVA is high</li> <li>In response to the commencement of the Gulei Petrochemical, there is diversification in the products</li> </ul>

In response to the product high-value strategy and changes in market demand, APC has not only expanded its EVA production capacity, but also moved towards high-end applications and high VA content. Mass product development, in addition to high-speed lamination grade EVA products, which are APC's main products, hot melt adhesive grade EVA products have a wide range of uses with the expansion of production capacity in the future, the flexibility of product portfolio can be improved, which has become the focus of product development in recent years. GRI 201-1

#### Resource

#### **R&D Funds**

The amount of R&D funds in 2023 was NT\$47,506 thousand, accounting for 0.71% of the revenue. In addition to the R&D funds, USIG has also established a common R&D department to provide both R&D funds and human resources, to help accomplish the R&D targets with the group's power.



#### **R&D Workforces**

There were 32 R&D personnel in 2023. accounting for 13.7% of all employees. Most outstanding talents R&D personnel are holding a bachelor's or master's degree. The distribution of education attainments of R&D personnel in the past three years is as follows:

#### Education Attainment Distribution of R&D Personnel for the past three years



## **Green products**

#### Non-toxic Products GRI 403-7 SASB RT-CH-410b.2

We consider the related laws and regulatory requirements such as FDA, CNS, JIS, and EU Restrictions on Hazardous Substances (RoHS) Directive right from the feasibility assessment of product development to ensure compliance with the standards, regulations, and laws governing human health and environmental impact.

We received the SONY Green Partner certification (Green Partner Environmental Quality Approval System) in 2009, establishing our corporate image of toxic substance free and clean production. In order to meet the legal and regulatory requirements for environmental protection and quality, we request suppliers to provide raw materials that comply with the relevant environmental quality requirements to ensure no use of limited or restricted substances at the procurement stage.

Apart from engaging in energy conservation and clean production in the product manufacturing process, the Company also develop EVA products suitable for the shielding layer of electric wires and cables for producing low-smoke, halogen-free wire and cable jackets to comply with the environmental protection requirements.

APC products have passed various regulatory requirements as certified by third-party notary units, as detailed in the table below:

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Item	Standards and Norms	Inspect Product Model
1	USA FDA Standards (Title21, Pt 177.1520)	LDPE
2	Halogen-free	LDPE
3	Plasticizer Test	M5100
4	EU Standards (EU 10/2011)	C7100
5	EN 71 Part 3: 2013 (19 items of migratable heavy metals)	LDPE/EVA
6	Restriction of Hazardous Substances (RoHS) Directive Standards	LDPE/EVA
7	New balance specifications	C7100, EV101, EV102, EV303
8	USA FDA Standards (Title21, Pt 177.1350)	EVA
9	Adidas specifications	EVA
10	Article 4 of the Sanitary Standards for Food Utensil, Container and Packaging in Taiwan	C7100
11	Standards for Plastic Food Contact Plastic Materials in Mainland China	C7100, C4300, F2201
12	Crocs RSL specifications	EVA
13	Nike RSL Specifications	C7100
14	Asics specifications	EV101



## **Product Innovation**

## New product R&D progress

Ye	ar R&D Project	Progress	Invest in research funds (in thousand dollars)	Estimated Time of Mass Production Duration	Descriptions of R&D Outcomes
20	Trial productions of the hot melt adhesive grade EVA	<ol> <li>Completed V19400 Trial Production Plan in October 2023.</li> <li>The key equipment, chiller, is set to be installed in December 2023.</li> </ol>	26,800	2024	<ol> <li>Completed the feasibility assessment for the trial production plan of V19400.</li> <li>The addition project of the chiller for key equipment was completed.</li> <li>Development of this product requires the addition of key equipment, chiller (RF-1302), to proceed effectively. This is a cross-year program and currently in progress, with trial production anticipated to commence in March 2024.</li> </ol>

## 2 New Product R&D Plan

Year	R&D Project	Progress	Invest in research funds (in thousand dollars)	Estimated Time of Mass Production Duration	Descriptions of R&D Outcomes
2024	Trial (mass) production of the hot melt adhesive grade EVA	<ol> <li>V19400/V19150 quality meets the requirements for customers.</li> <li>V19400/V19150 trial (mass) production, with completion by the end of December.</li> <li>V19400 is scheduled for trial production in March 2024.</li> <li>Install cutting axis water.</li> </ol>	200	2024	Develop higher specification hot melt adhesive products to meet market demand, and the process can be flexibly adjusted according to market changes, which is expected to increase the company's revenue.

## Product Quality Improvement

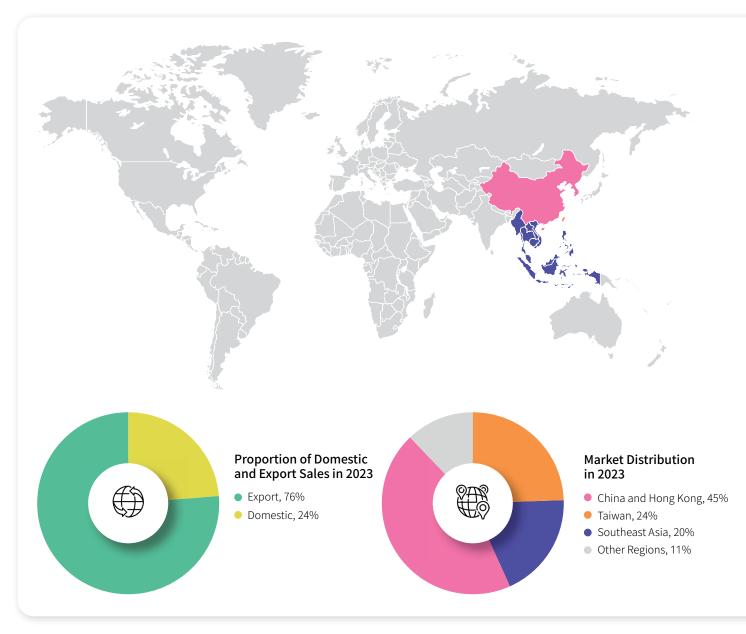
Yo	ear	R&D Project	Progress	Invest in research funds (in thousand dollars)	Time of Improvement Completion	Descriptions of R&D Outcomes
20	023	L2&L3-V18161	Establishing EC policy	-	June 2023	Resolve customer disputes to prevent recurrence

## 3.2 Customer Service

The Technology department of APC Linyuan Plant assists the Business Division by supporting customer services, product improvement, new product and new market development. It also supports the development of custom products and product characteristic improvement. In recent years, the sound collaboration of both departments has earned customer recognition.

#### Product sales and markets GRI 2-6

The Company product markets: LDPE is primarily for domestic sales, while EVA is for export. In addition to Taiwan, we also distribute products worldwide to Mainland China, Hong Kong, Japan, Thailand, Vietnam, Malaysia, Singapore, the USA, Indonesia, Cambodia, India, Bangladesh, Pakistan, Sri Lanka, the UAE, Israel, Egypt, South Africa, and Russia, etc. Our customers include processing plants and traders of packaging films, food packaging materials, microfibers, plastic injection molding, foaming shoe materials, sports goods, PV packaging films, precoating/lamination films. The proportion of domestic and export sales and market distribution in 2023 are shown below by sales volume.



## **Customer privacy**

In terms of customer privacy confidentiality, the Group Credit Department establishes the Customer Personal Data Control Regulations in response to the Personal Data Protection Act to ensure customer data is controlled in compliance with the Personal Data Protection Act. The control process is as follows:

- 1 Cancel the access, including the system and file access privilege, to customer personal data over the Enterprise Resource Planning (ERP) system, except for the Group Credit Department personnel.
- 2 Obtain the "Personal Data Collection, Processing, and Use Notification and Agreement" in advance before collecting documents containing customer personal data.
- After receiving customer personal data, the Group Credit Department should input paper data in the ERP system. Personnel should store paper documents in media files and cover text or data containing customer personal data before archiving. Except as otherwise required, destroy paper documents afterwards.

There was no customer privacy right infringement or loss of customer personal data in 2023.

### **Customer Complaints Procedure**

To optimize the customer complaints procedure, APC has established the Customer Dispute Management Platform to digitize the customer complaint process, control and analyze the causes of customer complaints, and follow up the progress of responsible units and corrective and preventive actions so as to implement quality improvement activities and improve the quality of customer service.



## **Customer satisfaction survey**

In order to understand the opinions of customers about the products and services provided by APC, besides contacting or visiting customers personally through sales representatives, an annual customer satisfaction survey is conducted through questionnaires. This ensures that customer needs are fully understood and properly addressed. Following this, improvement plans are made in light of customer feedback and presented at the "management review meeting", where the results are tracked to continually enhance the quality of products and services. Respondents of the customer satisfaction survey are selected yearly from the top 25 customers by purchasing quantity of domestic sales and export sales respectively. If the collected responses are insufficient, we will select respondents of lower ranks. The survey is conducted on the four aspects among 50 customers to assess the product quality, service quality, transportation quality, and overall satisfaction of APC products. The satisfaction score is calculated based on the proportion of [highly satisfied] and [satisfied] responses. In 2023, a total of 50 valid customer satisfaction survey responses were collected, and the overall satisfaction was 98%, which is the same as 2022. APC appreciate the vast majority of customers for their recognition of our product and service quality. APC will make continual improvement to repay the long-time support of customers. Customer satisfaction in the past three years is shown below:

#### Customer Satisfaction Survey results of APC in past three years



Suggestions gathered from customer satisfaction survey have been transferred to the relevant units for assistance, such as "assistance in solving Customers' processing problems by the technical service unit", "selection of shipping companies with better punctuality and more reasonable transportation cost by the customs department to meet the shipment expectation of customers", "provision of standby plastic pallets", and so on.

#### List of Customer Feedback Analysis and Review for 2023

Itém	Customer Feedback	Analysis and Review S	Satisfaction Type
2	Advance notice is required for any delays in the shipping schedule.	Customs and sales representatives will monitor the shipping schedule closely, and in case of any delays, customers will inform promptly.	Service quality
3	The quality of the goods delivered by the Company is good, but the delivery duration is longer than other suppliers.	Given that shipping schedules are based on the route planning of the shipping company that is beyond the Company's control. Our sales representatives will communicate with customers accordingly.	Transportation Quality
4	<ol> <li>Please increase the number of sailings to ensure stable shipping schedules.</li> <li>The Bunker Adjustment Factor (BAF) for ocean freight shall be borne by the shipper.</li> </ol>	<ol> <li>The sales representatives will maintain constant communication with the shipping company to ensure punctual sailings and meet customer demands.</li> <li>The sales representatives have informed the customers that the BAF costs will be jointly borne by the shipping company and the Company.</li> </ol>	Transportation Quality
5	Look forward to stable production line and successful delivery.	The message has been conveyed to the Linyuan Plant, where attention will be given to maintain production stability to ensure consistent product shipments.	Other Suggestions
	In the event of unforeseeable circumstances such as typhoons causing delays in the shipping schedule, please kindly notify the Company in advance.	Customs and sales representatives will be vigilant potential shipping delays caused by natural disasters and promptly inform customers.	Other Suggestions

## **Product Responsibility and Technical Support**

APC particularly focuses on product responsibility and services. Hence, we provide the catalogs that include the specifications, performance, and application description, and safety data sheet (SDS) of existing and new products in the "Product" section on the Company website for customers to access related product information and meet their demands in time.

To ensure the rights and interests entitled to customers for using the Company products, there are technical service and marking units established under the Business Division to develop the new application of products to help customers improve processing issues and facilitate technological cooperation and exchange.

To meet the strict requirements of global customers for product quality, all APC products comply with the relevant legal and regulatory requirements and contain no Health and Environmental Hazardous Substances as categorized in the Globally Harmonized System (GHS). In 2023, EVA products passed the testing and verification by prominent sports brands such as New Balance and NIKE, etc., demonstrating the safety of APC's products.

There was no legal non-compliance or fine in relation to product labeling in 2023. SASB RT-CH-410b.1



# 3.3 Supply Chain Management

## Material topics: Supply chain management; Corresponding sustainability development principle: Sustainable development

Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach
Positive/Negative Impacts	2023 Goals	Effectiveness Assessment
Positive actual impact - Success supply chain management Positive actual impact: Enhance supply chain management and improve raw materials quality Negative potential impact - International	<ul> <li>Develop the "Supplier Code of Conduct and Quality Requirements Self-Assessment Form" for suppliers to determine compliance with the regulations through self-assessment.</li> <li>Achieved a 100% signing rate for Supplier CSR Commitment with existing suppliers.</li> </ul>	Please refer to the table on page 55 for the performance of supply chain ESG risk management and its implemen- tation status.
situations, pandemic, weather affecting	2023 Performance	Grievance Mechanism
supply	· Introduced the "Supplier Code of Conduct and Quality	Grievance Mechanism
Impact Boundary	Requirements Self-Assessment Form," and conducted investigations into the risks of negative impacts on	APC has a Group Audit Division grievance hotline and a suggestion
Global raw material and Project Contractor, Customers	environmental and sociality ( ♥)  · Achieved a 100% signing rate for Supplier CSR Commitment with existing suppliers ( ♥)	email on the corporate website for filing grievances
	Short-Term (< 3 years) Goals	Adjust the management approach
	· In conjunction with the Supplier Code of Conduct and Quality	Internally, conduct supplier evaluation
	imple-mented the on-site audit system to investigate the risks of negative impacts on environmental and sociality, with the	and project construction evaluation periodically, discuss the results, and make adjustments; externally, hold irregular supplier opinion exchange
Processes to remediate and	goal of examining two suppliers per year.	conferences to discuss and share
prevent negative impacts	Medium- Long-Term (≧ 3 years) Goals Planning	opinions on unspecific topics.
Advance procurement, increase safety stock, and seek alternative suppliers	<ul> <li>Conduct on-site audits at the supplier's plant, increasing to 4 suppliers each year.</li> <li>Based on the on-site audit results, build an opinion exchange platform with suppliers and ask related the Company professionals to make recommendations for their inadequacies and help them make corrective planning.</li> </ul>	
	Positive/Negative Impacts  Positive actual impact - Success supply chain management Positive actual impact: Enhance supply chain management and improve raw materials quality Negative potential impact - International situations, pandemic, weather affecting supply  Impact Boundary  Global raw material and Project Contractor, Customers  Processes to remediate and prevent negative impacts  Advance procurement, increase safety	Positive/Negative Impacts  Positive actual impact - Success supply chain management and improve raw materials quality Negative potential impact - International situations, pandemic, weather affecting supply  Impact Boundary  Global raw material and Project Contractor, Customers  Processes to remediate and prevent negative impacts  Advance procurement, increase safety stock, and seek alternative suppliers  Positive actual impact - Success supply chain management and improve raw materials quality Negative potential impact - International situations, pandemic, weather affecting supply  2023 Performance  - Introduced the "Supplier Code of Conduct and Quality Requirements Self-Assessment Form," and conducted investigations into the risks of negative impacts on environmental and sociality (②)  - Achieved a 100% signing rate for Supplier CSR Commitment with existing suppliers (②)  Short-Term (< 3 years) Goals  - In conjunction with the Supplier Code of Conduct and Quality Requirements Self-Assessment Form, we have officially imple-mented the on-site audit system to investigate the risks of negative impacts on environmental and sociality, with the goal of examining two suppliers per year.  Medium-Long-Term (≥ 3 years) Goals Planning  - Conduct on-site audit sat the supplier's plant, increasing to 4 suppliers each year.  Based on the on-site audit results, build an opinion exchange platform with suppliers and ask related the Company professionals to make recommendations for their



## **Supplier Classification and Procurement Proportion**

With the rise in the awareness of the issues related to sustainable development and supply chain risk management, apart from proactively performing social responsibilities and contributing to society, APC has gradually realized the need to understand the ESG impacts on our suppliers in order to implement supplier management.

APC's major suppliers include materials suppliers, equipment suppliers, and project contractors. Additionally, the procurement from information hardware and software suppliers and office supplies were omitted as the proportion was statistically insignificant. To effectively integrate group resources, the Company implements procurement in collaboration with the Group Procurement & Logistics Division. Through utilizing the internal e-procurement system, we ensure the transparency and impartiality of procurement process, uphold business integrity and ethics, and develop a steady partnership with suppliers.

#### APC Supplier Category and Proportion of Transaction Amount in 2023

Supplier Type	Materials Supplier	Equipment Supplier	Project Contractor
Definition	Suppliers supplying raw materials for product manufacture	Suppliers supplying equipment or parts for product manufacture	Suppliers to which projects are outsourced
Proportion of procurement amount (%)	63	23	14

## Supply Chain Sustainable Development Policy GRI 2-23

Apart from requesting suppliers to provide high-quality products and high-efficiency services of raw materials and services, we are also committed to expanding communication channels with suppliers to increase the opportunities for exchange so as to achieve the goals of environmental protection, labor safety, and human rights.











#### Supply Chain Risk Management GRI 308-2, 414-2

#### **Future Planning Risk Assessment Impact Response** In addition to the supply chain safety requirements, the · Implement the supplier sustainability self-· Adjust the supply proportion of · Apart from setting chemical identification of the special conditions for the chemicals supplier assessment questionnaire to provide suppliers, timely supplement or suppliers as the focus, a risk is as follows: information for initial risk assessment. dispatch from other suppliers. assessment mechanism will also · Risk of leakage and contamination in the chemicals · Establish long-term cooperation with suppliers; · For construction projects, the ESH be established based on the cultivate a second source or multiple sources unit immediately investigates manufacturing process procurement amount, project · Occupational safety and environmental pollution risks in dusty, and maintain cooperation to coordinate longpersonnel safety, equipment outsourcing amount, or project high-temperature, noisy, and humid operating premises. term material preparation. damage, and environmental importance, and the on-site audit · Work at height risk. · Develop an internal safety stock mechanism impact. After consolidation, the results of the said sustainable · Industrial safety risk of cutting or welding (S). and set a purchase base point according to the ESH unit will hand over the results development strategy. · Risk of fugitive emissions of VOCs (Volatile Organic supply schedule to prevent the risk of supply to related units to address and · Statistical analysis and subsequent understand the situations. disposal methods are planned Compounds). disruption. · Labor-intensive industries. · Purchasers implement educational training for according to the above risk · Supply chain and project disruption/delay in delivery and the sustainable supply chain. assessment and identification completion risk. · Environmental, safety and health educational mechanism as well as the · Raw materials and construction quality risk. training for contractors. respective risk levels.

#### Performance of Supply Chain ESG Risk Management GRI 2-24

D' 1 1 1 1 1 1	Supplier (chemicals)	Project Contractor
Risk and Attribute	Environmental (E), social (S), and governance (G) aspects	of evaluation
Potential Risk	<ul> <li>Chemicals manufacturing process (E)</li> <li>Dusty, high-temperature, noisy, and humid operating premises (E)</li> <li>Risk of fugitive emissions of volatile organic compounds (VOCs) (E)</li> <li>Labor-intensive industries (S)</li> <li>Supply chain disruption/delay risk (G)</li> <li>Quality risk (G)</li> </ul>	<ul> <li>Dusty, high-temperature, noisy, and humid operating premises (E)</li> <li>Work at height risk. (E, S)</li> <li>Labor-intensive (S)</li> <li>Industrial safety risk of cutting or welding (S)</li> <li>Project disruption/delay risk (G)</li> <li>Project quality risk (G)</li> </ul>
Number of audited and visited suppliers	On-site trial audits were conducted on 2 companies in 2023, with a 100% pass rate	Implemented alongside the project construction evaluation of contractors
Audit Details	Environmental (E): Regulatory compliance of the manufacturing and storage of environmentally controlled substances Governance (G): Management of quality, production, and orders; customer feedback and satisfaction follow-up; employee educational training; and management of outsourced processing.	



#### Promotion of Supplier's Code of Conduct (Supplier CSR Commitment)

GRI 308-1, 403-7, 414-1

Sustainable development indicators such as environmental, labor, human rights, and social impacts have been getting increasing public attention in recent years. In addition to APC, we will also review the completeness of the code of conduct of suppliers. In 2022 APC already completed the revision of internal SOPs to include the Supplier CSR Commitment as a required document for new supplier evaluation.

Currently, apart from including labor and human rights, environmental, and social impacts sustainable development indicators as part of the criteria for new supplier selection and evaluation, we also request new suppliers to sign related undertakings to comply with the following:

	Indicators for screening new suppliers
Labor and human rights	Prohibition of forced labor and child labor, provision of due wages and benefits, protection of workers' working hours and breaks, elimination of workplace sexual harassment, bullying and discrimination, and no conflict minerals.
Health and safety	Includes providing necessary measures such as occupational safety, emergency response, industrial hygiene, machine safeguarding, public health and accommodation, as well as health and safety information.
Environmental	Including environmental operation permits, pollution prevention and resource conservation, hazardous substances, sewage, harmless solid waste, noise, exhaust emissions, product and service restrictions, as well as energy/resource consumption and GHG emissions, etc.
Ethics and integrity	Includes Ethical Corporate Management, Respect for IP rights, compliance with relevant confidentiality agreements, privacy protection, and avoidance of Conflicts of interest, etc.

Apart from setting the existing Supplier CSR Commitment as an incentive, APC has also requested suppliers to sign and comply with the commitment. We have revised internal SOPs to include the Commitment as one of the required documents for new suppliers. Currently, major suppliers of bulk materials and the top five materials suppliers are requested to sign the Commitment. After suppliers sign the Commitment, an unannounced on-site supplier audit for

compliance with the Commitment will be implemented from time to time. By 2023, all existing supplier CSR commitment letters were signed, achieving a 100% signing rate.

Currently, major feedstock suppliers and contractors such as Taiwan CPC, Dairen Chemical, and our partner CTCI have all obtained relevant certifications of ISO14001 and 45001, which meet the Company's requirements for suppliers in terms of environmental management and Occupational health and safetymanagement, making them our excellent partners in Sustainable Development. APC adopts the "active risk management" policy to investigate suppliers with potential negative impacts, including irregular visit of THAU BING to check for the offences or news regarding suppliers' violation of the said terms and assess if such offences or news will bring negative or potential impacts to the Company (such as punishment or suspension order of competent authorities). In addition, we will take related risk controls and countermeasures for the potential raw materials supply crisis based on their offences.





#### SCM mechanism GRI 403-7

With quality, ability, and environmental policy as conditions, APC performs corporate social responsibility in collaboration with outperforming suppliers on a longterm basis. We also communicate with contractors and transporters our environmental policy, comply with the EU's RoHS directive, enhance environmental educational training, and care about the safety of contractors working in our plants in order to ensure the safety of all operations, protect the life, safety, and health of personnel, and optimize risk management.

Establish a long-term strategy partnership with major raw material suppliers and set up a safety stock according to the material preparation schedule to ensure a smooth supply chain. Additionally, the Group Procurement & Logistics Division evaluates suppliers periodically in terms of quality, delivery performance, environmental protection, industrial safety, packaging, quality certification (whether ISO 9001

verification is passed), and service.

Apart from conducting the annual supplier evaluation to ensure that all the Company suppliers comply with our commitment to environmental sustainability and sustainable operations, we also hold supplier conferences from time to time to communicate with suppliers so as to maintain long-term cooperation and opinion exchange. In addition to new product promotion, new technology and market intelligence exchange are also included in the conferences to ensure the steady supply of major materials.

Additionally, during the project construction of contractors, the supervision and management of plant on-site personnel are key to construction quality control, and the quality monitoring of the engineering and industrial safety units is crucial to ensure environmental safety, occupational safety, human rights, and labor practices. Results are reported to HQ periodically to keep up with the latest conditions.



#### election



#### **Selection of New Suppliers and Contractors**

- · New raw materials suppliers must comply with:
- Obtained CNS, UL, JIS, ISO, etc. certificates
- ODirect agents or distributors with technical capabilities and confirmed to meet the requirements
- Quality validation of raw materials by the technology department
- Agreement to comply with the Company environmental protection requirements
- · Submission of samples by new suppliers of raw materials to the recipe section and the related units for examination, assessment, or trial use.
- · Delivery of the "Project Contractor Investigation Form" to contractors for them to fill out the form and submit the relevant certifications to facilitate and evaluation and grading of the procurement unit.

#### File Creation for Qualified Suppliers and Contractors Annual Evaluation of Qualified Suppliers and Contractors

- · After sample validation, the procurement unit reports new materials suppliers to the chief of the engineering department, plant director, and president for approval, includes them in the qualified vendor list (QVL), and timely reviews and updates the QVL.
- · After filling out the "Project Contractor Investigation Classified Catalog", the procurement unit will grade the contractors, create a file for each of them, and maintain a record alongside their certifications for the reference of project outsourcing and price inquiries. The procurement unit also updates the investigation contents from time to

- · Rate the quality, delivery, and industrial safety performance of raw materials suppliers in terms of four grades for the reference of procurement management.
- · Supervise the construction process of contractors and perform inspection and acceptance of projects for the reference of project outsourcing management.

Source: Qualified Supplier Selection and Withdrawal Regulations, Supplier Evaluation Regulations, Capital Expenditure Requests (CER) Project Outsourcing Management Regulations

#### Raw Materials Supplier Evaluation and Contractors Project Evaluation



#### Results of Annual Raw Materials Supplier Evaluation in Past Three Years

Item	2021	2022	2023
Suppliers Evaluated	31	33	20
Pass Rate	100%	100%	100%

- 1. Source: APC Supplier Evaluation
- 2. Overall Rating Standard:
- 3. A grade 85-100 points, B grade 75-84 points, C grade 60-74 points, D grade below 59 points, B grade and above are qualified suppliers
- 4. For grade A Supplier priority in obtaining trading opportunities or increasing their procurement volumes
- 5. For grade C Supplier suggestions for improvement are proposed, and business transactions with them are reduced or suspended until reassessment confirms their improvement has been accomplished
- 6. For grade D Supplier stop transactions and revoke from the qualified vendor list
- 7. Suppliers rated grade A for three consecutive years are exempted from evaluation for three years. As a results, only 24 suppliers were evaluated in 2019 and 2020



#### Results of Contractor Project Evaluation in Past Three Years

ltem	2021	2022	2023
Suppliers Evaluated	28	6	20
Pass Rate	100%	100%	100%

- 1. Source: APC contractor construction evaluation
- 2. Contractors receiving 70 or more marks are qualified contractors
- 3. Score: 60-69, suspended from price inquiry for 6 months
- 4. Score 50-59 points, suspended from price inquiry for 1 year
- 5. Contractors receiving 49 or less marks will be disqualified from tendering and transaction

The proportion of the purchasing amount of major materials in 2023 accounted for 83% of the total purchasing amount for the year. To ensure a sustainable supply of raw materials and stimulate market vitality, we are actively developing new suppliers. There are a total of 16 main material suppliers, among which 3 are from Taiwan and 13 from overseas.

Materials procurement will be prioritized for local suppliers with reliable and stable supply. Due to the longer annual repair duration from domestic Ethylene suppliers, the supply has been decreased in 2023, and the procurement thus reduced compared to 2022. The domestic procurement volume of VAM is higher than in previous years as more stable supply from local suppliers.

#### Support for local procurement

To promote local economic development, simplify the transportation process, and reduce transportation risks, we prioritize local procurement when the procurement conditions are similar. In 2023, the proportion of local procurement, including raw materials and equipment procurement and project outsourcing, accounted for about 70%.

## Proportion of Local Procurement Amount of Raw Materials and Equipment and Project Outsourcing in Past 3 Years (%)

Year	20	21	20:	22	20	23
Locations/Materials	VAM	Ethylene	VAM	Ethylene	VAM	Ethylene
Taiwan	83	73	84	65	100	51
Foreign	17	27	16	35	0	49
Source	3 Taiwan suppliers, 3 Taiwan suppliers, 13 foreign suppliers			3 Taiwan : 13 foreign	suppliers, suppliers	

Source: APC amount statistics 2023

## **Procurement of Energy-Saving and Emission-Reduction Equipment**

APC has been promoting energy saving and carbon reduction program in recent years, and the procurement unit has also prioritized support for eco-friendly materials by establishing SOPs to prioritize price inquiries to products certified for using the Green Mark

by the Environmental Protection Administration; or products complying with Environmental Protection Administration of the Ministry of Economic Affairs's requirements for recycled materials, recyclable products, low pollution, or energy saving; or products recognized by relevant authorities that increase social benefits or reduce social costs.

APC declared a total Green Procurement amount of NT\$14.13 million in **2023.** The procurement items included lamps and equipment carrying the Green Mark and Energy Label and the energy-efficient equipment replacement projects of Linyuan Plant, reducing energy consumption to achieve energy conservation and carbon reduction effectiveness.

### Proportion of Local Procurement Amount of Raw Materials and Equipment and Project Outsourcing in Past 3 Years (%)

Location	Proportion of Procurement Amount				
Location -	2021	2022	2023		
Taiwan	81	83	70		
Foreign	19	17	30		

Source: APC amount statistics 2023



# CH4 Eco-Friendly

- **61** Resources Management GRI 3-3, 301-1, 301-2, 301-3, 303-1, 303-2, 303-3, 303-4, 303-5
- 66 Climate Change and Energy Management GRI 2-23, 2-24, 3-3, 201-2, 302-1, 302-3, 302-4, 305-1, 305-2, 305-4, 305-5
- **79** Emissions Management GRI 3-3, 305-6, 305-7, 306-3, 306-4, 306-5

## **Performance Highlights**

Electricity consumption reduced by 1.57% on average each year during 2015-2023, better than the regulatory requirement of 1%.

GHG emissions in 2023 were 108,107 Mt  $CO_2e$ , by 7.7% less over the baseline year (2017) Saved energy by 9,645 GJ and reduced carbon by 840 Mt  $CO_2e$  in the 2023 Energy Saving and Carbon Reduction Program

## **Material Topics**

Raw material management Water resources management Climate change and energy management Air pollution control

## **SDGs Correspondence**











## **Certified management system**



ISO 14001 Environmental Management Systems Validity Period: 2022.05.13~2025.05.03



ISO 50001 Energy Management Systems Validity Period: 2022.11.19~2025.11.19



# 4.1 Resources management

## Raw material management

Material topics: Raw materials management; Corresponding sustainability principle: Sustainable development GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach	
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment	
Quality control of raw materials and effective recycling for reuse can reduce production costs and lower environmental impacts.	Continuation of 2022 Management Tracking Positive impact - Improve the efficiency of raw material usage, reduce costs, and decrease waste	<ul> <li>Ethylene efficiency ≤ 1.009</li> <li>Equipment operation rate ≥ 96.6 %</li> <li>Flexible intermediate bulk container recovery rate ≥ 78%.</li> <li>Recycling and reuse of waste film rolls ≥ 60MT</li> </ul>	<ul> <li>Include Ethylene efficiency as a quality target to control the achievement rate</li> <li>Include materials recycling and reduction volumes in routine management</li> </ul>	
		2023 Performance	Adjust the management approach	
		<ul> <li>Ethylene efficiency 0.9969 ( ♥)</li> <li>Equipment operation rate 98.45% ( ♥)</li> </ul>	· Periodically review Ethylene efficiency at the	
Management Practice and Objectives	Processes to remediate and prevent negative impacts	Flexible intermediate bulk container recovery rate 78.3% ( ♥ )	weekly plant affairs meeting  The Finished Product Section produces	
Lower the production cost, reduce waste generation, and lower environmental impact through monitoring Ethylene efficiency and	N/A	Recycling and reuse of waste film rolls 69.3MT	statistics and follows up the FIBC recovery rate each month.	
controlling flexible intermediate bulk container recovery.		Short-Term (< 3 years) Goals		
recovery.		· Ethylene efficiency ≦ 1.009		
Strategy		<ul> <li>Equipment operation rate ≥ 96.6 %</li> <li>Flexible intermediate bulk container recovery</li> </ul>		
Raw materials use efficiency monitoring     Materials recycling and reuse		rate ≧ 78%.  • Recycling and reuse of waste film rolls ≧ 60MT		
		Medium- Long-Term ( ≧ 3 years) Goals Planning		
		Increase the dispatch flexibility of materials supply through the Kaohsiung ICT Phase II investment project to increase Ethylene supply by about 19%/ per day		



#### Materials Usage

APC Linyuan Plant mainly produces low density polyethylene (LDPE) resins and ethylene vinyl acetate copolymer resin (EVA) with ethylene and VAM being the major materials and mineral spirit the secondary material.

We do not use recycled materials for the major materials or recycle our products for reuse.

#### Usage of Major Raw Materials at Linyuan Plant in the Past 3 Years

Materials Type	Unit	2021	2022	2023
Ethylene	MT	112,990	107,936	109,548
Vinyl Acetate Monomer (VAM)	MT	25,105	24,270	25,163

#### Material usage and recycling GRI 301-1, 301-2

Linyuan Plant packs products in bags or in containers. The former includes PE bags, FIBC, container bags, top sheet, and shrinkable films. **No recycled materials are used.** 

To minimize the environmental impact of product packaging, customers recycle and reuse packaging materials such as PE bags, container bags, Top Sheets, and shrinkable films. FIBC mostly being used for temporary packaging of Customers' finished goods or debris and recovered by Linyuan Plant for reuse. **FIBCs are collected and returned during the delivery by the transport company and each FIBC is reused for about four times on average.** 

#### Reuse Volume and Recovery Rate of Packaging Materials in Past 3 Years GRI 301-3

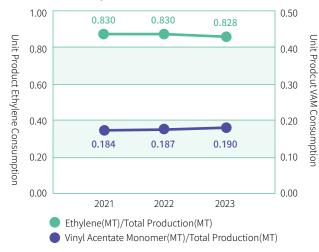
Packaging	Packaging		2021		2022		3
Material	Unit	Consumption	Recovery Rate	Consumptior	n Recovery Rate	Consumption	Recovery Rate
PE Bag	МТ	482	Recycled by customers	474	Recycled by customers	458	Recycled by customers
Top Sheet and Shrinkable Films	МТ	58	Recycled by customers	61	Recycled by customers	55	Recycled by customers
Flexible intermediate bulk container	MT	126	78.2 %	146	78.2 %	136	78.3 %

Note: 1. FIBC recovery rate = (Number of recovered FIBCs / Number of products sold in FIBC), based on the recovery of domestic sales.

- 2. Some of the FIBCs recycled by customers are punctured, while others damage during transportation, leading to an ineffective increase in the recycling rate. We will communication and coordination with customers to handle FIBCs with caution to prevent damage from affecting FIBC recovery and reuse.
- 3. Customers have not specified container bag packaging for shipments in many years, therefore the statistics for container bag usage have been temporarily paused.

In 2023, the overall capacity slightly rose by1.63% over 2022 as a result of the decreased unplanned halts. The demand for EVA products still occupies a high proportion in the market and development towards high-value and high VA content products led to an annual increase in the unit product VAM consumption, while the unit product ethylene consumption reduces each year.

# Unit Product Consumption of Major Raw Materials at Linyuan Plant in Past 3 Years



## Enforce the circular economy

For the "scrap" that generated during the production process, such as slag and dirty waste, which can't be recycled for profit, and the "waste film rolls" produced during product quality testing, both can be used for other purposes, and can still be valuable resources. In 2023, Linyuan Plant produced 225.6MT of scrap and 69.3MT of waste film rolls. These were given to downstream businesses to effectively utilize and reduce environmental impact.

## Water resources management

Material Topics: Water resources management; Corresponding sustainability principle: Sustainable Development GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment
Global warming leading to extreme weather has caused a tight water situation in Southern Taiwan in recent years. Government units, stakeholders, and corporations are gradually placing importance on water resources management. Through water conservation measures and programs, precious water resources are reclaimed for recycling and reuse.	Negative actual impact - Insufficient reservoir water supply	<ul> <li>Water reclamation rate &gt;95%</li> <li>Water consumption per unit product: &lt;4.0 M³/ MT</li> </ul>	"Sustainable Development Section"     on APC official website     Environmental Impact Grievance     Channels
Management Practice and Objectives	Processes to remediate and prevent negative impacts	2023 Performance	Adjust the management approach
<ul> <li>Reduce pollution and emission through process and source improvement and then end-of-the-pipe treatment promote water resource recycling and reuse.</li> <li>Continue to implement water conservation and emission reduction, as well as water resource reclamation management</li> </ul>	Implement three-stage water conservation approach in coordination with the government's water rationing measure to save water by about 10%	<ul> <li>Water reclamation rate 99.2% ( ○ )</li> <li>Water consumption per unit product: 3.70 M³/MT ( ○ )</li> </ul>	<ul> <li>Report the status and rate of self-imposed water conservation at the periodic plant affairs meeting and make rolling review.</li> <li>Discuss the progress and construction methods of improvement projects related to</li> </ul>
Strategy	· Continuous follow-up and	Short-Term (< 3 years) Goals	
Management and follow-up of water reclamation rate.     Continuous follow-up and management of unit product water consumption     Continuous follow-up and management of process	management of water reclamation rate, unit product water consumption, and process improvement projects for water conservation.	<ul> <li>Water reclamation rate &gt;95%</li> <li>Water consumption per unit product: &lt;4.0 M³/ MT</li> </ul>	water conservation at the periodic technological exchange meeting.
improvement projects related to water conservation.  The data boundary of water resources management covers		Medium- Long-Term ( ≧ 3 years) Goals Planning	
Linyuan Plant, and data coverage is 100%  Goals		<ul> <li>Water reclamation rate &gt;95%</li> <li>Water consumption per unit product: &lt;4.0 M³/</li> <li>MT</li> </ul>	
<ul> <li>Accomplish the annual target for water reclamation.</li> <li>Accomplish the annual target for unit product waterconsumption.</li> <li>Keep up with the annual schedule planning for process improvement projects related to water conservation.</li> </ul>		At least one water conservation-related process improvement project each year	



#### **Water source of APC Linyuan Plant**

#### Water resources risk level: Low - Medium

Water source: Third-party water

Type: Fresh water ( $\leq 1,000 \text{ mg/L TDS}$ )

Tap water: Supplied by the Gaoping River Weir via the Fengshan Reservoir; Pure

water: Supplied by Taiwan VCM Corporation

- 1. Adopted the water risk assessment tool developed by the World Resources Institute (WRI)
- 2. The data boundary of water resources management covers Linyuan Plant, and data coverage is 100%

ltem	2022	2023	Increase/Decrease
Water consumption of Linyuan Plant (Thousand M3)	495.771	489.730	Decrease by 1.2%
Water discharge of Linyuan Plant (Thousand M3)	177.084	165.554	Decrease by 6.5%
Total water consumption of Linyuan Plant (Thousand M3)	318.687	324.176	Increase by 1.7%
Water Reclamation Rate (%) (Reuse Rate, R1)	99.2	99.2	-

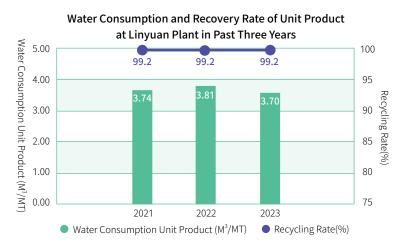
R1 = (Total recycled water volume + Total reclaimed water volume) / (Total water consumption + Total recycled water volume + Total reclaimed water volume) X 100%

Note: After assurance by the third-party verification unit, the total water consumption starting from 2023 will include the volume of purified water and emergency water truck loading for droughts.

GRI 2-4, 303-1, 303-3, 303-4, 303-5 SASB RT-CH-140a.1

Water consumption per unit product in 2023 is 3.70 M<sup>3</sup>/MT, a 2.9% decrease compared to the previous year and still below the goal of 4.0 M<sup>3</sup>/MT.

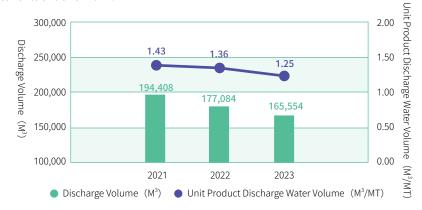
APC Linyuan Plant reclaim condensate and recycle water of the cooling water tower for reuse. In accordance with the "Directions for Review of Water Consumption Plan" promulgated by the Ministry of Economic Affairs, the water reclamation rate in 2023 was 99.2%, which is the same as that of 2022. The graph below shows the unit product water consumption and unit product water reclamation rate of Linyuan Plant in the past three years. Moreover, the Company attaches great importance to the impact of global warming and climate change. In response to the water crisis in Kaohsiung region in recent years, we plan to propose the water solution policy to the senior management in 2024.



#### Effluent Management GRI 303-2

In Linyuan Plant, solid polyethylene products are produced by means of gas compression. After equipment cooling, dicing and cooling, and rinsing product storage tanks, tap water is collected in the equalization basin. Hence, effluents can be discharged free from contamination with a quality better than the legal requirements. It is transported to the dedicated sewerage system via underground pipelines and discharged to the wastewater treatment plant of Linyuan Industrial Park for treatment.

The 2023 effluent volume reduced by 6.5% over 2022 to 165,554 M<sup>3</sup>; the volume of unit product effluent was 1.25 M<sup>3</sup>/MT. Due to the proper water quality control of the cooling water tank, the required water replacement volume reduced, reducing the volume of unit water effluent over 2022.





The major effluent testing items in Linyuan Plant include **suspended solids (SS), chemical oxygen demand (COD), and pH**. The periodic report data is lower than the sewerage water quality limits.

The table below shows the results of major water quality test items of Linyuan Plant in the past three years:

Unit: mg/L

Test Item	2021	2022	2023	Emission Standard
Suspended Solids	9.51	9.18	5.51	≦ 25
Chemical Oxygen Demand	32.72	40.72	32.77	≦ 90
рН	7.58	7.52	7.46	6~9

All items of discharge water quality control tests in 2023 are within the qualified range, with no violations of discharge permission incidents. SASB RT-CH-140a.2

#### Water conservation measures

The enthalpy of vaporization of heat removal equipment and cooling water towers is the main source of water consumption at APC. Over the years we have implemented various water conservation programs, such as replacing the absorption chiller with the electric chiller, waste heat recovery, dicing soft water management, and increasing the concentration factor of cooling water. By maintaining the efficiency of heat exchangers, the 2023 unit product water consumption increased slightly.

#### **Linyuan Plant Unit Water Consumption Trend**



Note: The target value of water consumption per unit product in 2023 is 4.0 M<sup>3</sup>/metric ton

Due to global warming and climate change, the situation of industrial water supply in Taiwan has been worsening in recent years. Apart from adopting progressive water rationing, the government also actively combined the wastewater discharged from various processing zones and industrial parks and further planned and built wastewater recycling plants in response to water shortages. After evaluating the construction and operational costs of in-house wastewater recycling system, we have temporarily postponed the establishment of a small-scale wastewater recycling system and planned to cooperate with government policy on wastewater recycling, and partially use the regenerated water from government-constructed wastewater reclamation plants for internal use, to achieve a win-win advantage for both the government and businesses.

#### SASB RT-CH-140a.3

#### APC Linyuan Plant stage response to the government's water rationing measures:

	,
Stage 1	<ul> <li>Promote water conservation to employees</li> <li>Reclaim office rinsing water for plant irrigation</li> <li>Reclaim dicing water and cooling water for low-level water use</li> </ul>
Stage 2	<ul> <li>Increase the concentration factor of cooling water tower water (from 5.5 times to 7.5 times)</li> <li>Reduce dicing water replenishment of production lines</li> <li>Temporary suspend unnecessary cleaning of product storage tanks and floor</li> </ul>
Stage 3	<ul> <li>Reduce the frequency of fire water testing, postpone fire drills</li> <li>Temporary suspend supplying the Employee bathroom for washing</li> <li>Activate distillation and purification only when the liquid in the reclamation tank is at the high liquid level</li> </ul>

The three-stage measures can save about 10% of water, and purchasing ground-water to supplement with water trucks when necessary.

#### 2024 Water Conservation Program

	Energy Saving	Expenditure on			
Туре	Management Program	Annual Savings in Purified Water Usage (M³)	Annual Savings in Purified Water Expenditure NTS (ten thousand dollars)	Engineering Costs (ten thousand dollars)	
Process Improvement	Line 3 V-1327/V-1328 Condensate Recovery	11,840	47.4	42	

# 4.2 Climate Change and Energy Management GRI 2-23 N 2-24

Material Topics: Climate change and energy management; Corresponding sustainability principle: Sustainable Development | GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment
Extreme climate impacts human lives and properties, which is an inevitable global issue. In response to the EU policy, companies need to prepare in advance for impact response. It is necessary for businesses to take immediate action to enhance energy efficiency and reduce	Negative actual impact- Rising energy costs Negative actual impact - Insufficient electricity supply Negative potential impact - Carbon fee collection	baseline year (2017)  • Unit product electricity consumption: 1,480 kWh/MT  • The individual company greenhouse gas inventory and assurance are expected to be completed in Q4 2023.	
GHG emissions.		2023 Performance	review differences monthly · "Energy Conservation Audit System
Management Practice and Objectives	Processes to remediate and prevent negative impacts	<ul> <li>Carbon emissions in 2023 were 108,100 Mt CO₂e, by 7.7% less over the baseline year(2017) (♥)</li> <li>Unit product electricity consumption 1,461 kWh/MT (♥)</li> </ul>	Report of Energy Users" of the Energy Administration · "Regulations of GHG Inventory
Establish the ISO 50001 Energy management system, improve energy performance indicators through energy-saving measures, enhance energy use efficiency, and voluntarily monitor	Review in-house energy conservation and carbon reduction programs each year in coordination with the	<ul> <li>Only product electricity consumption 1,461 kWh/MT (♥)</li> <li>Completed the verification of Linyuan Plant's 2022 GHG emissions in May 2023 (♥)</li> <li>Operational interruption due to extreme weather events 0 day</li> </ul>	Registration Management" of the Environmental Protection Administration, voluntarily undertake the GHG inventory
GHG emissions to fulfill the commitment of		Short-Term (< 3 years) Goals	Grievance Mechanism
voluntary GHG reduction and legal compliance. We analyze the risks and opportunities of climate change to reduce the financial loss caused by extreme weather conditions in production operations.	Group Energy Management Department Plan and build generation sets to ensure electricity redundancy during power supply disruption	<ul> <li>In 2025, GHG emissions amounted to 106,800 Mt CO<sub>2</sub>e, marking an 8.9% reduction compared to the baseline year (2017). (Note: The target set for 2024 is 108,400 Mt CO<sub>2</sub>e, which has been reached ahead of schedule.)</li> <li>Energy-saving and carbon reduction efforts in 2024 are expected to reduce emissions by 1,220 Mt CO<sub>2</sub>e.</li> <li>The electricity consumption rate for 2024 is 1,480 kWh/MT</li> </ul>	"Contact us" section on the APC website     Survey on issues that concern stakeholders
Strategy	<ul> <li>Plan and implement green power strategies within the</li> </ul>	· Operational interruption due to extreme weather events: 0 day	
· Establishing Energy Conservation and	group: APC will use green power (solar PV) of about	Medium- Long-Term ( ≧ 3 years) Goals Planning	Adjust the management approach
Carbon Reduction Commitment  Enhance energy efficiency  Legal compliance  Climate change risk response	2.5GWh in 2025 by law	<ul> <li>A self-generation and self-consumption solar PV power plant (499kW) will be installed in 2025</li> <li>It is anticipated that approximately 2.5 million kWh of solar green electricity, representing 10% of contracted capacity, will be used in 2025.</li> <li>Achieve a 27% reduction in carbon emissions by 2030 compared to the baseline year, and reach carbon neutrality by 2050.</li> </ul>	USIG Technology Exchange Meeting     Energy Management System     Management Review Meeting



## Climate Change Risk Management GRI 2-23, 2-24

Climate change is a common challenge around the world. To keep up with the world and match the demand for sustainable development, Taiwan announced the amendment of the "Greenhouse Gas Reduction and Management Act" to the "Climate Change Response Act" on February 15, 2023. Facing the impact of climate change, carbon reduction has become a global goal. To enhance carbon reduction, USIG set the 2030 carbon reduction target which is "carbon reduction by 27% over 2017 by 2030" in early 2022 and set "Carbon neutrality by 2050" in 2023 as the Longterm Goals of the Corporation.

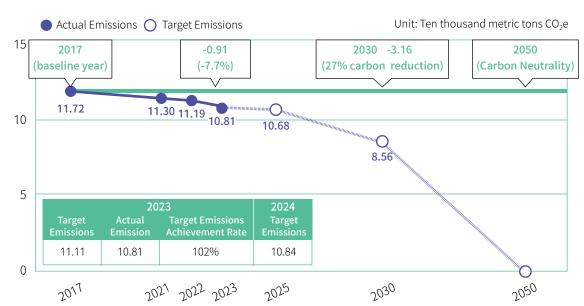
In order to achieve the corporate sustainability vision, USIG has actively implemented corresponding response strategies and management mechanisms with practical actions. The group's domestic plants continue to implement ISO 14064-1 GHG Inventory and Verification, and plan and implement carbon reduction programs. The group also actively develops external renewable energy sites. By the end of 2023, the accumulative ongrid capacity of solar PV sites has reached 7.2MW.

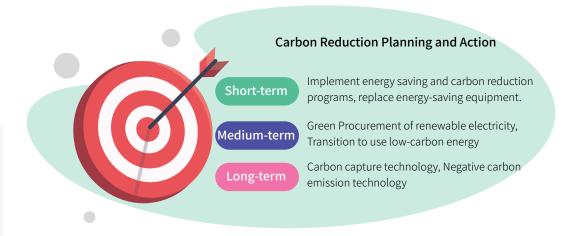
APC plans its carbon reduction pathway according to the group's 2030 carbon reduction Goals. The GHG emissions in 2023 have dropped by 7.7% compared to the baseline year (2017). We will implement the energysaving carbon reduction Program more actively in the future. The mediumterm carbon reduction strategy will proceed towards the transition to lowcarbon energy, enhancement of energy efficiency, intelligent monitoring, and the setup and use of renewable energy. The long-term carbon reduction strategy will continuously focus on low-carbon fuels, carbon capture, reuse technology, and negative carbon emissions technology, to implement the carbon neutrality goals and promote sustainable development.

#### Descriptions

1 We set 2017 as the baseline year for total Greenhouse Gas Emissions, as it was the year when the full operation started after the completion of the fourth production line of APC.

2 Based on the results of ISO 14064-1 external verification in 2022, we revised the carbon emissions in baseline year 2017 to 117,228 Mt CO<sub>2</sub>e (formerly 110,863 Mt CO<sub>2</sub>e ).







APC utilizes the framework provided by the Task Force on Climate-related Financial Disclosures (TCFD) to identify climate-related risks and opportunities, assess risks and opportunities from different departments, evaluate financial impacts, and establish response plans. GRI 201-2

## **Climate Change Management Structure**

Туре		Management strategy and action
	ESG Committee	As the highest governance body of climate change management chaired by independent directors, it reports climate change planning, implementation and performance to the Board of Directors every year
	Operations Management Meeting	Chaired by the Board chairman, it plans and implements materiality policies for energy saving and carbon reduction and reports the results from time to time.
Governance	Group Environmental Quarterly Meeting	As the highest governance body of the USIG's energy management, it reports the planning and progress to the Group's chairman each quarter and makes decisions on energy management
	Group Green Power Team	As the USIG's responsible unit for green power promotion, it reports the status of and future plans for green power development to the Chairman every month
	Scenario analysis	Assess the physical risk based in the different climate scenarios
	Identification of Risks and Opportunities	Based on the level of association with risk factors and the likelihood of occurrence, conduct materiality risk and opportunity assessments for operational feasibility and development potential of opportunity projects
Strategy	Assessment of Potential Financial Impact	Assess the potential financial impacts of identified material risks and opportunities
	Implementation of TCFD	Identify risks and opportunities based on the TCFD framework, communicate with all responsible units, and confirm by senior management
Risk Management	Report of identification results	Include them in the annual risk assessment. The head of the Sales & Marketing Division reports the control measures and management performance to the Audit Committee and the Board of Directors every year
	Group Energy Management Targets	Set energy management targets within the group's carbon reduction initiative, with 2017 as the baseline year, aiming for a 27% reduction by 2030, and achieving carbon neutrality by 2050
Indicators and Targets	Climate-Related Response Strategy	The Short-term (<3 years) initiatives include replacing old equipment, enhancing energy efficiency, installing solar power generation facilities, implementing green procurement practices, and developing measures for water and drought response to mitigate the impact of carbon levies. The Medium-term (3~5 years) carbon reduction Strategy is heading towards the Transition to low-carbon energy, energy efficiency enhancement, intelligent monitoring, and installation and use of renewables. The Long-term (>5 years) carbon reduction strategies focus on exploring low-carbon fuels, carbon capture and reuse technologies, and negative emissions technologies.
	GHG emissions disclosure	Disclose the data of Scopes 1, 2, and 3 GHG emissions in the ESG report yearly and review the causes for changes periodically

### Identification of Climate Risks and Opportunities GRI 201-2

In response to intensifying global climate change, APC continues to utilize the TCFD framework to deepen the understanding of potential risk items that may be faced under extreme climate conditions, and capture new business opportunities. Referencing the Taiwan Climate Change Projection Information and Adaptation Knowledge Platform (TCCIP) and the National Science and Technology Center for Disaster Reduction, analyze the projected changes in temperature, rainfall, flooding, and drought from 2016 to 2035 under the RCP 8.5 scenario and identify three physical risk issues. Also, identified 9 transition risks and 12 opportunity issues, totaling 24 potential risk and opportunity issues, based on the group's strategy, industry characteristics, Intended Nationally Determined Contribution (INDC), and TCFD indicators.

In 2023, we conducted a survey for the ESG Committee and senior unit managers to assess the relevance of each risk to the Company's operations and the duration of potential impacts, as well as the development and viability of each opportunity. We collected 9 responses in total. After statistical analysis by the group, we identified 10 materiality climate issues (2 items of physical risk, 4 items of transition risk, and 4 items of opportunity).

APC evaluates potential financial impacts from 10 materiality risk and opportunity items, devises corresponding strategies, and establishes management mechanisms. The aim is to understand the potential effects of climate change across various aspects, reduce operational disruptions caused by extreme weather events and foster a resilient climate change culture.



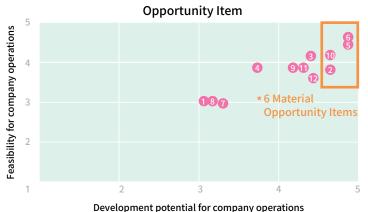
Descriptions: Degree of Association with the Company (from low to high: 1 to 5 points); Potential Occurrence Time (from long-term to short-term: 1 to 3 points) Material Risk Threshold (Degree of Association with the Company 4 points or above, and Potential Occurrence Time 1.9 points or above)

## Physical risk

- ★ 1 Flood inundation
- ▶ 2 Drought
- 3 High temperatures

#### **Transition risk**

- 4 Government regulation or supervision
- Carbon tax/fee
- 6 Product efficiency regulations and standards
- Renewable energy regulations
- 8 Change in customer preferences
- 9 Credit risk
- ▶ 10 Low-carbon technology transition
- 11 Uncertainty in market information
- ★ 12 Changes in raw material prices



Descriptions: Development Potential for Company Operations (from low to high: 1 to 5 points); Feasibility for Company Operations (from low to high: 1 to 5 points) Material Opportunity Threshold (Development Potential for Company Operations 4.6 points or above, and Feasibility for Company Operations 3.8 points or above)

#### Opportunity

- 1 Adopting more efficient transportation methods
- Using more efficient production and distribution processes
- Recycling and reusing
- 4 Switching to more efficient buildings
- ★ ⑤ Reducing water use and water consumption
- ★ 6 Using low-carbon energy
- 7 Adopting new technologies
- 8 Participation in carbon trade
- 9 Developing and/or increasing low-carbon products and services
- ★ 10 R&D and innovation of new products and services
- 11 Entering new markets
- 12 Utilizing public sector incentives

## Financial implications and other risks and opportunities due to climate change and countermeasures GRI 201-2

Climate Change Topic	Торіс	Туре	Description of Risk and Opportunity Items	Potential Financial Impact	Countermeasures
Flood inundation	Physical risk / Chronic	Short-term (< 3years)	Based on information from the Water Resources Agency, it is estimated that the plant would experience a flood ranging from 0 to 0.5 meters if there is 500mm of rainfall in 24 hours for a duration of one day. Due to the impact of heavy rainfall/floods described above, cause the plant halting operations of flood, resulting in decrease in revenue.	↑ capital expenditure and ↓ in revenue	Raise the foundation of key equipment     Build flood control and drainage measures     Regular inspection of the plant's drainage system for smooth flow
Drought	Physical risk / Chronic	Short-term (< 3years)	1. Take 1986 to 2005 as a base period to estimated that APC Linyuan Plant's climate conditions during recent years (2016-2035) may face water shortage or drought due to the possibility of 58 consecutive days without rainfall annually.  2. Due to extreme weather conditions, water rationing or shortage can occur in the plant. In serious cases, it may reduce production line operation or lead to a complete shutdown.	♠ operating costs APC Linyuan Plant implemented phase three measures to reduce water consumption by approximately 10% from March 31, 2023, to June 14, 2023, in response to government water restriction levels. Water conservation rate 10%, control water quantity 1,39MT/day; water conservation rate 5%, control water quantity 1,308MT/day. During the water conservation period in 2023, the average daily water consumption per week: 1,230MT/day, a decrease of approximately 9.3% compared to the normal water usage period (August): 1,356MT/day <ol> <li>The water conservation volume in the plant during the 2023 conservation period was about 9,576MT, which saved approximately NT\$3.06 million in outsourced water truck expenses. [Water truck 25 tons/truck, cost NT\$8,000, 10 trucks/day]</li> <li>In the event of severe drought, we would need to collaborate with water trucks to procure groundwater for replenishment. In extreme scenarios, we might have to reduce production line output or cease operations entirely. This would necessitate the addition of five more water trucks each day, resulting in a daily cost increase of over NT\$40,000 due to water purchases</li> </ol>	APC Linyuan Plant three-stage water conservation approach in coordination with the government's water rationing measure:  Stage 1  (1) Promote water conservation to Employees  (2) Reclaim office rinsing water for plant irrigation  (3) Reclaim dicing water and cooling water for low-level water use  Stage 2  (1) Increase the concentration factor of cooling water tower water (from 5.5 times to 7.5 times)  (2) Reduce dicing water replenishment of production lines  (3) Temporary suspend unnecessary cleaning of product storage tanks and floor  Stage 3  (1) Reduce the frequency of fire water testing, Temporary suspend fire drills  (2) Activate distillation and purification only when the liquid in the reclamation tank is at the high liquid level  (3) Temporary suspend supplying the Employee bathroom for washing
Carbon Fee	Transition risk/Policy and Law	Short-term (< 3years)	The "Draft of Regulations for Charging of Carbon Fees" was released by Environmental Protection Administration in December 2023, with the expectation to impose carbon fees on large carbon emitters whose annual emissions exceed 25,000MT in 2025. (Note: When calculating the carbon fee, a deduction of 25,000MT is available as a free quota.)	Initial investment costs are high, but later carbon emissions are low, leading to reduced operating costs.  APC estimated carbon emissions for 2023, assuming a carbon fee of NT\$300 per metric ton, and deducting the tax exemption of 25,000 metric tons from government, the projected carbon fee would be [NT\$24.93 million], representing around [0.38]% of individual revenue.	APC evaluates the use of internal carbon pricing as a shadow price, incorporating carbon costs into investment assessments to increase the execution opportunities of carbon reduction items     Establish the energy management system

Climate Change Topic	Topic	: Туре	Description of Risk and Opportunity Items	Potential Financial Impact	Countermeasures
Renewable Energy Regulations - Risk of Energy-heavy Industries Clause	Transition risk/Policy and Law	Short-term (< 3years)	"Regulations for the Management of Setting up Renewable Energy Power Generation Equipment of Power Users above a Certain Contract Capacity" by the Ministry of Economic Affairs requires energy-heavy Industries with a contract capacity of more than 5,000 kW to install renewable energy equipment equivalent to 10% of their contract capacity before 2025.	↑ capital expenditure and ↑ in operating costs APC plans to install solar PV equipment on the rooftop and purchase green power with USI Green Energy Corporation to meet regulatory requirements.	1. USI Green Energy Corporation actively seeks suitable sites for green power development. The cumulative capacity of solar photovoltaic installations reached 7.2MW by 2023, with an annual power generation of up to 9.15 million kWh. APC estimates to purchase 1.913 million kWh of green power from USI Green Energy Corporation, a subsidiary of USIG.  2. APC Linyuan Plant has installed 496 kW solar PV 3. APC Linyuan Plant will install a 499 kW (self-generated and self-consumed) solar photovoltaic system in 2025.
Transition of low-carbon technology	Transition risk/Energy, Technology	Medium-term (3~5 years)	Investing in energy transition, efficiency improvement, fuel substitution and other low-carbon technology developments for carbon reduction has led to an increase in technical costs for corporates.	<ul> <li>↑ capital expenditure and</li></ul>	1. Implement a waste heat recovery system improvement project to solve the problem of unstable steam production and save steam when producting different products (LDPE/EVA) on the same production line  2. Other investments in energy-saving equipment (such as motors) or fuel substitution achievements  3. Due to the price increase in electricity by Taiwan Power Company in April 2024, the electricity expenses of Linyuan Plant will increase by NT\$41.89 million per year compared to the past. APC will proactively invest in the transition to low carbon technology to mitigate the impact of the increase in electricity expenses.
Increased raw materials price	Transition risk/Market	Short-term (< 3years)	Under the consideration of future carbon tax levies, the raw material will include the cost of carbon emissions, leading to a rise in prices     Extreme climate leads to uncertainties in feedstock transportation costs and delivery dates	↑ capital expenditure and ↑ in operating costs As ethylene serves as the primary raw material for APC's products, APC invested NT\$906 million in Gulei Project and the Ethylene Storage Tank Project at Kaohsiung Intercontinental Container Terminal to diversify the sources of ethylene.	1. Diversified raw materials suppliers
High-efficiency production	Opportunity/ Resource Efficiency	Medium-term (3~5 years)	Through AI intelligent production, industrial motors, automatic packaging and other production tools, we enhance overall production efficiency and reduce energy consumption.	↑ capital expenditure and ↓ in operating costs It is expected to invest NT\$10 million to implement online analysis and monitoring via the AI data platform	Through the AI project, a new data platform DCS+ was established to collect. Use data from reactors and cooling towers as a basis for subsequent online analysis to enhance analytical efficiency.
Reduce water usage and water consumption	Opportunity/ Resource Efficiency	Medium-term (3~5 years)	Water resources are irreplaceable in the manufacturing process. Reducing plant water leakage and increasing the proportion of water reclamation and reuse can save operational cost expenditures and enhance the resilience of the plant.	The early investment cost of water conservation technology is high Project equipment investment costs and benefits	Improve process equipment and operation to reduce steam use     Continually evaluate water consumption reduction programs     Water consumption per unit product in 2023 decreased by 2.9% compared to 2022

Climate Change Topic	Торіс Туре		Description of Risk and Opportunity Items	Potential Financial Impact	Countermeasures	
Use low-carbon energy	Opportunity/ Resilience, Energy source	Long-term (>5 years)	Promote coal gasification, enhance the proportion of renewable energy usage, reduce carbon costs, and lower the product carbon footprint.	↑ in operating costs, ↓ in carbon fees Project Investment in Carbon Reduced, Cost, and Benefit	1. Developing self-built solar PV power plant, paying attention to and participating in the renewable electricity market  2. The priority for the source of purchased steam supply is natural gas.  3. The energy saving and carbon reduction program in 2023 resulted in a total electricity savings of 516,000 kWh, steam savings of 2,736MT, and carbon reduction of 840MT	
R&D and innovation of new products and services - research and development of low-carbon and energy-saving products	Opportunity/ Product and Services	Long-term (>5 years)	R&D low-carbon products from the perspective of a complete product and service life cycle toward developing products in circular economy, low-carbon, and energy-saving.	↑ in revenue The total sales volume of EVA Materials for photovoltaic applications by APC from 2017 to 2023 is 180,000MT, which can be used for packaging 40GW solar power modules, equivalent to the annual Carbon Reduced of 64,000 Daan Park.	In countermeasures to the major trend of climate change and the transition to low-carbon energy, APC actively developed optoelectronic industry application products, launching low-carbon green energy and high-efficiency EVA films	

## Promote group internal carbon pricing GRI 2-23, 2-24

In February 2023, Taiwan announced the implementation of the "Climate Change Response Act", which introduced a mechanism for collecting carbon fees. Details concerning the fee collection methods and specific rates would be stipulated by the Environmental Protection Administration through related regulations. Targets would be subject to charges based on hierarchy, beginning with major ones followed by minor targets in different stages. The rates will be reviewed regularly and gradually increased. In order to respond government policies in advance and effectively cope with climate change and reducing carbon risk, USIG will introduce an internal carbon pricing system in 2024. The price will be based on the domestic carbon fee pricing basis. We plan to integrate this system into the Company's decision-making and investment evaluation processes, assessing the impact of carbon emissions on business operations, and accelerating the implementation of carbon reduction measures. The Group will also hold two Educational training sessions to help relevant unit employees understand the concept and application of internal carbon pricing, assist each plant in prompt implementation, and also plan for a general course on carbon-related topics. Invite all group employees to participate in order to enhance everyone's carbon reduction awareness and achieve our Sustainable Development Goals.

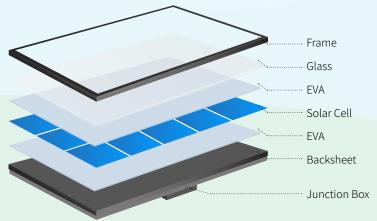




#### **Climate Adaptation Actions**

In response to the impact of climate change, in terms of climate adaptation, USIG is not only continue leveraging technology and R&D capabilities to invest in the development of innovative materials and products but also actively participating in environmental sustainability initiatives held by the Group to mitigate the impact of climate change.

## Photovoltaic Grade EVA



In response to the extreme weather events due to climate change, the importance of market demand for green power products continue to rise. APC thus actively develop PV applied products with high added value, such as the EVA films for PV module packaging, to fulfill the eager demand for PV module packaging materials and cultivate new markets for high-value products.

In the first three quarters of 2023, Mainland China's new solar PV installations reached 129GW, an increase of 145% from the previous year, surpassing the full year installations in 2022. The demand for photovoltaic-grade EVA remains strong. The capacity in Mainland China is expected to start sequentially in the first quarter of 2024. The conservative outlook of customers in H2 2023 affected the price and sales volume, and the sales volume of photovoltaic grade EVA products decreased by about 23% compared to 2022.

## "Add a Touch of Color to the Earth, USI Group Plants a Field of Green" afforestation activity

USIG collaborated with the Experimental Forest of the College of Bio-Resources and Agriculture at National Taiwan University on afforestation adoption project. Led by President Wu, more than 120 people from the Group Taipei HQ and its subsidiaries including USI, APC, and TTC, planted Chamaecyparis formosensis saplings at the afforestation land in Xitou, a section of the Experimental Forest on May 20, 2023. With technical support and management administration provided by the Experimental Forest of the College of Bio-Resources and Agriculture at National Taiwan University, we aim to increase forestry coverage to achieve the goal of "Carbon Neutrality," providing positive benefits such as soil and water conservation, climate regulation, maintenance of environmental ecosystems, and more. This contributes to the "Sustainable Forestry" of our forests and natural resources, helping mitigate global warming and green our Earth.

After the afforestation activity, we went to Shuili Township to participate in the ESG Sustainable Market and DIY crafts, to practice circular economy, support local agricultural product consumption, and implement the spirit of low-carbon sustainability and agricultural education.









## **Energy management**

USIG voluntarily set energy management targets in 2016 and began to make dynamic target reviews in accordance with the Country's energy development policies and by keeping track on the international trends and domestic laws and regulations. After measuring the internal and external factors, we set the 2030 carbon reduction target in early 2022, which is "carbon reduction by 27% over 2017 by 2030". The 9 USIG core businesses began to implement the ISO 50001 energy management system and obtained the certificate in 2018 to effectively manage energy performance and continuously improve energy saving and carbon reduction, hoping to demonstrate USIG's influence and so to lower environmental impact.

Every year USIG holds the "plant technology exchange meeting" and several "Northern /Southern plants resource integration meetings" for plants to share resources and improve performance in energy conservation and carbon reduction though exchange technology experience. In 2023 the "plant technology exchange meeting" was held in October. Case presentation with themes including "industrial safety and environmental protection", "equipment preventive maintenance", and "energy saving and carbon reduction" were conducted through competitions. Through plant technology case submission and documentary review, a total of 7 cases entered the final. Senior group management and plant representatives elected the three best cases. The group's chairman presented the certificates and bonuses to winners. Through ratings and encouragement, sharing, and mutual learning, we aim to advance technology in the group.

In 2023, Plant Director Mr. Hsieh led APC manufacturing team (Chief Sheng-Jen Hsueh, Supervisor Shang-Hsing Yen, and Engineer Cheng-Hsiung Lin), presented with the theme of "Waste Heat Recovery System Process Improvement and Energy Optimization", obtained the third place in the group's senior management evaluation, showing outstanding performance.

#### **Electricity Conservation Rate of Linyuan Plant in Past 3 Years:**

Year	2021	2022	2023
Electricity Conservation Rate (%)	0.75	0.68	1.13

1 The electricity conservation rate in 2023 was 1.13%, and the average power conservation from 2015 to 2023 was 1.57%, which meets the requirement of the "Energy Administration's regulatory requirement of 1%".

2 Electricity Conservation (%) (including Taipower's demand bidding, with an energy conservation volume of 1,568,166 kWh from demand bidding)

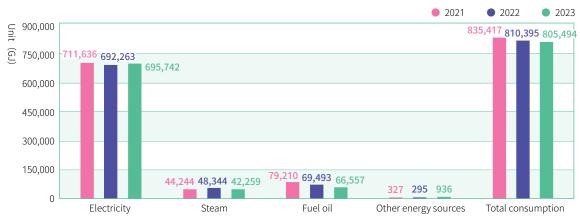




## Energy use GRI 302-1, 302-3

The data boundary of energy management in 2023 covers Linyuan Plant, and data coverage is 100%. The graph below shows the internal energy consumption of Linyuan Plant by electricity, steam, fuel oil, and other energy sources in the past three years and the unit product energy consumption:

#### Statistics of Energy Consumption at Linyuan Plant in Past Three Years



Note: 1. Conversion factor of heat value per unit GRI 2-4

The Energy Administration, Ministry of Economic Affairs announced: Electricity 860 Kcal/degree; Fuel Oil 9,600 Kcal/L; Unit conversion: 1 Kcal= 4.187 KJ

- Steam supplier provides (Kcal/kg): Steam 679.47 (2023); 679.51 (2022); 671 (2021)
- 2. (Electricity/Steam/Fuel Oil) energy consumption = (Electricity/Steam/Fuel Oil) consumption x conversion factor of heat value per unit x 4.187x10-6(GJ/KJ)
- 3. Sources of electricity, steam, and fuel oil consumption and production data: Monthly production statistics, with bills as proof.
- 4. The energy used by the Company is non-renewable.
- 5. After fuel oil is verified a third-party unit, gasoline + diesel + liquefied petroleum gas will be included starting from 2023.



Total 2023 Energy Consumption 805,494 GJ, Reduced by 0.6% SASB RT-CH-130a.1

The production process is running smoothly, reducing the number of equipment cleanings and implementing energy-saving and carbon-reduction programs to lower the usage of steam; increasing the recovery rate of the VA system, and reducing the generation of fuel oil.



Electricity Consumption 695,742 GJ, accounting for 86.4%



Percentage renewable 0%



Self-Generation Energy (Solar PV) 2,017 GJ

Total capacity of self-generation and self-consumption (solar PV) OGJ

All APC's solar-generated electricity in 2023 was sold to Taiwan Power Company

#### Unit Product Energy Consumption of Linyuan Plant in Past Three Years



Note: 1. Unit product energy consumption (or energy intensity) = Total consumption (GJ) / Total production (MT)

2. Source: "Energy Conservation Audit System Report of Energy Users" of the **Energy Administration** 

The unit product energy consumption (or Energy intensity) in 2023 was 6.09 GJ/MT, which was about 2.2% lower than the 6.23 GJ/MT in 2022. The main reasons were the smooth plant process, fewer equipment cleanings, the implementation of energy saving and carbon reduction programs, and the reduction in steam usage. Moreover, increasing the recovery volume of the VA system and reducing the output of fuel oil (VA waste liquid) also contributed to the decrease in unit product energy consumption.

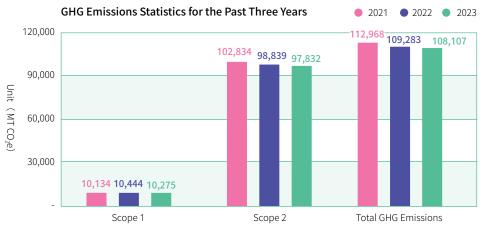
In addition, we adjusted the product production combination in response to changes in market demand. Currently, the market demand is still dominated by EVA products with higher unit product energy consumption. The production of high-EVA products requires higher production pressure. Under conditions that do not affect product quality, reducing the pressure for production saves electricity and factors such as the decrease in the number of yearly equipment failures also are key to preventing a sudden increase in electricity consumption.

## **GHG** management

The Ministry of Environment announced a revision on August 8, 2022, "Businesses should inventory and register GHG emissions sources". The Linyuan Plant of APC belongs to the Added second batch Target for inventory and registration of GHG emissions, which should complete the GHG inventory of the previous year by August 31, 2023, and after entrusting a third-party certification body for verification, register on the website designated by the Ministry of Environment. APC Linyuan Plant once entrusted Environmental Protection Bureau of Kaohsiung City to inventory on GHG emissions and has been conducting self-imposed inventory for years and completed the verification in accordance with ISO 14064-1 through a third-party assurance agency in 2022 Q3.

According to regulatory requirements, APC must complete the consolidated greenhouse gas inventory for the parent and subsidiary companies by 2025 and achieve assurance by 2027. APC has already completed the consolidated greenhouse gas inventory and assurance for 2023 in Q2 2024. The operational boundary of Linyuan Plant includes direct, indirect, and other indirect GHG emissions. The main GHG emissions are five categories, including  $CO_2$ ,  $CH_4$ ,  $N_2O$ , HFCs, and  $SF_6$ . Ultimately, carbon emissions are presented as  $CO_2$ e by converting through the Global Warming Potential (GWP) in IPCC's sixth assessment report.

GHG emissions by scope and intensity of unit product of APC in past 3 years are as follows: GRI 305-1, 305-2, 305-4



Description: As Linyuan Plant implemented the ISO 14064-1 GHG inventory third-party verification system in 2021, we replace the original 2021 GHG emissions inventory data with the data verified by the third party.

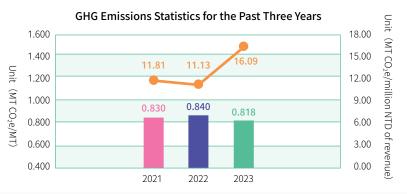
Note1: Electricity emission factor: 0.494 kg CO<sub>2</sub>e/kWh (for 2023). Purchased steam emission factor: 0.1536731535 tons CO<sub>2</sub>e/ton (for 2023).

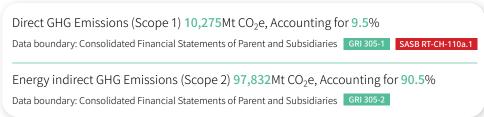
Note2: GHG Emissions: Scope 1 refers to direct emissions from processes or facilities. Scope 2 refers to energy indirect emissions, such as purchased electricity (all supplied by Taiwan Power Company) and purchased steam (all supplied by Formosa Plastics Linyuan Plant).

Note3: GHG Emissions = (Energy Fuel Usage) x (Emission factor announced by the Environmental Protection Administration) x (IPCC GWP value required by the Environmental Protection Administration)

Note4: GHG emission intensity = total GHG emissions (metric tons CO<sub>2</sub>e) / total production (metric tons) (or total GHG emissions metric tons CO<sub>2</sub>e) / million turnover).

Note5: According to the GHG emission coefficient version 6.0.4 announced by the Ministry of Environment and the GWP value of the IPCC 2013 Fifth Assessment Report, the value is converted into dioxide carbon emission equivalent.





The total GHG emissions of APC in 2023 were 108,107 Mt  $\rm CO_2e$ , a reduction of 1.1% compared to 2022. The intensity of unit product GHG emissions was 0.818 Mt  $\rm CO_2e/MT$ , a reduction of approximately 2.62% compared to 2022. The reduction in energy consumption per unit product is primarily due to adjustments in the product mix based on market demand changes, process pressure adjustments, and a decrease in equipment failure rates. Another measure of emission intensity is 16.09 tons  $\rm CO_2e$  per million in revenue, which represents an increase of approximately 45% from the previous year, mainly due to a decrease in product prices and a reduction in annual revenue.



## Other indirect GHG emissions (Scope 3)

According to ISO 14064-1, categories 3-6 indirect GHG emi-ssions were identified and assessment in accordance with the indicators in Appendix H of ISO 14064-1:2018. Among them, one item is Category 3 (emissions from upstream transport and distribution for goods) and four items are Category 4 (purchased goods), which belong to Scope 3, with GHG emissions of 307,865 Mt CO<sub>2</sub>e. (Note: Scope 1–3 data has been assured by a third-party organization.)

#### APC's Scope 3 GHG emissions in 2023

Item	Emissions (MT CO <sub>2</sub> e)
Category 3 - Transportation Vehicles -Vinyl Acetate Monomer	286.4414
Category 4 - Purchased Goods - Ethylene	205,950.2513
Category 4 - Purchased Goods - Vinyl Acetate Monomer	82,722.8249
Category 4 - Purchased Goods - Other Electricity	18,800.0834
Category 4 - Purchased Goods - Tap Water	105.4774
Total	307,865.0784



## **Energy Saving Actions and Benefits GRI 302-4**

A total of four energy saving and carbon reduction manage-ment programs have been implemented in 2023, as shown in the figure:



#### Process Improvement

1. Increase V-1227 steam output. 2. Reduce production pressure for electricity conservation. Save: Electricity 355,220 kWh, Steam 2,736 MT, Reduce carbon 760 Mt CO<sub>2</sub>e



#### **Equipment Improvement**

3. Replacement of the reactor motor. 4. Improve LINE 4 granulation area for energy-saving. Save: Electricity 161,394 kWh, Reduce carbon 80 Mt CO₂e

Electricity conservation by 516,614kWh, steam 2,736 MT, and reduced carbon by 840 Mt CO<sub>2</sub>e in total. The table below shows the energy saved and carbon reduced by process improvement and by equipment improvement:

Туре		Process Improvement	Equipment Improvement	Total
Energy	Electricity (GJ)	1,279	582	1,861
Saved	Steam (GJ)	7,784		7,784
Reduce carbon(MT CO₂e)		760	80	840

Note 1: The calculation method for energy saving and carbon reduction program have been presented in terms of annual equivalent

Note 2: The Energy Administration, Ministry of Economic Affairs announced: Electricity 860 Kcal/degree; supplied by the steam supply plant: Steam 679 Kcal/kg, Unit conversion factor: 4.187x10-6(GJ/KJ)

## All reduced GHG emissions were Scope 2 Reduced indirect energy emissions GRI 305-5

APC Linyuan Plant establish energy saving and carbon reduction programs and targets in response to the government's energy saving policy and in accordance with the group's energy management targets. Every month we produce statistics on the results of implementation of the energy saving and carbon reduction programs for the reference of progress control. We also share resources and exchange experience with other USIG businesses through the group's "Resource Integration Meeting" and "Technology Exchange Meeting" to learn from one another so as to implement practical and effective energy saving and carbon reduction programs.



#### 2024 Energy saving and carbon reduction programs

It is expected to implement 5 energy-saving and carbon-reducing measures, saving 2,237,004 kWh of electricity, 522 MT of steam, and reducing carbon emissions by 1,220 MT CO<sub>2</sub>e in total.

Investment amount for the 2024 energy-saving and carbon reduction program is NTD 16.13 million.

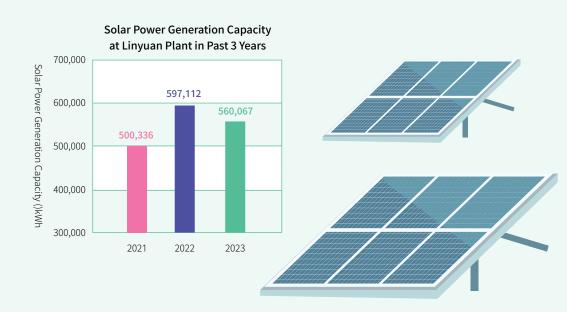
Туре	Energy Saving Management Program	Program Targe Value	Total Energy Saved in the Program	2024 Reduce Carbon Emissions Target
Process Improvement	<ol> <li>Improve LINE 3 condensate recovery for energy saving.</li> <li>Improve LINE 3 VA transportation system for energy saving.</li> <li>Line 2 Recycle line for temperature reduction and electricity conservation.</li> </ol>	Electricity 135,120 kWh Steam 522MT	Electricity 2,237,004 kWh Steam 552MT	1,220 MT CO₂e
Equipment Improvement	<ul><li>4. Improve LINE 3 catalyst pump for electricity conservation.</li><li>5. Improve electricity power system for electricity conservation.</li></ul>	Electricity 2,101,884 kWh		

## **Renewable Energy**

The solar PV installations with an installed capacity of 496.08kW at the APC Linyuan Plant was completed in June 2011. In 2023, APC solar PV generation produced up to 560,067 kWh and all was sold to Taiwan Power Company. The accumulative generation by the end of 2023 was 73.9 GWh, reducing emissions by about 3,839Mt  $CO_2e$ .

Currently, USIG is planning to lead all USIG businesses to fulfill the green power demands within five years through the central construction of PV installations by the group. If the output is insufficient, the group will be supplemented by purchasing green power and renewable energy certificates.

APC is expected to purchase 1.89GWh of green power from USI Green Energy Corporation in 2025. Linyuan Plant will follow the regulations of the new law and coordinate with the group's overall planning to achieve the group's carbon neutrality goal set for 2050. Linyuan Plant is expected to install another 499 kW solar PV system for self-generation and self-consumption in 2025.



## 4.3 Emissions Management

Material Topics: Air pollution control; Corresponding sustainability principle: Sustainable Development GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution Manageme	Evaluation of Management Approach	
Significance to APC	Positive/Negative Impacts	2023 Goals		Effectiveness Assessment
Air quality in the petrochemical industry remains a significant topic for the general public. The emission of air pollutants not only impacts compliance with environmental regulations but also has affect environmental air quality and public health.	Negative actual impact - Air pollution control has not been implemented			Authorized testing companies that approved by the National Environmental Research Institute to regularly measure the volume of air pollutant emissions every year.
Management Practice and Objectives		2023 Pe	rformance	Grievance Mechanism
APC Linyuan Plant monitors and improves air pollutant emission quality through VOCs leakage detection of equipment components and air pollutant emission reduction improvements of equipment, to meet the requirements of government air	Processes to remediate and prevent negative impacts  • Enhance the frequency of regular component inspections, from 140 inspection points per month to 280	<ul> <li>Regular walk-through inspections of equipment components, with 420 inspection points monthly (♥)</li> <li>Air pollutant emissions:</li> <li>NOX 5,261 kg (♥)</li> <li>SOX 3,930 kg (▼)</li> <li>VOCs 32,754 kg (♥)</li> </ul>	We plan to engage the approved pollutant emissions in accordance with the "Total Air Pollutants Quantity Control Plans for Kaohsiung-Pingtung Area" with external vendors to comply with relevant regulations.	Environmental Impact grievance channels.
pollution regulations and improve the surrounding air quality of the plant.	inspection points per month.	Short-Term (	Adjust the management approach	
Strategy	Install online detectors to monitor the emission of air pollutants (NOx, SOx, VOCs) at all times, and	Regular walk-through inspections of inspection points monthly  Output  Description:	Exchange of environmental pollution prevention technology and experience at the group technology exchange meeting.	
<ul> <li>Equipment and component leakage tour inspection</li> <li>Reduction of air pollutant emissions</li> <li>Legal compliance</li> </ul>	make immediate adjustments and improvements when there are process or equipment anomalies.  Reduce equipment failure	<ul> <li>Process Air Pollution Reduction Process The approved annual emission goal of Kaohsiung-Pingtung-Chiayi Areatorganic compounds 39,771 kg)</li> </ul>		
0	rate through monthly periodic maintenance.	Medium- Long-Term (		
		<ul> <li>Monthly tour inspection of 600 pcs by the environmental protection see</li> <li>Reduce boiler NOx emissions to be below 10mg/Nm3 with new air pol</li> <li>Air pollutant emissions: NOx decreased by 19</li> </ul>	ection. low 30ppm and TSP emissions to lution control equipment. ased by 1% compared to the stand-	



## Air pollution control GRI 305-6

The major air pollutants emitted by APC Linyuan Plant include nitrogen oxides (NOx), sulfur oxides (SOx), volatile organic compounds (VOCs), and total suspended particulate (TSP). NOx and SOx are mainly produced by the plant's combustion facilities (e.g., regenerative thermal oxidizer (RTO), steam boiler, thermal oil boiler). The Plant does not generate ozone depleting substances (ODS). VOCs mainly come from the emissions and leakage of the RTO, flare, storage tanks, equipment and components. Particulate matters mainly come from product storage tanks.

In addition to regularly testing and reporting air pollutants, we have planned the following reduction programs to effectively reduce air pollutants:



#### **Reduce VOCs emissions**

We commission EPA-accredited institutions to check all equipment and components in the plant each quarter, enhance the self-imposed tour inspection of equipment and component (about 15,000 spots each month), and replace one old catalyst pump (one replaced). The environmental protection section has purchased two FID detectors (TVA-2020) to perform average up to 420 spot checks each month, the number has increase compared to previous years.



#### **Ethylene Recovery Process**

The ethylene is recycled among different production lines when the production process halts



## Offsite underground ethylene pipelines Ethylene emptying recovery

When there is an operation issue that needs to empty the offsite underground ethylene pipelines for maintenance, we recover ethylene to each production line through the in-house ethylene recovery pipelines to reduce air pollution



## Process waste reduction and improvement SASB RT-CH-110a.2

- · In 2019, the emission pipeline of the first-section outlet separator of the fourth production line's flash compression machine was modified to return to the inlet separator of the compressor
- · In 2021, the discharge pipeline of the first-section outlet separator of the boosting compressor in the third production line was modified to return to the inlet separator of the compressor
- · In 2022, plan for steam boiler replacement
- · In 2025, it is planned to add a combined fuel steam boiler with catalytic ceramic filter tubes, which will handle process emissions and process exhaust gases, reducing particulate matter (TSP) and nitrogen oxides (NOx) emissions.

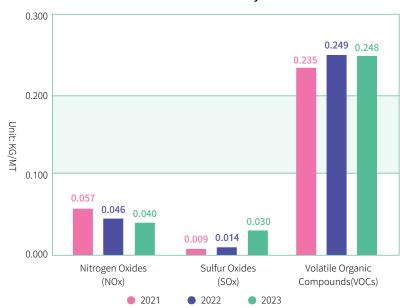
### Air Pollutant Emissions of Linyuan Plant in Past 3 Years:

GRI 305-7 SASB RT-CH-120a.1

Year	Unit	NOx	SOx	VOCs	HAPs
2021	MT	7.8	1.2	31.9	8.616
2022	MT	6.0	1.8	32.4	0.742
2023	MT	5.3	3.9	32.8	0.583

Description: The 2023 SOx unit emissions increased over 2022 mainly because the Department of Environmental Protection changed the SOx calculation method for RTOs, increasing the SOx emissions. Additionally, the hazardous air pollutant (HAP) emitted by the Linyuan Plant is Vinyl Acetate Monomer (VAM), which has no control limit been set and VAM emissions were 0.583 MT.

#### Unit Product Air Pollutant Emissions of Linyuan Plant in Past 3 Years





Over the years, emission test results of the Linyuan Plant have been consistently well below the Environmental Protection Administration emission standards. The table below shows the results of APC pipeline emission test in 2023:

Pollutant	Unit	Thermal Oil Boiler	Steam Boiler	Emission Standard
NOx	ppm	72	74	100
SOx	ppm	ND(<2)	ND(<3)	50
TSP	mg/Nm³	ND(<1)	3	30

Regenerative Thermal Oxidizer	Emission Standard
2	150
4	100
1	100

Note:Total Suspended Particulate (TSP)

## Waste Management GRI 306-3, 306-4, 306-5

Industrial waste generate by APC Linyuan Plant includes general industrial waste and hazardous industrial waste. We sign contracts with EPA-accredited domestic contractors to remove and dispose of waste in accordance with the "Waste Disposal Act". It is required to file a waste delivery manifest on the Environmental Protection Administration's website according to the Act. After leaving the plant, we then track the waste disposal contractors ensure compliance with the statutory period and also request contractors to provide proof of proper disposal, with onsite inspections of waste disposal facilities annually.

General industrial waste is disposed by type through intermediate waste treatment including incineration, pyrolysis, and physical disposal operations. Contractors will direct waste to landfills, production into recycled oil products, or fuel oil as final treatment according to the approved methods in their licenses.

In response to the Zero Waste through Resource Circulation Policy by Resource Circulation Administration, we have actively sought ways for recycling for reuse of waste in recent years. Waste wood, waste plastic, and waste bricks are treated via recycling for reuse and can ultimately be used as renewable fuel and construction-grade materials; while waste iron is transported to licensed waste disposal contractors for recycling purposes.

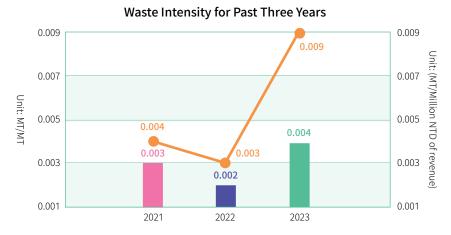
The table below shows the methods and weight of waste disposal reported by Linyuan Plant in the past three years, according to the waste delivery manifest statistics on the Environmental Protection Administration's website:

#### Method and Weight of Waste Disposal of Linyuan Plant in Past 3 Years

Unit: MT

Treatment	Types of Waste	2021	2022	2023
Incineration	General household waste, waste plastic, and waste wood mixture	43.64	43.70	51.53
Physical treatment, thermal decomposition, incineration treatment	Waste oil mixture	268.49	145.50	219.79
Physical treatment	Waste Lubricating Oil	66.95	68.81	48.65
Physical treatment	General waste chemical substances mixture	16.48	16.43	17.53
Landfill Disposal	Mixture of civil or construction waste			2.90
Overseas processing	Including cadmium battery			
Recycling for reuse	Waste wood, waste plastics, waste bricks,			49.3
Recycling for reuse	Waste iron			185.34
Total weight of waste		395.56	274.44	575.04
Waste recycling rate (%)				40.8

Due to two whole plants shutdown for maintenance at Linyuan Plant in 2023 and implemented adjustments to product specifications in 2023 H2. These factors contributed to the rise in the generation of waste oil mixtures compared to 2022. Some of the waste lubricating oil was of inferior quality, so it was deemed as a waste oil mixture, leading to a decrease in production in 2023 compared to 2022. SASB RT-CH-150a.1



There was no hazardous waste generated at the Linyuan Plant in 2023.

Additionally, there was no spill of oils, fuels, or chemical substances was reported at the Linyuan Plant in 2023.

## **Environmental Impact Grievance Channels**

APC Linyuan Plant has established the "Procedures for Implementation of Communication and Consultation" to establish, implement and maintain channels and procedures for the communication, engagement, and consultation of environment-related topics for internal (employees, enterprise union, Occupational Health and Safety committee meetings, etc.) and external (customers, competent authorities, community residents, and environmental groups, etc.).

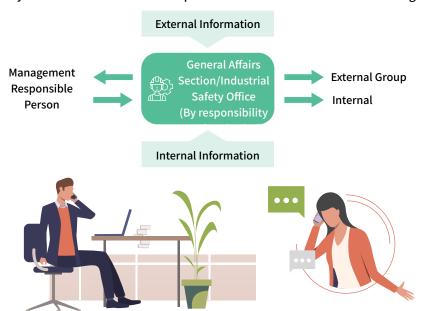
The procedure for addressing internal grievances, employees proposes environment, health and safety-related issues through meetings such as the "Enterprise Labor Union Board Meetings", "Occupational Health and Safety Committee Meeting". If publicity or response is required, the responsible departments will review the

responses, which then will be communicated within the company through meetings, educational training, or announcements after the approval by the environmental and Occupational Health and Safety management representative.

The procedure for addressing external grievances is refer to after any unit of the Linyuan Plant receives an environment, safety, and health-related grievance from outside the company via phone, orally, or in writing, the responsible unit will verify the contents of the grievance and register it in the "Occupational Safety and Health and Environmental Information Registration Form", then take necessary actions and appropriate responses, if the grievance becomes a case study.

Item	2021	2022	2023
Number of Grievances (cases)	2	3	0
Number of Valid Cases (cases)	2	3	0

## Linyuan Plant Environmental Impact Grievance Channels Schematic Diagram



# CH5

## Safety Workplace and Social Inclusion

**84** Talent Selection GRI 2-7, 2-8, 3-3, 401-1

**92** Talent Development GRI 201-3, 401-2, 401-3

96 Human Rights Policy GRI 2-23, 2-24

**100** Healthy Workplace GRI 2-8, 3-3, 403-1~9

**114** Social Engagement

## **Performance Highlights**

Employee Turnover Rate 0.43 %

Employees educational training: 24.5 hours/person

The total cumulative of zero lost-time due to disabling injury have 5.81 million working hours Donation to the USI Education Foundation NT\$5 million

## **Material Topics**

Talent attraction and retention Occupational Safety and Health Process Safety Management

## **SDGs Correspondence**







## Certified management system



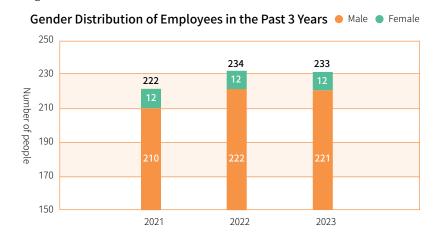
ISO 45001 Occupational Health and Safety Management System Validity Period: 2022.05.13~2025.04.23

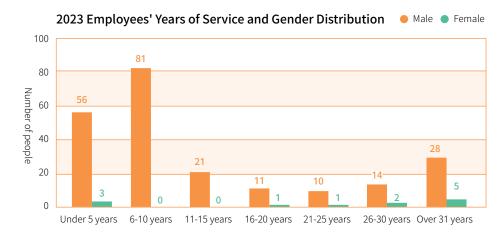


## **5.1** Talent Selection

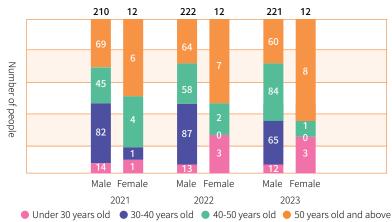
#### Workforce Structure GRI 2-7, 2-8

As of December 31, 2023, the total number of employees at Asia Polymer Corporation was 233, all of whom were full-time employees under irregular contracts, 221 were male and 12 were female. Due to the requirements of the petrochemical industry, the proportion of male employees is higher than that of females. The average service length of employees is 13.8 years, and the average age is 44.5 years old. 82.1% of the employees have a college degree or above, all of whom are hired locally from Taiwan, mainly distributed in Taipei and Kaohsiung.





## Employee Distribution by Age and by Gender in the Past 3 Years



## Total Number of Employees Categorized by Gender and Region in 2023

Region	Taip	Taipei HQ		Kaohsiung Linyuan Plant	
Gender	Male	Female	Male	Female	
Permanent Employees (Number of people)	11	3	210	9	
Temporary Employees (Number of people)	0	0	0	0	
Non-guaranteed Hours Employees (Number of people)	0	0	0	0	
Full-time Employees (Number of people)	11	3	210	9	
Part-time Employees (Number of people)	0	0	0	0	

## Total Number of Workers who are not Employees by Gender and Region in 2023

Region		i HQ I	Kaohsiung Linyuan Plant	
Gender	Male	Female	Male	Female
Contractors - Te Yuan (Packaging), Lien Ming (Transportation), Pao Tien (Transportation), Kuo Shan (Cleaning) (Number of people)	0	0	26	11
Purchasing - USI Group Purchasing Department (Number of people)	0	0	3	3
HR - USI Group Human Resources Division (Number of people)		0	3	0
Information - USI Group Information Systems Division (Number of people)		0	1	0
Security (Number of people)		0	3	0
Restaurant (Number of people)		0	0	3
Total	53			

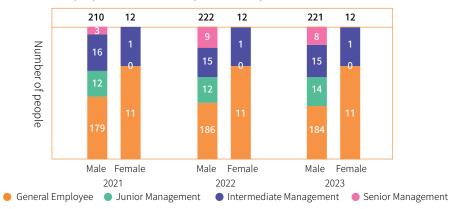
## **Talent Distribution**

Given the characteristics of the petrochemical industry, we focus on academic backgrounds and professional abilities when recruiting employees. In conjunction with professional training and work experience upon entry, we aim to cultivate professional talents in the petrochemical field. The proportion of the Company's in-service quality employees holding a bachelor's or master's degree increases every year. In 2023, up to 82% of the new employees are graduates from universities and graduate School, which is of great benefit to the improvement of technical and operational levels.

## Employee Distribution by Education Attainment in Past 3 Years



## Employee Distribution by Job and by Gender in Past 3 Years



All junior and intermediate management (foremen and section chiefs) and senior management (department chiefs and above) of Taipei HQ and Kaohsiung Linyuan Plant are Taiwan citizens to facilitate the understanding of local culture and needs and increase local economic benefits. The proportion of female supervisors in managerial positions at APC in 2023 was 4.17%.



## **Talent attraction and retention**

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach	
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment	
Retaining stable talents is an essential foundation for the operation of enterprises. Employees are important assets of APC. Through appropriate salaries, comprehensive benefits, a safe work environment, and training,	Negative potential impact - No succession plan in place	<ul> <li>No violations of human rights and labor conditions were reported</li> <li>Employee Turnover Rate ≤ 5.0%</li> <li>Educational training plan execution rate 100%</li> <li>Average hours of educational training per employee</li> </ul>	Internal Audit Within the Group     Government agencies labor inspection	
we attract and retain outstanding talents to avoid a talent gap, bringing continuous	Processes to remediate and	>22.5 hours		
development power to the Company.	prevent negative impacts	2023 Performance	Adjust the management approach	
Management Practice and Objectives	<ul> <li>To stabilize the workforce and retain outstanding talents, we adjust salaries annually based on the consumer price index</li> </ul>	<ul> <li>No violation of human rights and labor conditions (②)</li> <li>Employee Turnover Rate 0.43 % (②)</li> </ul>	Periodically review Ethylene efficiency at the weekly plant affairs meeting	
With the goal of recruiting excellent and suitable talents through a fair, open, transparent, and efficient recruitment system, the basic human	and individual performance.  The Company participates in the petrochemical sector compensation survey	<ul> <li>Educational training plan execution rate 100% (♥)</li> <li>Average hours of educational training per Employee</li> <li>24.5 hours (♥)</li> </ul>	The Finished Product Section produces statistics and follows up the FIBC recovery rate each month.	
rights of equal employment opportunities are taken into account. We aim to achieve the	each year to assess the salary standard in the market so as to give employees	Short-Term (< 3 years) Goals		
purpose of selecting the right talent for the right job through recruitment, talent cultivation, and retention, to ensure the quality and stability of our new employees' work, thereby strengthening our operational capabilities.	<ul> <li>an appropriate raise. We will also give a special promotion to excellent talent with outstanding performance.</li> <li>Timely replenish the workforce and plan the handover schedule based on the sales</li> </ul>	<ul> <li>No violations of human rights and labor conditions were reported</li> <li>Employee Turnover Rate ≤ 5.0%</li> <li>Educational training plan execution rate 100%</li> <li>Average hours of educational training per employee &gt;</li> </ul>		
Strategy	volume in response to employees at the retiring age. We also arrange educational	24.5 hours		
Enhance corporate identity	training and business succession for new employees.	Medium- Long-Term ( $\geqq$ 3 years) Goals Planning		
<ul> <li>Establish diverse recruitment channels and recruit talents who share the same philosophy through a fair, open, transparent, and efficient recruitment system</li> <li>Offer high-quality remuneration, diverse benefits system, create a friendly, harmonious and safe workplace environment to retain talents</li> </ul>	Regularly send employees to receive external professional training and obtain the relevant certification every year to prevent talent gaps.	<ul> <li>Improve corporate image, attract fresh grads from the society, and reduce the employee turnover rate to less than 1%.</li> <li>Construct appropriate training courses to improve the training quality, with the goal to increase the average training hours per person to over 30 hours.</li> </ul>		

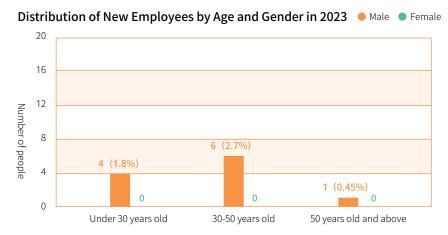
#### Talent attraction

To address the issue of personnel succession and experience transfer due to employees' retirements, each unit timely replaces the manpower based on the retirement status. The Company aims to recruit exceptional talents suitable for the job based on their professional abilities and experiences through a fair, just, transparent, and efficient recruitment system. Through talent selection, talent cultivation, and talent retention, we ensure the competence and steady employment of new employees to strengthen the corporate structure. We also review the workforce composition and implement workforce dispatch and control at any time in routine operations, as well as analyze and improve the status of employee turnover to ensure workforce competence and experience succession

When a unit needs to fill an existing position or expand the workforce due to business needs, organizational planning, or employee resignations, with the approval of their current supervisors, active employees interested in such openings may voluntarily submit their resume to the human resources unit. After further screening, the human resources unit will forward the resumes of eligible candidates to the supervisor of the requesting unit to provide multiple options to the unit and a better career development mechanism for employees.

On the other hand, we also conduct external recruitment through newspapers, human resources websites, human resources consulting agents, schools, employment service stations, etc. For vacancies in the Kaohsiung Plant, we prioritize recruiting talents from nearby communities, providing local employment opportunities as a way of giving back to the local communities.

In 2023, APC employed 11 new employees aged between 28 to 55, all of whom are male and accounted for 4.7% of the total number of employees. The table below shows the distribution and proportion of employees by gender and by age: GRI 401-1



Note: 1. Operational entities of APC, including Taipei HQ and Kaohsiung Linyuan Plant, are all located in Taiwan, thus considering as one region.

#### Current management practices for retention

To enhance the quality of talent, develop management talent, and coordinate with the organizational development needs, the Company encourages employees with outstanding performance and developmental potential to take the entrance examinations of the related graduate programs, such as EMBA, of domestic universities and receive management assistant training. We provide these employees with financial support for their studies, job rotation, and adjustments to strengthen their professional competence in each business area, actively nurturing supervisory talents. To stabilize the workforce and retain outstanding talents, apart from adjusting the salary for employees according to the consumer price index and personal performance of the employees every year, we also participate in a compensation survey of the petrochemical industry to estimate the salary standards in the market to make appropriate adjustments and planning. We also give a special raise to employees with outstanding performance to ensure that our salary is competitive with the market.



<sup>2.</sup> The rate of new employee hires of different age groups is calculated with the total number of male and female employees as the denominator



#### **Talent Mobility**

The position change and resignation of employees are handled in accordance with the relevant regulations. Full-time employees may apply for retirement at 65 years old in accordance with the Labor Standards Act or for voluntary retirement at earlier ages by law. That is, all employees are entitled to voluntarily terminate employment by law. The rights, obligations, and labor conditions of resignation are handled with by law. When there are significant operational changes, such as closure, transfer, operating losses, or business contraction, that workforce reduction is required, we will notify employees from 10-30 days in advance based on the seniority of employees in accordance with the Labor Standards Act.

In 2023 there were 15 employees resigning from APC (including 14 retirees). After deducting the retirees, the actual rate of employee turnover was 0.43%.

The table below shows the distribution and proportion of employees by gender and by age: GRI 401-1

	Under 30 years old		30-50 years old		50 years old and above	
Gender	Number (persons)	Proportion (%)	Number (persons)	Proportion (%)	Number (persons)	Proportion (%)
Male	0	0.00	1	0.45	0	0.00
Female	0	0.00	0	0.00	0	0.00

- Note: 1. The rate of employee turnover by gender and by age group is calculated with the total number of male and female employees as the denominator
  - 2. Turnover rate is calculated based on the actual number of resigned employees (after deducting the number of retirees)
  - 3. Entities of APC, including Taipei HQ and Kaohsiung Linyuan Plant, are all located in Taiwan, thus considered as one region.

#### **Employee Turnover Rate for the Past Three Years** 2.50 2.14 2.00 Turnover Rate 1.80 1.50 1.00 % 0.43 0.50 0.00 2021 2022 2023

### Talent cultivation and development

APC educational training aligns with external environment, business policy, operational goals, department performance, and employee career development needs. It is structured based on accordance with industrial safety environmental protection regulations, as well as the requirements of quality, environmental, energy, and occupational health and safety management systems to provide training courses tailored to the needs of various talents.

The training framework mainly consists of four components: "On-the-job training", "Functional training", "Digital learning", and "Self-improvement". These are organized in a comprehensive and systematic fashion to plot training courses necessary for employee career development, and further extend to the educational training system for lifelong learning. The career development training for active employees can enrich their competencies, skills, and learning capability of employees, which will become the foundation of personal lifelong learning. When employment is terminated due to retirement or resignation, such training can become the skills enabling employees to find new jobs or make retirement planning.



#### **Educational training performance**

APC always value the educational training of employees and arrange orientation training, on-the-job training, and work instructions for employees based on the training needs of employees and their units. We also offer educational training through DVDs and the e-learning platform to improve the competency and skills of employees. Employee training records are kept and taken into account for monthly performance and annual performance evaluation. Additionally, each department sets the standards for "hierarchical" and "functional" training courses to identify the skills required for each position and each working area of employees. These standards serve as references for dispatching training and ensure that employees have the abilities to perform their work.



- · Job instructions by supervisors
- · Master-Apprentice Knowledge Transmission
- · Technological and vocational certification
- · Job rotation



- · Management general education
- · Hierarchical training
- · Professional Competence Training
- · Talent Development
- · Employee self-education



- · New employee orientation training
- · New Employee Certification Courses
- · Multimedia learning platform
- · Leader Campus Learning Platform



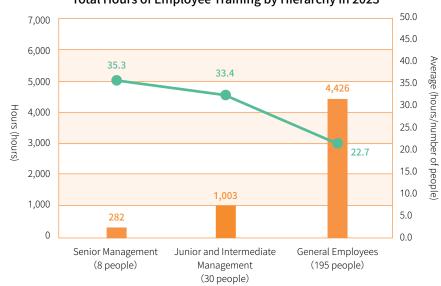
- · Study group
- · Humanities Intellectual Lecture
- · Seminar
- · Health Lecture

In 2023, the total hours of employee training reached 5,711 hours, with an average training time of 24.5 hours per employee. The distribution by gender and employee rank is as shown in the table:





## Total Hours of Employee Training by Hierarchy in 2023



#### **Educational training for new Employees**

The Group has developed a complete orientation training program for new employees to introduce in detail its corporate culture, corporate spirit, the organizational rules and regulations, etc., as to assist in quickly integrating into the corporate working environment and to make contributions, enhance the sense of identity and cohesion to the Company, and confirm the learning effectiveness through the digital training platform of the Group.

The personnel and industrial safety units immediately arrange awareness training courses for new employees of the Plant. These courses include the overview, environment, organization and regulations, welfare system, and labor safety and health regulations of the company, and the concept training on the quality, environmental, energy, and OHS management systems and product, environment, and quality assurance systems.

### On-the-job training

During the employment period, in order to enhance their job functions, employees are provided with relevant job skill training through supervisors and senior colleagues to ensure their ability to perform their duties.

On-the-Job Training (OJT) is carried out by each unit based on job tasks and training needs. The training targets new employees, staff changing jobs, personnel related to process changes, and those who may affect quality, product's environmental quality assurance, those who may significantly impact the environment, those who might face Occupational health and safety risks, as well as those affected by system information updates. The

respective unit should promptly provide job guidance to ensure their capability to perform their duties.

To enhance the process safety management awareness of on-site personnel, ensuring the safety of plant operations, relevant units not only implement training according to the items stipulated in the Labor Safety and Health Education and Training Regulations, but also emphasize operation instructions, repair and maintenance, emergency response, and safety of machinery through job training. Examinations (including written, oral interviews, or practical operation tests) are conducted based on actual needs as a reference for retraining.

Additionally, to ensure that each employee has comprehensive competencies and a broad vision, apart from their own jobs, they also engage in other research projects, including probationary customer complaints, interpersonal relationship development, and problem-solving so as to achieve the purpose of enrich knowledge and improve skills.

The Company arranges educational training courses periodically, including professional skill training, leadership and management, computer, and general education courses, to provide internal training for potential management personnel.

Additionally, the Group Training Department hosts diversified internal training courses at Taipei HQ, accessible to employees across all affiliated enterprises in Northern Taiwan. To align with the e-management of training, we have developed a "Training Manage E-Platform", besides offering diverse services such as training information, course material downloads, online registration, learning records, post-course questionnaires, learning reflections, and training highlights. It also solicits online feedback to evaluate the course effectiveness from the learners' perspective, thereby enhancing and improving the quality of the course.



Situation of Occupational health and safety education and training course





### Performance in external training

Depending on business and job requirements and the need for internal seminar training, supervisors assign related business colleagues to participate in external training and technical discussions with academic institutions and obtain relevant operation certificates in order to enhance technical levels and operation safety. In 2023, APC obtained 203 related operation certificates and licenses (including 28 new certificates and licenses and 175 recurrent training certificates and licenses) through external training. All certificates and licenses were retained by the personnel section for future reference. Moreover, the Company also encourages successor candidates to actively participate in external management training courses to learn the latest management knowledge and thus enhance their management capabilities. We also provide subsidies for employees with strong learning aspirations and development potentials to further their studies in domestic universities, along with the adjustment of their duties for training, in order to cultivate the leadership talents needed by the Company.



#### 2023 External Training Performance

Serial No.	License Type	Number of sheets
1	Class A Wastewater Treatment Specialist	1
2	Training for Emergency Response Personnel to Toxic Chemical Substances (Commander Level)	1
3	Toxic Chemical Hazard Response Personnel Training (Expert Level)	1
1	Fire Safety Manager	3
2	Security Supervisor	2
3	First Aid Personnel OH&S Education	1
4	Supervisor of Hypoxia Operations	1
5	Operators of cranes over three m.t.	3
6	Operators of aerial work vehicles	5
7	Kaohsiung Pipeline Excavation Project Management Personnel	2
8	High-Pressure Gas Container Operation	1
9	Operation of Specific High-pressure Gas Equipment	2
10	High Pressure Gas Manufacturing Safety Chief	1
11	The first type of pressure vessel operation	1
12	Process Safety Assessment Personnel	2
13	Occupational health and safety management personnel	1
Total		28

## **Group Digital Training**

To break free from the constraints of time and space in physical courses, USIG has built a "Group Digital Learning Platform" to provide an environment where employees of all affiliates can learn at any time and anywhere.

### **Employee opinion survey**

APC conducts an Employee Opinion Survey every two years. In August 2023, we commission an independent third party to conduct the survey, which covered Supervisor, Salary, Colleagues, Work, Development, Corporate Culture, Sustainability, and Organizational Commitment eight aspects. The survey was conducted among 233 participants, and the response rate was up to 96%. The aspects of "Sustainability", "Colleagues", and "Work" had the most impressive satisfaction scores.

APC expects to understand the employees' opinions on the company's management operation through the employee opinion survey, find out the key indicators for talent retention, identify the significant item for talent cultivation, carry out talent cultivation projects, and grasp the future manpower pulse.





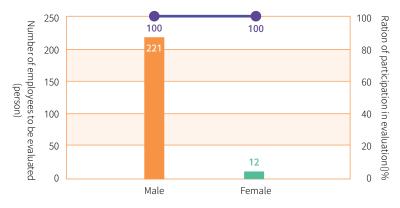
## **5.2** Talent Development

## **Performance evaluation system**

To fairly and reasonably assess the commitment, competency, and contribution of employees to the organization, APC boosts employees' morale and strengthens teamwork spirit through monthly target management and annual performance evaluation, combining them with training and promotions to facilitate individual development of employees and the Company human resource management.

The evaluation items of monthly target management include the workload, work quality, cooperativeness, as well as the implementation performance of the four major management systems and training performance of employees. The annual performance evaluation aims at evaluating the work performance and personal competitiveness (including vision, leadership, implementation, self-development, organizational commitment, innovation, and planning capabilities) of employees. Those eligible for the annual performance evaluation are full-time employees who have successfully completed their probation period. The ratio of male to female employees participating in the performance assessment in 2023 is as shown in the table:

## Ratio of Participation in Performance Evaluation of Women to Men in 2023



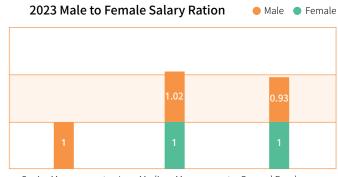
## **Remuneration system**

To attract, retain, cultivate, and motivate excellent talents from all fields, the Company provides a diverse and competitive remuneration system. The starting salary for new employees is higher than the legal minimum wage standard and also adjusted according to the individual's education and experiences, with different position-based allowances, and salary raise based on their work performance regardless of gender. In 2023, the wage ratio for female and male, from low- to mid-level managers and general employees at APC, nearly reached 1, which is more balanced compared to most of our peers. Due to the higher proportion of new male employees in recent years, the average wage of male general employees has been diluted. As female general employees have a higher average service length, their average salary is higher than males.

The table below shows the difference in the number and average and median compensation of non-management full-time employees between 2023 and the previous year.

Item Contents	2022	2023	Difference from the previous year
Number of non-management full-time employees (persons)	216	220	4
Non-management full-time employees Average compensation (NT\$ thousands)	1,490	1,283	-207
Non-management full-time employees Median compensation (NT\$ thousands)	1,407	1,199	-208

The number of employees in 2023 decreased by 1 compared to 2022; The amount of average and median compensation increased mainly because of the salary raise and year-end bonuses.



Senior Management Low-Medium Management General Employees

- Note: 1. The calculation base for females is "1," remuneration including wage, bonuses, and welfare.
  - 2. The aforementioned statistics do not include employees who have been with the company for less than one year.
  - 3. All senior executives of the Company are male, so there is no proportion of female executives.



## Pension System GRI 201-3

The Company handles employee pensions in compliance with the Labor Standards Act, and the pension reserve is contributed based on the Regulations for Employee Retirement, with a contribution rate of 10%.

Apart from setting up the Pension Reserve Supervisory Committee, starting from July 1, 2005, the Company contributes pensions according to the government's stipulations on wage grading charts and contribution rates every month for employees who chose the Labor Pension Act plan to their Individual Labor Pension Accounts at the Bureau of Labor Insurance.

Item Proportion of Contribution		Employee Participation in the Retirement Plan
Pension under the Labor Standards Act (old system)	Employer contribution: 10% of the employee's monthly wage Pension Reserves	100%
Pension under the Labor Pension Act (new system)	Employer contribution: 6% of the employee's monthly wage Employee contribution: 0-6% of the employee's monthly wage	100%

## **Incentive system**

To boost morale and promote teamwork spirit, instant bonuses are awarded to employees who show special performance in their daily work or who can timely response to and proper management of emergencies, as a way to reward them.

Additionally, to encourage employees to engage in improvement activities and stimulate their creativity, we have established the regulations for improvement suggestions. After the acceptance and review of suggestions for optimization and improvement of process technology, product quality, repair and maintenance, engineering, warehousing, production management, and routine operations; improvement of safety and health, environmental protection, energy conservation, and cost reduction, we will issue a monetary reward to the proposing employee based on the level of innovation and performance in improvement.

#### **Diversified Benefits** GRI 401-2

APC places great emphasis on employee benefits, and all employees are entitled to the benefits listed in the table:

Item	Contents
Bonus	Year-end bonus and performance bonus
Leave Benefits	Parental, menstrual, family care, maternity, pregnancy checkup, pregnancy checkup accompaniment, and paternity leaves.
Insurance Benefits	Accidental insurance, life Insurance, employee/dependents group insurance, employee condolence, group injury insurance for business trips
Food Benefits	Employee canteens and meal allowances
Transport Benefits	Employee parking spaces and travel allowances
Entertainment Benefits	Employee gym, employee tours, and regular employee gatherings
Allowances	Subsidies for on-the-job training, domestic/overseas further education
Other benefits	Employee childbirth subsidy, wedding/funeral subsidies, employee tour subsidy, citation for senior employees, bonuses for three major festivals and birthday, periodic health checkups

#### **Insurance Benefits**

Employees are the greatest assets of the Company and the main driver of sustainable operations and development. With this in mind, the Company not only provides Labor Insurance and National Health Insurance as legally required, but also plans an Employees Group Insurance Program for our employees. The contents of the plan covers life insurance, critical illness, accidental injury, occupational accident injuries, cancer treatment, and dependents health treatment benefits, etc., with all premiums borne by the Company (self-financed for dependent). We aim to provide employees proper protections, so that they can dedicate themselves to their work without worries and, thus, strive for higher business performance.



#### Health care benefits

Every year we arrange health checkups (general and special checkups) for employees. We equip Taipei HQ with exercise and fitness equipment and Linyuan Plant with an infirmary and registered nurses to provide employees with heath care, health consultation, and medical assistance. We also organize health promotion activities in coordination with health education institutions and hold Health Lectures from time to time to invite health professionals to educate on the prevention of cardiovascular disease, hypertension, and diabetes to protect the physical and mental health of employees.

We also provide menstruation leave and individual breastfeeding space for female employees, and cooperate with childcare and educational institutions to offer childcare and after-school club services. Parental leave is granted by law to employees with children under three years old. In 2023, no employee applied for it.

To support the government's birth encouragement policy and enrich benefits for employees, we have specifically established the Regulations for Employee Birth Allowance to subsidy employees with NT\$10,000 for each baby, with an increased subsidy rate implemented for twins or more. In 2023, a total of 9 people from APC applied for the childbirth subsidy.

#### Statistics on Employees' Applications and Returns from Parental Leave for 2023 GRI 401-3

Gender		of employees actually taking	Total number of employees due to return to work after taking parental leave		Retention Rate of Employees After Parental Leave
Male	9	0	0	0	 
Female	0	0	0		 

In 2022, no employees applied for parental leave, hence the total number of employees retained 12 months after returning to work following a period of parental leave is 0.

## **Employee Assistance Program**

USIG has established the Employee Assistant Program Service Center (EAPC), promoting services of the Employee Assistance Program, organizing various social activities, providing employees with consultation and counseling, enabling employees to get comprehensive care and assistance in psychological adjustment, career management, health improvement, and quality of life.

#### **Employee Welfare Committee**

APC duly dedicates employee welfare funds in accordance with the Employee Welfare Fund Act. In 2023, it has disbursed employee welfare funds of NT\$10.05 million (accounting for 3.4% of the annual remuneration) for the use of the Employee Welfare Committee as employee travel, birthdays, births, weddings and funerals fund, organize dependent socializing activities, and group medical insurance, all as a way to express gratitude for the hard work of the employees.

In terms of employee activities, we have established 10 employee clubs, including photography, billiards, fishing, darts, tennis, softball, basketball, badminton, road running, and bowling. Guided and sponsor by the company and the Employee Welfare Committee. Employees can relieve their work stress, balance their physical and mental state, and promote their health through these activities and eventually enhance employee morale and enhance organizational commitment.

## **Employees Club Activities**

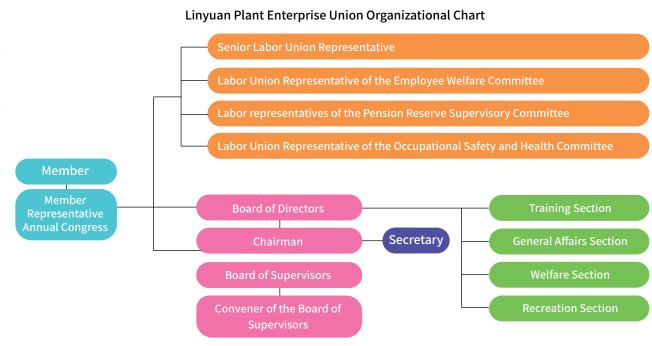
Welfare Association Travel Activity



## **Enterprise Union GRI 2-30**

APC Linyuan Plant Labor Union was established on January 4, 1988, with the aim of promoting mutual assistance and cooperation among members, enhancing members' intelligence, protecting members' rights and interests, assisting in the development of production, promoting harmonious labor-management relations, and assisting in the implementation of government decrees. The labor union holds the "Union Board Meeting" regularly, with the guest attendance of relevant management in the Company to fully discuss and communicate with union representatives in person regarding labor rights and interests, health and welfare, occupational safety, labor conditions, and others. Educational training sessions for labor union members are held every year, in which members participate enthusiastically. This promotes consensus and enhances cooperation between labor and management. As the Company maintains sound communication with employees through the labor union and labor-management meeting, no collective bargaining agreement has been concluded.

In 2023 the labor union had 210 members, including 202 males and 8 females, accounting for about 90% of all employees. The "Supervisory Committee of Business Entities' Labor Retirement Reserve", "Employee Welfare Committee", and "Occupational Health and Safety Committee" are formed by labor and management representatives and hold committee meetings periodically. They provide channels for labor-management communication and maintain the rights and interests of employees. In 2023, 5 "Union Board Meetings", 0 "Special Union Board Meetings", and 1 "General Meeting of Members' Representatives" were held.



## The labor union convenes the General Meeting of Members' Representatives





## Labor union member education workshop









## 5.3 Human Rights Policy GRI 2-23

The Company established a human rights policy on March 22, 2018, to fulfill CSR obligations and protect human rights. This policy is applicable to the Company and USIG affiliates and designed in accordance with the International Bill of Rights, the Declaration on Fundamental Principles and Rights at Work by the International Labour Organization, and other internationally recognized human rights standards, aiming to eradicate behaviors that prejudice and violate human rights. Apart from providing employees with a reasonable and safe workplace environment, we ensure that employees receive fair and dignified treatment at the Company.

## Identification and assessment of human rights risk

We identify human rights risks every year and perform compliance checks and assessment of authenticated human rights topics. Based on the risk assessment results and incidents found in internal and external audits, we adopt mitigation and corrective actions and continue improving to achieve the purpose of risk management.

The Company establishes steps and processes for each stage of human rights management as the foundation for maintenance and protection human rights. These include the following:



Human rights issues involve different business departments and units, and the Human Resources Department performs human rights due diligence for different affected objects and human rights issues and management work.

#### Human Rights due Diligence Process GRI 2-24

Stage	Step	Practice
Stage 1: Commitment	Statement	Make external commitment and support and draw up the human rights policy in compliance with international standards and local laws and regulations.
Identification		Validate material human rights issues and the affected based on the organizational attribute and style of operations.
Stage 2: Management	Assessment and analysis	Periodically assess human rights impacts on all employees and service processes to understand the significance of exposure.
Stage 3: Countermeasures	Action and practice	<ul> <li>Draw up different action plans based on the significance of the periodically assessed human rights risks.</li> <li>Follow up the status and performance of action plans and communicate to ensure the effectiveness of human rights management.</li> <li>If there is a human rights violation, provide compensatory measures through system improvement, physical benefits, and counseling.</li> </ul>
	Report	Discuss and report human rights management within the organization and disclose the practice and effectiveness of human rights management on the corporate website.



## Achievements in human rights management 2023 GRI 2-24

After identifying risks based on the approaches to implement the human rights policy, we included a total of 14 human rights topics for this year, including 8 topics of material concerns, with risks covering "excessive working hours" (2023 Human Rights Risk Assessment Management Sheet). The measures implemented to mitigate and compensate for the impacts of human rights risks are as follows:

Topic	Mitigation Measure	Compensation Measure
Excessive working hours	Overtime is agreed upon by the employees, and after working overtime, employees are free to choose whether to	If there are instances of overtime work by the employees, overtime pay is provided in accordance with the law.
	receive overtime pay or compensatory time off.	2. Understand the workloads and reasons for overtime of employees, and actively carry out process
	The system allows employees to daily select the rea-son for leaving the	improvements and operation optimization to help enhance work efficiency.
	workplace after regular hours, whether it is due to personal matters or official duties.	3. The employees with excessive working hours are included in the list for abnormal workload identification and risk investigation, regular
	3. The HR department regularly reviews the overtime situation of each company and tracks the causes.	employee health checkups are conducted, and related operations and manpower conditions are adjusted as needed.

## **Human Rights Risk Mitigation Measure**

The Company is committed to reasonably ensuring the safety of employees and the workplace environment, respecting the dignity of personnel, dedicated to promoting environmental protection and compliance with laws and ethics. To fulfill this commitment, in addition to maintaining integrity and legally respecting employees, we have assigned dedicated personnel to enforce Occupational health and safety. Besides continuously promote and implement human rights policies into daily practices through education, and have established a reasonable grievance channel.

## **Concerns of Human Rights and Practice**

(1) Providing a safe and healthy workplace environment

The Company has passed the audits and certification for ISO 14001 (Environmental Management System) and ISO 45001 (Occupational Health and Safety Management System), actively promoting energy saving and carbon reduction, disaster prevention, and pollution prevention improvements to ensure a safe working environment.

In addition to providing a safe and healthy working environment as regulated by the law, the Company has established a dedicated Occupational health and safetyunit and committee, employed professional medical doctors and nursing personnel, and regularly conducts safety and health, fire prevention, and other related educational training. We take necessary precautions to prevent occupational accidents from occurring, thereby reducing the risk factors in the work environment.

## (2) Friendly Workplace

Diversity, Equity, Inclusion (DEI)

The Company respects different genders, ages, and cultures to build a friendly workplace environment where everyone can leverage their talents.

Creating a diverse environment that embraces people of different backgrounds, races, genders, sexual orientations, abilities, and perspectives in the workplace; offering equal opportunities and treatment to all employees in a fair and inclusive manner to bridge the gap between different groups, ensuring that each employee is respected and accepted, and able to fully participate and contribute.

Continually promoting gender equality policies and preventing workplace assaults through educational training and publicity, and committed to providing employees with a dignified and friendly working environment.

## (3) Eliminate illegal discrimination to reasonably ensure equal job opportunities

The Company has incorporated human rights policies into its internal control procedures. We practice fairness in labor rights such as recruitment, remuneration welfare, training opportunities, promotions, dismissals or retirement. We do not discriminate against employees or job applicants based on factors such as race, social status, language, thought, religion, political party, native place, place of birth, gender, sexual orientation, age, marital status, pregnancy, appearance, facial features, physical/ mental disabilities, horoscope, and blood type. As of the end of December 2023, we had a total of 233 employees, including 2 persons with disabilities.

#### (4) No child labor

To ensure compliance with corporate social responsibility and ethics and integrity, the Company has stipulated no child labor from the start of recruitment. By the end of December 2023, we have a total of 233 employees, none of who are child laborers.

## (5) Prohibition of Forced Labor

The Company does not force or threaten any personnel who has no intention to perform labor services. Regulations governing employees' daily and weekly normal working hours, extended working hours, holidays, special leaves, and other types of leaves all comply with legal norms.

A reminder function is set in the attendance system for employees to apply for overtime work. Overtime compensation or time-off is provided after overtime work, and dedicated personnel conduct monthly reviews and control of working hours in the plant.

## Assist employees maintain physical and mental health and work-life balance

- The Company provides venues or sponsorship funds, encourages employees to participate in healthy activities, employees form their own clubs, which help to foster camaraderie among colleagues through club activities.
- Besides organizing end-of-year feasts, Mid-Autumn festivals, and other events to alleviate employees' mental and physical stress and consolidate their organizational commitment, the Company also provides sports and fitness equipment for employees to use in their spare time.

To encourage employees to take part in exercise and health management, sports competitions are held irregularly. In the Taipei area, employees were sponsored and encouraged to participate in the "2023 Taipei Tech Cup Charity Road Run" in April 2023, and the beneficial activities for physical and mental health like "Walking Together" were held from October to December 2023.



## Acknowledgment of the Achievements of the Fitness Activity "Walk Together"





#### Training and Practice of Human Rights Protection



#### New employee training

On their arrival, new employees are requested to receive related compliance training, with topics including sexual harassment prevention, no discrimination, no harassment, working hours management, protection of humane treatment, and so on.



#### Preventing workplace violence

Through publicity and notices, we let employees understand their responsibility to assist in ensuring that no unlawful infringements occur in the workplace and disclose the grievance hotline, working together to create a friendly work environment.



#### Training for occupational safety

Contents include OHS educational training, fire safety training, emergency response, and first aid personnel training.



#### Publicizing integrity and ethics

Arrange education and publicity on integrity and ethics in routine work and behavior to build a healthy and positive workplace culture.

The Company continuously concerns with human rights protection and implements relevant training to raise the awareness of human rights protection and lower the likelihood of the relevant risks. In 2023, we held training related to the promotion of human rights protection, with a total of 668 persons participated and the total training hours were 1,728 hours. Please refer to the List of Human Rights Protection Training at APC in 2023 for detailed list of participants and trainings.

## Grievance System GRI 2-25, 2-26

The Company has established unfettered grievance channels for employees to report all types of internal problems to supervisors at all levels or the Human Resources Division. To maintain gender equality at work and provide employees and job applicants with a workplace environment free from sexual harassment and illegal infringements, we have established a dedicated mailbox and email for sexual harassment prevention and illegal infringement prevention. All information will be kept confidential during the investigation. Neither the name nor the data valid for identifying the complainant will be disclosed to ensure complainant protection. For the Human Rights Policy and related practices, please visit the Sustainable Development section on the the Company's website: https://www. apc.com.tw/ESG/zh-tw/ESG51.aspx

## List of Human Rights Protection Training at APC in 2023

Item	Course Name	Person	Total hours
1	[Ethics Lecture] Stop, Look, and Listen to Cybersecurity Traps	64	128
2	[Ethics Lecture] Legal Awareness and Response Required in the Intelligent Era	42	84
3	[Ethics Lecture] Legal Advocacy - Insider Trading and Gender Equality	18	36
4	[Ethics Lecture] Discussion on Preventing Workplace Unlawful Infringement	6	12
5	[Ethics Lecture] Legal Responsibility and Case Analysis of Breach of Trust	1	3
6	Process safety training	16	276
7	Industrial safety training/publicity	2	36
8	Environment protection training	1	24
9	OHS in-service educational training	131	393
10	Emergency Response Drill	35	70
11	Self-Defense Firefighting Team Training	8	48
12	Firefighting Training/Publicity	55	275
13	Special Operations and Cancer Screening Themed Seminar	7	21
14	Promotion of Worker Health Lecture	46	61
15	First Aid personnel and relevant Educational Training in professional nursing	6	31
16	Friendly Workplace - Advocacy for maintaining a work environment free of violence, harassment, and intimidation	230	230
	Total	668	1,728



# **5.4** Healthy Workplace

## **Occupational Health and Safety Operations**

Material Topics: Occupational Health and Safety; Corresponding sustainability principle: Safety and Harmony GRI 2-25, 3-3

Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach	
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment	
The provision of a healthy and safe work environment is a concerned topic for both businesses and laborers. It is APC's responsibility to implement safety and health management and provide a friendly and happy workplace environment for employees and other workers.	Positive actual impact - Creating a friendly workplace environment Positive potential impact - Achieving a happy workplace business.	<ul> <li>Injury Rate(IR): 0</li> <li>Lost Day Rate (LDR): 0</li> <li>Periodic health checkups for employees</li> <li>Physician 's conduct on-site health services for employees 6 times</li> <li>The nurse provides employee health services more than 6 times per month on average.</li> </ul>	<ul> <li>Occupational Health and Safety         Committee meeting is held quarterly             to discuss the implementation status             and progress tracking of safety and             health related improvement incidents     </li> <li>Occupational Health and Safety         Management System Review Meeting     </li> </ul>	
Management Practice and Objectives	Processes to remediate and	2023 Performance	conducts an effectiveness review of	
Implement Occupational health and safety management through routine	prevent negative impacts  Injury Rate (IR): 0 (♥)  Lost Day Rate (LDR): 0 (♥)			the operation of the occupational health and safety management system.
plant tour inspections, health and safety audits, and contractor management to		total of 210 people ( <b>②</b> )  · Physician 's conduct on-site health services for employees 6 times ( <b>②</b> )	Grievance Mechanism	
provide workers with a safe and worry- free workplace environment to achieve the		<ul> <li>The nurse provides occupational health services seven times a month</li> <li>(②)</li> </ul>	Establishing "Procedures for Implementation of Communication	
goal of zero occupational accident.		Short-Term (< 3 years) Goals	and Consultation", the company builds, implements, and maintains channels	
Strategy		· Injury Rate(IR): 0	and procedures for communication,	
Enhance safety prevention     Implementation of Occupational health and safety Management System     Promote the PSM system and crossplant audits		<ul> <li>Lost Day Rate (LDR): 0</li> <li>Periodic health checkups for employees</li> <li>Physician 's conduct on-site health services for employees 6 times</li> <li>The nurse provides employee health services more than 6 times per month on average.</li> </ul>	participation, and consultation on environmental and OHS related topic For detailed operations, please refer the "Environmental Impact Grievance Channels" section descriptions.	
Implement Health Management  · Periodic health checkups for employees		Medium- Long-Term ( ≧ 3 years) Goals Planning	Adjust the management approach	
Contracted physicians conduct on-site health services     On-site health services by the plant's nurse		<ul> <li>Continuously implement the PSM system and introduce it to the management platform</li> <li>Zero accident through underground pipeline safety management</li> <li>Promote comprehensive industrial safety/environmental protection/ fire safety inspection performance indicators in Linyuan Industrial Park</li> </ul>	Through the Occupational Health and Safety Committee meeting, the improvement topics of workers' Occupational health and safety are reviewed in a timely manner.	



#### Occupational Health and Safety GRI 2-23, 2-24, 403-1

By implementing the occupational health and safety management systems in APC Linyuan Plant and coordinating with USIG's "Group Safety and Health Partnership Regional Joint Defense" system, we conduct on-site tour inspections to enforce OHS management through mutual supervision and experience sharing among group all affiliates. Each month we attend the "Linyuan Industrial Park Safety and Health Promotion and Industrial Park Regional Joint Defense" meeting held by the Linyuan Industrial Park Service Center of Ministry of Economic Affairs. Through the exchange of practical experiences among various manufacturers in the industrial park and the concept of regional joint defense, the safety and health within the industrial park are further ensured. In accordance with the Ministry of Economic Affairs' general examination of Linyuan, regulatory compliance checks are carried out for Industrial safety and environmental protection, and fire fighting. Relevant regulatory performance units of measure and lead indicators are established to implement daily checks and consolidate consciousness of Industrial safety and environmental protection, reducing the risks in operational Industrial safety and environmental protection.



APC Linyuan Plant obtained ISO 45001 Occupational Health and Safety Management System certification in 2019 and successfully renewed the certification on May 13, 2022. The validity of the new certificate will expire on April 23, 2025, and it has been passes third-party verification every year. The scope of the management system verification is APC Linyuan Plant and covers both employees and non-employees at the Linyuan Plant. After excluding the employees of Taipei HQ, the employee coverage rate is 90%, and the coverage rate for non-employees (including contractors, outsourced service providers, contractual workers, and visitors who are non-employees, but whose work and/or workplaces are controlled by the organization - hereinafter the same) is 100%. GRI 2-8

The diagram below shows the operation of the management system. Through the plant, do, check, and act (PDCA) cycle, the management system meets the goals of Occupational Health and Safety Management. It continuously inspects and identifies issues, promptly takes corrective actions, establishes a complete occupational health and safety management system, and creates a safe and comfortable working environment to ensure the safety and health of employees and non-employee workers.

#### The process of the occupational health and safety management system at APC Linyuan Plant

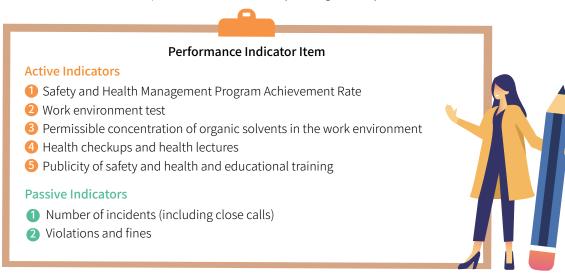
Internal and external issues of the organization Demands and expectations of stakeholders

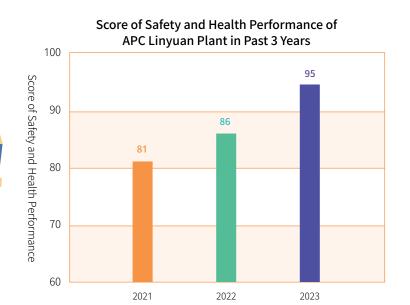


## Occupational Health and Safety Policy

Continuous enhancement of safety and health management (SM) + periodic assessment of safety and health performance (SP) = Provision of a safe and healthy workplace environment for workers (SE)

Performance of the Occupational health and safety management system in 2023:





We scored performance through the self-assessment of active and passive indicators. The total score of safety and health performance in 2023 was 95. As there were a total of 5 close calls disclosed during 2023, a total of 5 points were deducted. Relevant close calls initiated accident investigation procedures and convened meetings to review countermeasures in the same month.

By identifying related hazards and assessing related risks and opportunities within APC Linyuan Plant organization through employee competence and behavior, work, activities, facilities, and changes, we can identify more clearly the hazards of risks required for prioritized handling in the occupational health and safety management systems and the opportunities for early action to improve occupational health and safety performance so as to control risks within the acceptable level and improve occupational health and safety performance. GRI 403-2, 403-9

## Hazard identification and risk and opportunity assessment procedure



## Risk Level = Frequency x Severity x Loss Likelihood

- Frequency, severity, and loss likelihood are divided into five levels by significance
- Unacceptable Risk: Risk level ≥ 30 marks



## Results of Hazard identification and Accident investigation in 2023 GRI 403-2 Unacceptable Risk

Operational activities	Deviation from the Standard C	Control Method	Corresponding action plan and performance
Taiwan Power Company Power Supply	Insufficient power supply or low reliability can lead to frequent outages	Administrative Management	Conducted 4 sessions of emergency response drills every quarter
Equipment was suspended and discontinued	The application for resumption of operations, work procedures, or contents did not meet the government requirements	Administrative Management	Request for assistance from experts, scholars, or government units to meeting the government requirements
Recycle line Xylene Clean-In-Place	Pipelines or equipment are not emptied, diaphragm valves are not closed	Engineering Control	Plan budgets, make modifications, increase online xylene CIP equipment
Reactor (R-1101/R-120) startup	Misuse of incorrect initiator, abnormal activity	Engineering Control	Conditions of reaction for production, regulations on initiator use, and control on storage duration
Reactor (R-1101/R-120) stop	Uncontrolled reaction due to failure to stop the catalyst pump	Administrative Management	Implement scenario simulated drill from time to time each month for operators to get familiar with various situations, organize four emergency response drills each quarter
Formulated initiator	Workplace collapsed	Replacement	Plan budgets for replacement and repair
Routine patrol inspections by personnel	Personnel falling, equipment collapse	Replacement	Plan budgets for replacement and repair
Sample Analysis with Differential Scanning Calorimetry (DSC)	Nitrogen Pipeline Leakage	Engineering Control	Install Oxygen Alarms
Ethylene Underground Pipelines Management	Ethylene leakage in underground pipelines	Engineering Control	Perform regular inspections and flow pressure monitoring alarms every five years
External thickness inspection of pressure vessels and pipelines	Burn risk due to personnel measurement negligence and equipment contact	Personal Protective Equipment	Inspectors are required to wear gloves or use infrared thermometers to check temperatures in advance

## Accident investigation

Type of accident	Situation Description	Corrective Action and Preventive Measures
No accidents occurred in 2023	_	_

## Investment projects and amounts for health and labor force in 2023

Investment Item	Risk Reduction (Equipment and Engineering Improvements)	Professional Training for Personnel (External Training)	Healthcare (Including Health Checks and Physician Consultations)	Employee Welfare Funds
Amount (unit: NTD ten thousands)	3,657	60.7	62.6	1,005
Total amount (unit: NTD ten thousands)		4,7	85.3	

#### Occupational health management GRI 403-3, 403-10 SASB RT-CH-320a.2

APC places great emphasis on the individual health of workers and the impact of the working environment on workers' health. We require new employee training to undertake physical examinations to understand employees' physical conditions, based on which appropriate work is allocated. In addition, we commission hospitals announced by the Occupational Health and Safety Administration to conduct Employee health checkups every year to ensure the physical health of employees, with all expenses borne by the company. In July 2023, four batches of Employee health checkup were carried out at Linyuan Plant, with a total of 210. The graded health management system for special operations health checkups was fully implemented, and the results were reported to the competent authority for record. The graph below shows the health checkup distribution by type:

CH1 Sustainable Development

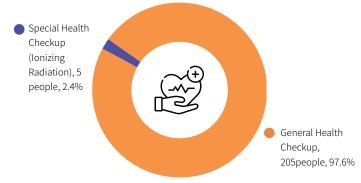
Despite the Employees in high Risk and special operation areas at the Linyuan Plant, there were no workrelated incidents or health hazards occurring in 2023. Moreover, no Work-Related Illnesses were reported. All Employee health checkup results were incorporated into tier 1 or 2 management for tracking. The plant nurse visited the site for care at least 6 sessions per month, and a contracted physicians visited the plant for service every two months, overseeing health checkup results, management, and statistics.

#### APC 2023 Occupational Health and Safety Risk Grading Management Table

Special Health Examination Items	Level 1 Management (Number of Personnel)	Level 2 Management (Number of Personnel)	Level 3 Management (Number of Personnel)	Level 4 Management (Number of Personnel)	Total Number of Personnel		
Ionizing Radiation	0	5	0	0	5	0	0

Health Examination Management	Level 1 Management	Level 2 Management	Level 3 Management	Level 4 Management
Health Examination Results Determination	Normal	Partially abnormal, unrelated to occupation	Abnormal, possibly related to occupation	Abnormal, related to occupation
Management Actions	Providing Health Information	1. Factory doctor provides health guidance. 2. Factory doctor advises against engaging in unsuitable operations.	1. Factory doctor conducts regular health monitoring and guidance 2. Factory doctor assesses operations, reclassifies based on assessment results. 3. Reports to regulatory authorities.	<ol> <li>Implement hazard controls.</li> <li>Improve engineering</li> <li>Enhance operational protection.</li> <li>Enhance administrative management</li> <li>Implement health management measures.</li> <li>Report to regulatory authorities.</li> </ol>

## APC Employee Health Checkup Distribution by Type in 2023



Note: Special health checkups include additional checkup items based on the nature of jobs.

#### APC 2023 Abnormal Workload Triggered Disease Assessment Statistics Form

Section Number of O	verwork ssment L		diovascular WHOz Risk Value	Combined Risk Score	Combined Risk Level
Factory Manager's Office	1	Low Load	10% (1 person)	1	Moderate Risk
Compositing Section	6	Low Load	10% (3 persons), 13% (3 persons)	1	Moderate Risk
Manufacturing Section	3	Low Load	10% (1 person), 16% (1 person), 20% (1 person)	1	Moderate Risk
Instrumentation and Electrical Section	1	Low Load	13% (1 person)	1	Moderate Risk
Quality Control Section	2	Low Load	10% (1 person) \ 13% (1 person)	1	Moderate Risk
Mechanical Maintenance	3	Low Load	10% (2 persons) \ 13% (1 person)	1	Moderate Risk
Environmental Protection Section	1	Low Load	10% (1 person)	1	Moderate Risk
Manufacturing Process Section	1	Low Load	10% (1 person)	1	Moderate Risk
Finished Product Section	1	Low Load	10% (1 person)	1	Moderate Risk

Explanation: 1. Estimation of the WHOz cardiovascular discase risk value over the next 10 years is based on the 2023 health examination data and individual workload.

- 2. Saistical results show a total 19 individuals classifed under "Moderate Rusk," represeming 8.15% of the entire worce.
- 3. Implement health management measures: (I) Recommend lifestyle changes and monitor working hours adjustments, with tracking at least every 3 months.



#### Health promotion GRI 403-6

## Contracted physicians conduct on-site health services



6 times/year, contracted physicians provide on-site health service for employees and non-employees every even month

40 persons, number of employees and non-employees participated in health service

#### **Health Lecture**



49 persons, the number of employees participating in health lectures

Held two employee health lectures in 2023 to provide health consultation service



#### On-site nurse health services

7 times/month, the plant nurses provide health services to employees and non-employees a total of 84 times

## **Employee Club Activities**

280 Persons/Year



As COVID-19 situation eases, various club activities have gradually resumed. Among the 10 clubs established by the Employee Welfare Committee in 2023, 9 have held annual activities, with the number of participants increased compared to the previous year. Participation in these club activities allows employees to relieve work stress and improve their physical health.

#### Worker participation, consultation, and communication on occupational health and safety GRI 403-4

Regular the Occupational Health and Safety Management Review meetings (at least once a year) and Occupational Health and Safety Committee meetings (quarterly) are held. These meetings are attended by the plant director, the chief of the industrial safety office, the tierone/tier-two supervisors of each unit, 6 labor representatives, and the worker representative (1 person, the chairman of the enterprise union), to discuss matters related to OHS management with the goal of achieving zero accidents in occupational safety.

and Safety Management Review Meeting

#### **Meeting participants**

- · Top management level
- · Management Representative
- · Plant director, chief of the industrial safety office
- · Tier-one/tier-two officers, worker representatives

## Occupational Health and Safety Committee 4 times/year

#### **Meeting participants**

- · Committee chief: Director of Linyuan Plant
- · Executive Secretary: Chief of the Industrial Safety Office
- · Committee members: Chief of the Manufacturing Department, Chief of the Technology Department, Chief of the Engineering Department, Labor Representatives, Worker representatives

#### **Review Items**

Occupational Health and Safety Policy, Safety and Health Performance, Hazard Identification results, Management Program, Preventive measures, discussion on the results of emergency response drills, accident investigation, legal compliance review, Improvement of noncompliant items (including internal/external audits), educational training, changes in management systems

#### **Review Items**

- · Performance in procurement, contract undertaking, operation environment monitoring, accident investigation, and employee health promotion
- · Equipment replacement, contractor management, fire equipment management, emergency response drill, health management, and others for improvement



#### OHS Education and Training GRI 403-5, 403-6

The table below shows the hours of OHS education and training of APC Linyuan Plant in 2023:

Educational training and publicity on occupational health and safety are the foundation to enhance the OHS awareness in employees. We have established the "Regulations for Educational Training on Occupational Health and Safety" to arrange training on the related knowledge and skills for all types of employees based on the actual needs. Apart from external training, we also hold various sessions of internal educational training on occupational health and safety in collaboration with the labor union each year. We also commission physicians to deliver "health education lectures" to employees based on the results of health checkups. A total of 705 persons participated in the OHS educational training with total hours of industrial safety training in 2023 were 4,779 hours, including occupational health and safety (3,952 hours) and PSM (827 hours), accounting for about 84% of APC total hours of educational training (5,711 hours) in 2023.

Training Type	Training Participants	Training hours	Compliance rate (%)
On-the-job training for safety and hygiene (including non-employees)	461	3,370	100
Process Safety Management (PSM)	62	827	100
Fire Prevention Training	75	308	100
Underground Pipelines Personnel Training	43	124	100
Health Management Training	47	47	100
Hazardous Chemicals Training	17	103	100

#### Contractor Safety Management GRI 2-8, 403-7

The safety management of contractors and suppliers is very important to Linyuan Plant. Hence, apart from establishing "Regulations for Safety and Health Management of Joint Operations with Contractors" and the "Workplace Health and Safety Rules for Contractors", we also hold the consultative organization meeting to inform contractors of the hazards in the workplace environment and counteractions before their entry for construction. Construction personnel are required to undergo occupational health and safety training before starting work and are only permitted to start construction after passing an examination. This ensures the safety and health of contractors' employees.

Every day the Industrial Safety Office conducts occupational health and safety tour inspection on both employees and non-employees. In 2023 a total of 102 nonconformities were found during on-site tour inspection. Violation of the occupational health and safety regulations in general operation was the most common nonconformity (e.g., content and flow indication, pressure gage anomaly, improper operation checks). By 31 December 2023, a total of 77 nonconformities were corrected, with a completion rate of 75%. The remaining 25 nonconformities were hardware nonconformities, including pipeline and equipment repairs (6 items), fire-resistant covering repairs (6 items), damaged ladder bases (5 items), and operational management (8 items). In consideration of operation safety, corrections can only be made when the whole plant halts.



#### 82 times

Number of consultative organization meetings held before contractors started construction in the plant



#### 102 cases

Number of nonconformities found during occupational health and safety on-site tour inspection



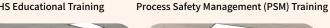
100%

Pre-construction safety and health training rate for construction workers



Rate of completed corrections of nonconformities found in occupational health and safety on-site tour inspection

**OHS Educational Training** 



**Labor Educational Training** 



**Employee Health Lecture** 



Safety and health notice training for contractors Contractors' on-site coordination









## Workers covered by Occupational Health and Safety Management System GRI 403-8

The scope of the Occupational Health and Safety Management System certification is APC Linyuan Plant Area, covering both employees and nonemployee workers.

#### Internal audit

Linyuan Plant has established procedures for "Occupational Health and Safety Audit SOP" and "Process Safety Management Audit SOP". We draw up the internal audit program in accordance with ISO 45001:2018 standards and the Regulations for Periodic Implementation of Process Safety Assessment to audit the management systems regularly. Audit subjects include both employees and non-employee workers.

#### 218 persons

100%

Number of employees at Linyuan Plant

Audit Coverage Rate

#### **External Audit**

Third-party audit unit: SGS

Audit standard: ISO 45001: 2018 edition

#### **11,222 persons**

100%

Number of workers who are non-employees (contractors) work in Linyuan Plant

Audit Coverage Rate

#### Work-related injuries GRI 403-9, 403-10

Work-related injuries statistics in 2023: SASB RT-CH-320a.1

Region	Taipei HQ	Employees	Employees of LinYuan Plant in Kaohsiung		
Gender	Male	Female	Male		
Injury Rate (IR)	0	0	0	0	
Occupational Disease Rate (ODR)	0	0	0	0	
Lost Day Rate (LDR)	0	0	0	0	
Lost Time Injury Rate (LTIR)	0	0	0	0	
Lost Time Injury Frequency Rate (LTIFR)	0	0	0	0	
Number of Cases of Death in the Line of Duty	0	0	0	0	

- Note: 1. Injury (disabling): Calculations include employees could not go to work on the following day after treatment and applied for work-related sick leave or work-related injury with fatalities. Excluding minor injuries (problems solvable by on-site first aid or hospitalization)
  - 2. Days Lost: Calculated from the day after the accident when one cannot work and takes a work-related sick leave, counted by calendar days.
  - 3. Injury rate (IR) = Number of injuries x 200,000 hours worked / total hours worked
  - 4. Lost Day Rate (LDR) = Number of lost days / Total Days (1 working day is calculated as 8 hours)
  - 5. Occupational disease rate (ODR) = Number of employees suffering from occupational diseases / Total number of employees
  - 6. Non-employees, including contractors, visitors and other individuals who are active in the plant. ODR and LDR were excluded because no data was collected.
  - 7. Lost Time Injury Rate (LTIR): Number of lost time injuries per 200,000 hours worked
  - 8. Lost Time Injury Frequency Rate (LTIFR): Number of lost time injuries per million hours worked

## Statistics of disabling injury type for 2023:

Injury Class	I FaⅡ/	Inhalation/ Poisoning/ Hypoxia	Pinch	Burn	Roll	Electric shock	Cut/ Scratch	Noise	Sprain	Impact	Fire Explosion	Falling Object
Employees	0	0	0	0	0	0	0	0	0	0	0	0
Non- Employee Workers	0	0	0	0	0	0	0	0	0	0	0	0

When an incident breaks out, the concerned party should make an emergency response, immediately request for assistance from the supervisor, and secure the integrity of the incident scene. Then, the party concerned should report the causes, status, and process of the incident to the supervisor to start an investigation, submit an incident investigation report, and propose corrective action. After report approval, the supervisor should follow up the corrective action and close the file after corrective action is completed.



#### **Emergency Response Drill**

As a member of the Taiwan Responsible Care Association (TRCA), the safety and health promotion committee and regional joint defense organization of Linyuan Industrial Park, APC organizes fire and underground pipeline emergency response drills every year to develop the emergency response and self-imposed safety management capabilities of employees.

### List of Fire and Underground Pipeline Emergency Response Drills of Linyuan Plant in 2023

Date	Emergency Response Drill Item
April 15, 2023	Self-defense fire brigade formation drills.
May 29, 2023	H1 Self-Defense Fire Safety Taskforce Drilling Plan.(Location: APC Linyuan Plant)
August 18, 2023	Annual Self-Imposed Drill of the 3rd Industrial Pipelines of the Underground Pipelines Organization. (Location: Linyuan No. 11th Park)
November 16, 2023	Annual Self-Imposed Drill of the 3rd Industrial Pipelines of the Underground Pipelines Organization. (Location: Linyuan No. 11th Park)
November 17, 2023	H2 Self-Defense Fire Safety Taskforce Drilling Plan. (Location: APC Linyuan Plant)
November 30, 2023	Self-defense fire brigade formation drills.

### Fire Damage Statistics in the Past 3 Years:

Year	Total Hours Worked (hrs)	Number of Fire Incidents	Number of fire- related injuries	Number of fatalities	Proportion (%)
2021	457,736	0	0	0	0
2022	458,184	0	0	0	0
2023	495,756	0	0	0	0



Fire emergency response drills









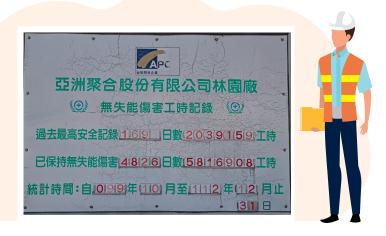






#### No record of disabling injury GRI 403-9

From 14 October 2010 to 31 December 2023, Linyuan Plant accumulated a total of 5,816,908 working hours of zero disabling injury, and the record continues to be maintained.



#### Comparison Table of Disabling Injury Index and Plastics Industry Average:

Item	Disabling Injury Frequency Rate (FR)	Disabling Injury Severity Rate (SR)	Frequency- Severity Indicator (FSI)
Manufacturing Industry of Plastics and Synthetic Rubber	1.04	299	0.55
APC	0	0	0

- Note: 1. Disabling Injury Frequency Rate (FR) = Number of disabling injuries x 1,000,000 ÷ Total hours experienced.
  - 2. Disabling Injury Severity Rate (SR) = Number of days lost due to disabling injuries x 1,000,000 ÷ Total
  - 3. Frequency-Severity Indicator = [ ( Disabling Injury Frequency Rate (FR) x Disabling Injury Severity Rate (SR)) ÷ 1000] ^ 0.5

#### List of Process Safety Emergency Response Drills of Linyuan Plant in 2023

Date	Process Safety Emergency Response Drilling Item
February 10, 2023	Process Power Supply Disruption Emergency Response Drill
May 23, 2023	Ethylene Supply Disruption Emergency Response Drill
September 11, 2023	Process Nitrogen Supply Disruption Emergency Response Drill
October 27, 2023	Tap Water Supply Disruption Emergency Response Drill

### **Process Safety Emergency Response Drill**











## Occupational safety management

Material Topics: Process Safety Management; Corresponding Sustainability Principle: Safety and Harmony GRI 2-25, 3-3

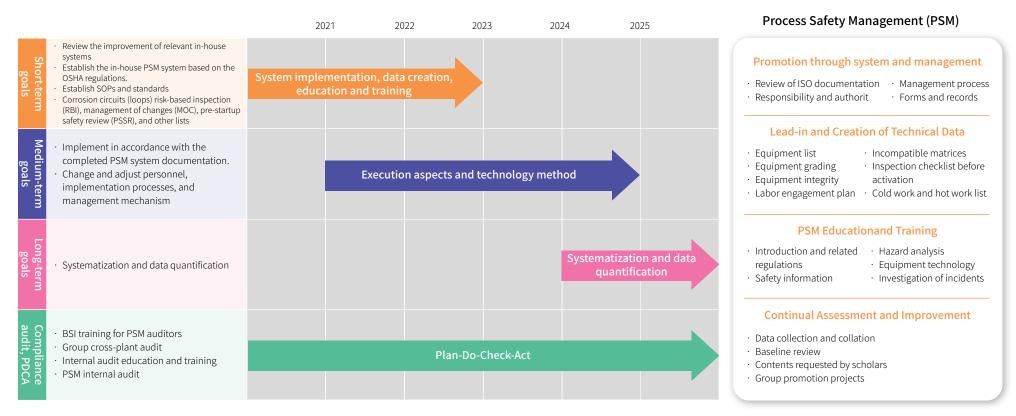
Management Approach and Components	Impact Management	Targets Execution and Performance of Management Approach	Evaluation of Management Approach
Significance to APC	Positive/Negative Impacts	2023 Goals	Effectiveness Assessment
As a class III hazardous workplace, to prevent serious accidents that possess low probability but high risk, APC has strengthened its safety management mechanism in the plant, consistently improved and	Negative actual impact - Process safety management has not been implemented Negative potential impact: Accidents of highly hazardous chemical substances	Process safety incidents 0 case     Information lists required by PSM implementation has reached 97% completion	<ul> <li>Hold the PSM implementation and status meeting and coordination meeting each month.</li> <li>Drafting the PSM implementation monthly report and establishing the commission research project</li> </ul>
executed PSM to satisfy external units and experts' requests for continuous advancement, and strive to		2023 Performance	execution status.  Every month, according to the APC information list
meet expectations for implementing PSM.		<ul> <li>Process safety incidents 0 case (♥)</li> <li>Information lists required by PSM implementation</li> <li>has reached 98% completion (♥)</li> </ul>	that should be established for the PSM introduction tracked by the Group's PdM & ERM Division, a performance system is developed to evaluate and
Management Practice and Objectives	Processes to remediate and prevent negative impacts	has reactive 30% completion (V)	review the monthly data establishment completion rate.
In accordance with the Regulations for Periodic	, , ,	Short-Term (< 3 years) Goals	
Implementation of Process Safety Assessment and the spirit of OSHA PSM, we promote the PSM system,	<ul> <li>The Company has implemented the PSM system, which will prevent accidents through systemic</li> </ul>	· Process safety incidents 0 case	Grievance Mechanism
optimize management mechanisms, aim to reduce the occurrence of highly hazardous risk accidents, and minimize property loss and worker safety of the company.	management.  The Group's Equipment Preventive Maintenance and Environmental Risk Control Division, (PdM & ERM Division) conducts annual audits on the implementation progress of PSM in the plant and	<ul> <li>Pre-startup safety review (PSSR) before PSM start, and incident investigation platform, reached 80%</li> <li>Implement and execute PSM KPI, with an annual goal achievement rate of ≥ 95%</li> </ul>	Report the PSM progress of Linyuan Plant in the executive meeting, plant affairs meeting, and monthly coordination meeting     Provide in-house process safety technical consultation and plan and coordinate items implemented by
Strategy	supervises the performance of PSM.  The relevant information regarding chemicals	Medium- Long-Term ( $\geqq$ 3 years) Goals Planning	
<ul> <li>Implementation and promotion of Process</li> <li>Safety Management (PSM) system</li> <li>Invited group and external experts to provide technical consultation for in-house process safety</li> <li>in the plant is disclosed to employees through the platform, enabling all employees to have basic knowledge of the chemicals and response measures.</li> <li>Process modification cases (MOC), after preliminary</li> </ul>		<ul> <li>All members participate in promoting the PSM system and continue to optimize the PSM system.</li> <li>Gradually introducing the 14-item PSM system, to systematize the management of various execution</li> </ul>	EPdM & ERM Division and consultants to understand implementation needs and reach consensus at all times.
in the plant and ensure implementation with the assistance of each unit to understand work	hazard analysis, those with high risk levels will undergo process hazard analysis (HazOp) and	procedures and related forms.  · Implement the PSM system and reconcile it with existing work in the plant and is continuously	Adjust the management approach
<ul> <li>planning to reach consensus and establish close partnerships.</li> <li>Establishment of process safety performance management</li> <li>Follow up on the progress of PSM implementation and establish the annual PSM KPI management system for the entire plant based on OSHA PSM system and the (PdM &amp; ERM Division'S) policy to enhance work performance.</li> </ul>	undergo process nazard analysis (HazUp) and Layers of protection analysis (LOPA) to ensure process safety.  Before the initiation of new processes or process modifications, Pre-Startup Safety Reviews (PSSR) are conducted. After completion, relevant personnel undergo educational training	<ul> <li>implemented.</li> <li>Implemented PSM compliance audits, with a cycle period of every 3 years.</li> <li>Continue optimizing improvements in response to the Group's cross-plant audits.</li> <li>Reduce the occurrence of catastrophic leaks of highrisk chemicals to achieve the goal of zero accidents in process safety.</li> </ul>	<ul> <li>Report the PSM progress of Linyuan Plant in the executive meeting, plant affairs meeting, and monthly coordination meeting</li> <li>In response to the requirements of external expert committees and ongoing revisions of regulations, this aligns with the direction of PSM implementation desired by external units.</li> <li>Follow the schedule to carry out subsequent work and and reconcile it with existing work in the plant, in order to achieve job internalization and accumulation of work experience.</li> </ul>



#### Process Safety Management (PSM)

Process safety is a critical issue to the global petrochemical sector, and PSM system implementation has become a global trend. Apart from ensuring safe process operation and reducing the loss on unnecessary unexpected operational interruption for a plant, a sound PSM operation can also lower the impact on local communities.

PSM is gradually becoming a trend in the industry. In order to prevent the occurrence of major accidents with low probability and high hazard, PSM is of great importance to APC. In recent years Linyuan Plant has been actively implementing PSM based on OSHA's PSM system and set up short-, medium-, and long-term goals to implement 14 major PSM items.



From 2021 to 2023, APC was committed to the execution of the PSM plan through four major aspects: system management promotion, technical data introduction and establishment, PSM educational training, and continuous evaluation and optimization. Today, the in-house PSM has outperformed the current legal regulations, but we strive to continuously improve towards the group's key projects and the requirements of external expert committees, which is in line with the direction that external units hope for the industry in terms of PSM implementation and the need for continuous improvement in PSM. In 2024, we will strengthen the implementation of the PSM system and reconcile it with existing work in the plant, in order to achieve job internalization and accumulation of work experience.



#### **Process Safety Incidents**

APC established SOPs for initiator operation, personnel educational training, and improved the PSM system to ensure process operation safety.

2023 Process safety incidents in Linyuan Plant, 0 case; Transportation safety incidents, 0 case.

#### Statistics on Process and Transportation Safety Incidents of Linyuan Plant in 2023

Р	Transportation		
PSIC	PSTIR	PSISR	Safety Incidents
0	0	0	0

Note: 1. Total Count of Process Safety Incidents (PSIC)

- 2. Process Safety Total Incident Rate (PSTIR) = (Total number of process safety incidents x [200,000 working hours] / Total hours worked by workers)
- 3. Process Safety Incident Severity Rate (PSISR) = (Total severity score for all process safety incidents x [200,000 working hours] / Total hours worked by workers)
- 4. There was one process safety incident in Linyuan Plant. Based on the process safety index of the Center for Chemical Process Safety (CCPS), the severity level was grade 2, and the total score was one mark
- 5. Total hours worked by workers: Employees 495,756 hours + Non-employee workers (including contractors) 125,456 hours, a total of 621,212 hours. SASB RT-CH-540a.1, 540a.2

#### **Transportation safety management**

The safety management of process operation, raw materials transportation, and product transportation are important to APC, and we have established safety management SOPs for related operations.

### **Raw Materials Transportation**

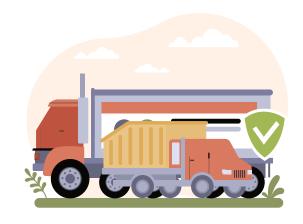
Ethylene and VAM are the major production materials of APC Linyuan Plant. They are transported through underground pipelines and tankers. In consideration of materials transportation safety, most major production materials are transported via underground pipelines, while others are transported by tankers. We have established relevant maintenance measures for the safety management of underground pipelines, such as preventive maintenance, routine tour inspection, anomaly management, and emergency response drills. All tankers used for transportation are required to undergo screening and possess qualified inspection certification, and establish well-planned emergency response procedures and plans, and comply with the relevant control regulations and management measures.

The table below shows the method, quality, and proportion of transportation of major raw materials in 2023:

#### Method of Materials Transportation and Proportion of Linyuan Plant in 2023

Transportation Methods	Quantity (MT)	Proportion (%)
Underground Pipelines	109,548	81.3
Tanker	25,163	18.7

Based on the "equipment maintenance operations" and "safety and health operations" under the internal control system, APC has established the "Underground Pipelines Inspection Work Instructions" to conduct preventive maintenance, routine tour inspection, abnormality management, and emergency response on our underground pipelines within and outside of the plant to prevent corrosion and leakage of underground pipelines. Completed the "2024 Underground Pipelines Maintenance and Operation Plan" and the "2023 General Implementation Report" in 2023, and submitted them to the Economic Development Bureau, Kaohsiung City Government.





In addition to organizing emergency response training and drills, we also actively take the necessary preventive action and implement management programs. The table below shows the major maintenance measures of underground pipelines management of Linyuan Plant:



#### Underground pipeline maintenance management measures

- Underground pipelines are completely covered with corrosion tape and an additional double protection measure of impressed current cathodic corrosion.
- Coordinated with the joint underground pipeline defense organization to allocate and execute daily routine pipeline inspections.
- Outsourcing a professional vendor registered by the government to perform cathode protection potential tests every quarter.
- Periodic pipeline pressure-holding test and real-time system monitoring of the transmission and receiving ends to ensure pipeline operation safety.
- Cooperate with the Industrial Technology Research Institute to develop a Leak Detection Systems (LDS) for underground Pipelines, which monitors the status of the transmission and receiving sections of the underground pipelines in real time.
- Regular pipeline thickness test are conducted on the open conduit pipeline sections.
- Full-length pipeline thickness test according to the test cycle requested by the Selfgovernment Ordinances of Environmental Protection Bureau, Kaohsiung City Government.

The table below shows the methods, quantity, and proportion of product transportation in 2023:

#### Method of Materials Transportation and Proportion of Linyuan Plant in 2023

Transportation Methods	Quantity(MT)	Proportion(%)
Trailers, trucks	31,431	24.1
Container truck	98,921	75.9



#### **Product Transportation Management**

- Legally registered transporters
- Passed ISO 9001 certification with qualified health and safety management personnel.
- Annual evaluation of performance, efficiency, cooperation and quality, and proposals for improvement programs based on customer feedback at the transportation review meeting.
- Transportation contractors' vehicles undergo regular examinations according to the relevant regulations.
- Holding transportation safety meetings quarterly to ensure that contractors can safely deliver products to the destination to minimize environmental impacts caused by transportation.



## **5.5** Social Engagement

APC follows the sustainable vision and goals of the USIG and actively participates in social welfare and community activities. Together with USIG companies (USI, CGPC, and TTC), APC has established the "USI Education Foundation (USIF)." The Foundation aims to engage in educational public welfare activities, focusing on supporting disadvantaged groups, rural areas, and environmental and ecological concerns. It enhances service capacity and effectiveness through scholarships, donations to public welfare organizations, and sponsorship of educational public welfare events.

#### Social welfare

#### By sponsoring the USI Education Foundation for social welfare

In 2023, APC donated NT\$5 million to the USI Education Foundation.

#### Setup scholarships and grants, the Alliance Cultural Foundation

Encourage low-income students to study hard, so that they will have the opportunity to give back to the society in the future, and continue the cycle of love. Resources are also provided for remote townships education and the sustainable development of Hualien and Taitung.

## Taitung Junyi Experimental High School: Realization of education for remote townships

Through "Life Exploration", "Arts and Humanities", and experimental courses combining "International Hospitality, Contemporary Art, Green Energy Architecture", students' innovative thinking and problem-solving abilities are cultivated, realizing the implementation of the education seed cultivation plan for remote townships.

## Invest resources to support domestic cultural development

Through the Alliance Cultural Foundation, we sponsored NT\$1.3 million to assist in the preparation of the opening of the "Paul Chiang Art Center".



By sponsoring the USI Education Foundation, APC supports cultural development and education for the disadvantaged in remote townships. Through education reform, we aim to provide these students with opportunities to turn their lives around and address educational inequality. In addition, we are committed to establishing long-term partnerships with local communities, emphasizing and aiding their development. By assisting in selling local agricultural products, sponsoring community environmental protection activities, etc., so as to promote local development and achieve mutual prosperity with local communities.

## **Community participation**

#### Reduction of GHG emissions, air quality purification, campus greening

Continuously cooperate with Wang Gung Elementary School in Linyuan District on the reduction of GHG emissions matchmaking plan and adoption of air quality purification area, assist in updating energy-saving equipment and campus greening.

### **USI Cup Tennis Championship**

Regular community tennis tournaments are held annually to foster relationships, promote good neighborliness, and understand the needs of community residents.

### Passionate Philanthropy Blood Drive Activity

In order to reserve blood for medical use, jointly respond to blood drive activities organized by the Linyuan Industrial Park Service Center of Ministry of Economic Affairs.

## **Supporting Disadvantaged Groups: Organizing** Charity Softball Games and Basketball Tournaments

USIG jointly organized "Charity Softball Games and Basketball Tournaments" to support public welfare activities and sponsored the Children Are Us Foundation to care for disadvantaged groups.

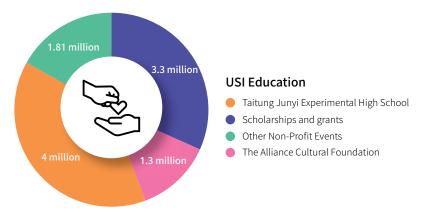


### **Charity Events**

APC donated NT\$5 million to the USI Education Foundation in 2023 to support related public welfare activities. In 2023, the total amount of sponsorships and donations from the USI Education Foundation came to NT\$10.41 million, which included NT\$3.3 million for scholarships and grants; NT\$1.3 million for The Alliance Cultural Foundation, NT\$4 million for Junyi Experimental High School in Taitung; and NT\$1.81 million for various other charity events.

#### Major sponsorships in 2023

Scholarships and grants	Donation to non-profit organizations	Sponsoring educational and philanthropic activities
<ul> <li>Excellence Scholarships</li> <li>Artificial Intelligence</li> <li>Field Scholarships</li> </ul>	<ul> <li>The Alliance Cultural Foundation</li> <li>Taitung Junyi Experimental HighSchool</li> <li>Teach for Taiwan Foundation</li> <li>BOYO Social Welfare Foundation</li> </ul>	<ul> <li>Toufen Junior High School Music Program</li> <li>Beach Cleanup Activity at Longfong Fishing Port</li> <li>Non-Profit Events of Medical and Health Education</li> <li>Epidemic Prevention equipment for medical teaching venues</li> </ul>



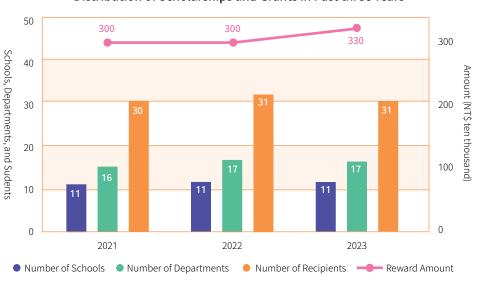
### **Excellence Scholarship**

We offer excellence scholarships to students from low-income families with outstanding performance and specializing in disciplines relating to chemical en-

gineering, materials science, chemistry, and applied chemistry of 15 public and private universities to promote education and talent cultivation in related fields, encourage university students of related disciplines to study hard and cultivate outstanding industrial talent for society. This is the 12th year of the scholarship establishment, with a total of NT\$20 million in scholarships awarded to over 300 students.

In 2023, we offered scholarships and grants of NT\$3.3 million in total (including NT\$300,000 AI Scholarship) to 30 students from 17 departments of 11 public and private universities, including 9 from doctoral programs, 10 from master's programs, and 11 undergraduates, 23 of them were from low-income families. To encourage scholarshipwinning students, the presentation and commendation ceremony was held at the Marriott Hotel in Taipei on December 8, 2023. The Group officers were invited to attend the event to exchange opinions and experience with students, wishing them to keep studying in order to demonstrate positive influence and contribute to society. Finally, Chairman Stanley Yen of the Alliance Cultural Foundation shared his life experience and wisdom, encouraging the awarders to "learn to be a person, learn to live, learn to work", to be "ordinary but not mediocre", and to have the power to enrich their own lives.

#### Distribution of Scholarships and Grants in Past three Years





#### Artificial Intelligence Field Scholarship

To encourage outstanding domestic graduate students to participate in research and development applications in the field of artificial intelligence (AI), bridge the gap between academia and industry, and to cultivate chemical industry talents specializing in AI. The foundation has specifically set up this plan to reward masters and doctoral students whose research topics focus on intelligent production systems, process control, and AI applications aimed at saving energy and costs. The pilot program started in 2022 with a duration of five years. Each awarded student receives a scholarship of NT\$50,000 per semester and can receive continuous support for up to four semesters through regular reviews. So far, a total of 4 students have been awarded.







#### The Alliance Cultural Foundation

To invest more resources in remote townships education and the sustainable development of Hualien and Taitung, the foundation sponsors the Alliance Cultural

Foundation and Junyi Experimental High School on a long-term basis. After overcoming the challenges of the pandemic, the Alliance Cultural Foundation in 2023 not only gradually resumed various projects, but also actively moved towards the "Sustainable Blueprint of Hualien and Taitung" based on past achievements.

The "Sustainable Blueprint of Hualien and Taitung" is tightly connected among the Alliance Cultural Foundation, Taitung Junyi Experimental High School, and the Paul Chiang Art Center. They fully integrate talents and resources to maximize effectiveness. The mission of the Alliance Cultural Foundation is to support the inheritance of indigenous cultures, encourage young people to return to their hometowns, establish local talent, provide resources for skill cultivation, and establish an "ecosphere for a slow pace life between mountains and oceans". On the other hand, Junyi School attempts to improve teachers' professionalism and let students interact with the world by integrating local advantages and sharing the philosophy and practices of the Junyi experimental education. They aim to establish an "educational ecosystem for innovative teaching" and provide a structural approach for establishing innovative models in remote educational areas. The "Paul Chiang Art Center" actively assisted by the Alliance Cultural Foundation in its preparation, is expected to open next autumn. It is hoped that it will become an art landmark connecting the local area with the international community and attract international travelers who have a passion for art and nature to appreciate the uniqueness and diversity of Taitung.



#### Taitung Junyi Experimental High School: Realization of education for remote townships

One of the missions of the Junyi School is to become a base for experimental education in remote townships. The experimental education curriculum is designed with an overall consideration of global educational trends and the uniqueness of the local environment in Hualien and Taitung. The elementary department starts from the Waldorf educational concept, allowing children to learn the ability to perceive art and aesthetics, as well as the ability to live in harmony with nature, from extensive hands-on practice. The senior high school department emphasizes interdisciplinary courses, cultivating students' innovative thinking and problem-solving abilities through experimental courses like "Life Exploration", "Art and Humanities", and "Creativity Module" (including International Hospitality, Contemporary Art, and Green Energy Architecture).

In order to enable Junyi School to serve more students from remote townships, Junyi connects resources and utilizes its campus to host various residential summer camps. This initiative offers children in Hualien and Taitung easy access to diverse learning styles beyond their usual routines. It also allows collegiate volunteers and instructors from all over Taiwan to learn reciprocally with their students as they build connections with Taitung through life experiences. In 2023, there were five camps, including "Huatung Youth Choral Music Camp", "Fruit Art Creation Camp", "Huatung English Art Life Camp", "A Cappella Youth Camp", and "VAFex Vocal Art Camp". Including students, volunteers, and instructors, there were about 800 people in total.

#### Toufen Junior High School Music Program

By integrating with the Harvest 365 Music Program of the Harvest 365 Foundation (Harvest 365), The Alliance Cultural Foundation collaborated with Toufen Junior High School to introduce the Toufen Junior High School Music Education Program in September 2021. The professional choir instructors of Harvest 365 collaborated with the music teachers of Toufen Junior High School to form the Harmony Choir with 7th and 8th graders. The choir has nearly 30 members. Apart from the routine school club time, they also practice after class. It is hoped that vocal art can keep students in company through their growth and motivate students to perform on stage at the annual Harvest 365 music festival so as to develop self-confidence in students.







#### **Sponsoring Other Philanthropic Events**

Other major sponsorships for Philanthropic Events in 2023 included BOYO Social Welfare Foundation, Teach for Taiwan Association, public health and medical education charity activities, and epidemic prevention equipment for medical education sites.

1 Founded in 2002, BOYO Social Welfare Foundation provides free "remedial" instruction" after-school club services for junior high school and elementary school students from low-income families. Additionally, the foundation also provides "care guidance" to remedy learning instability for each child from vulnerable groups to receive an appropriate education environment. The goal of these initiatives is to help these children develop their basic capabilities and social competitiveness, providing them with the opportunity to escape poverty in the future. Every year, BOYO Social Welfare Foundation invests a large amount of labor and resources in curriculum design, develops remedial teaching materials, and trains parents in the community. Currently, there are 17 locations to provide after-school club service for over 2,000 students.

2 Founded in 2013, Teach for Taiwan (TFT) is a non-profit organization caring for "education inequity", hoping to create equal opportunities in education for every child. Through training competent youth with a sense of mission to teach at elementary schools in low-income remote townships communities for at least two years, TFT resolves the long-term problems of teacher shortage and high turnover rate in the remote townships. To date, 355 quality talents have been dispatched to remote townships, touching down in Taitung, Tainan, Pingtung, Yunlin, Hualien, Nantou, and more. They have positively impacted over 6,700 disadvantaged students.

3 Charity events related to medical and health education were greatly affected by the epidemic over the past two years. It was quite challenging for various universities and colleges to organize camp activities. However, as the epidemic has eased, club activities have begun to resume. To encourage medical universities to hold camps, reaching out to remote townships with lack of medical resources, promoting medical care, health education and other charitable services, the foundation sponsored part of the activities' expenses for six medical missions to provide voluntary medical check-ups and health education services in remote townships. The participation count for the six camps has exceeded 300, serving more than 2,400 people.

School	Club	Location	Number of Participants	
Taipei Medical University	Feng Lin Service Team	Kinmen	34	170
	Green Cross Medical Service Team	Sihu Township, Yuanchang Township, Yunlin County	116	217
	114 Medical Service Team	Beigan Township, Nangan Township, Dongyin Township, Juguang Township	35	311
	Hsing Ching Recreational Guidance Social Medical Art Service Team	Jinfeng Township, Taitung County	41	225
	Mountain Social Medical Service Group	Ren'ai Township, Nantou County	70	1,000+
China Medical University	Medical Services Team	Fengbin Township, Hualien County	26	500+







4 To strengthen epidemic prevention and public health in medical education settings and to protect doctors, nurses, medical interns, and patients from exposure to high-infection-risk environments, the Foundation donated "UVC Ultraviolet Central Air Conditioning Sterilizers", which can effectively control the amount of airborne bacteria, to Taipei Medical University. These devices have been installed in the examination rooms, waiting areas, and restrooms of the Orthopedic Outpatient Area on the first floor of the First Medical Building of Taipei Medical University Hospital. The UVC sterilizer is installed in the air conditioning duct, not irradiating towards the human body, but directly disinfecting the air. Through continuous circulation of air in the air conditioning duct, it effectively kills bacteria in the air, which can effectively enhance the safety of medical and teaching environments.





5 Invested resources to support the development of domestic culture. In 2023, the USI Group donated a total of NT\$10 million to the USI Education Foundation (NT\$5 million each from USI and APC), sponsoring cultural development related items totaling about NT\$5.7 million through the USI Education Foundation.

Through a donation of NT\$1.3 million to the Alliance Cultural Foundation, in the face of the challenges brought by the pandemic, the foundation is resuming various programs in 2023 and investing more resources in cultural and art development. The Alliance Cultural Foundation, Junyi Experimental High School, and the Paul Chiang Art Center are closely linked, fully integrating talents and resources to maximize effectiveness, and planning a "Sustainable Blueprint of Hualien and Taitung".

Invested NT\$4 million in supporting Taitung Junyi Experimental High School, aiming to establish it as a base for cultivating future talents and integrating into the work of indigenous culture. Its "Education Seed Cultivation Plan for Remote Townships" has successfully nurtured over 200 students to engage in indigenous cultural work. It aspires for each educational seed to grow with values of "Good Character," "Arts and Humanities," and "Critical

Thinking," with the ultimate goal of returning to indigenous communities as the seed for the future change.

Donated NT\$300,000 to support the Harvest 365 Music Project, in collaboration with Toufen Junior High School in Miaoli County. The professional choir instructors nurtured by the Harvest 365 Foundation collaborated with the music teachers of Toufen Junior High School to educate the Harmony Choir composed of 7th and 8th graders. The team has nearly 30 members. It is hoped that vocal art can keep students in company through their growth and motivate students to perform on stage at the annual music festival so as to develop self-confidence in students.

Sponsored Tainan Philharmonic Orchestra with NT\$100,000, the Tainan Philharmonic Orchestra is committed to Longterm Charity music performances, realized the orchestra's continued Charity touring performances and promoted the exchange of music culture, allowing music to comfort and inspire people.



### **Community participation**

APC Linyuan Plant actively cares about and engage in community charitable activities, such as community environmental protection activities, assist in selling local agricultural products, community socializing activities, community charity events, community sports competitions, and others. Apart from maintaining relationship with community residents, promoting harmony with local communities, and fulfilling our corporate social responsibility. We also hire local workforces to enhance community recognition. In 2023 we hired 73 residents from Linyuan District. In 2023, as the pandemic eased and government epidemic measures were lifted, APC gradually resumed club activities, community sports networking activities, community charitable services, and assisted neighbors in development, with the aim of prospering together with the community.

#### Linyuan Industrial Park - Passionate Philanthropy Blood Drive Activity

In order to secure adequate blood supply for medical use, the Linyuan Industrial Park Service Center of Ministry of Economic Affairs collaborated with Kaohsiung Blood Drive Center to hold a "Passionate Philanthropy" blood donation activity in front of the service center, encouraging plants and employees in Linyuan Industrial Park to participate actively. Plant Director Mr. Hsieh led supervisors and employees from APC Linyuan Plant to participate in a blood drive activity, with a total of 70 people taking part and donating approximately 25,000CC of blood. The event concluded successfully.





#### Cross-departmental GHG reduction collaboration

In response to the "Cross-Departmental GHG Reduction Matching Plan" initiated by the Environmental Protection Bureau of Kaohsiung City, APC Linyuan Plant collaborated with Wang Gung Elementary School to implement a GHG Reduction Program. Assist the school in the upgrade of energy-saving equipment to reduce energy consumption and GHG emissions. The collaboration concluded on November 30, 2023, and both the school and the Environmental Protection Bureau have expressed their gratitude through certificates of appreciation.





Kaohsiung City Wang Gung Elementary School cross-departmental GHG reduction collaboration

### 2023 "Air Quality Purification Area" Management Program by the Environmental Protection Bureau of Kaohsiung City

APC Linyuan Plant supported the "2022 Air Quality Purification Area Management Program" of the Environmental Protection Bureau of Kaohsiung City to improve the air quality and maintain the environment of the whole city to pursue sustainable development and demonstrate the goal as a corporate citizen. Adopted the air quality purification zone base in Linyuan Wang Gung Elementary School to provide the management unit with assistance in environmental and plantation maintenance for a one-year period to the managing unit. The adoption period is from July 19, 2022 to July 18, 2023.





2023 Air Quality Purification Management Program by the Environmental Protection Bureau of Kaohsiung City



#### Sponsor the Children Are Us Foundation Charity Softball Game

To showcase USIG commitment to the social dimension of sustainable development and to participate in charity events, we organized the "USIG Charity Softball Competition". We cordially invited companies from the southern region of USIG, including USI, APC, TTC, TVCM, and CGPCP, to join us in this initiative. The event's meal was served with the Children Are Us Kitchen series lunch boxes, with each plant and the USI Education Foundation collectively sponsoring donations to the "Children Are Us Kitchen Foundation". Through sporting activities, we aim to strengthen camaraderie among our colleagues within the group and encourage active participation in social welfare initiatives. Our goal is to extend warmth and care to vulnerable group within society.





### Assist in the development of Renwu Senior High School's basketball team and care for disadvantaged charity basketball games

In accordance with USIG's plan to promote employee sports exchanges, we organized the "USIG Charity Basketball Games" to respond to charity events and enhance the camaraderie among employees of various companies. The event was hosted and funded by USI. Employees from the five plants in the Southern region of the USIG participated and collectively donated funds to support the development of the Renwu Senior High School team and provide care for disadvantaged players. This initiative encourages employees to actively participate in charity events thorough social engagement.







#### **Ball Game Fellowship**







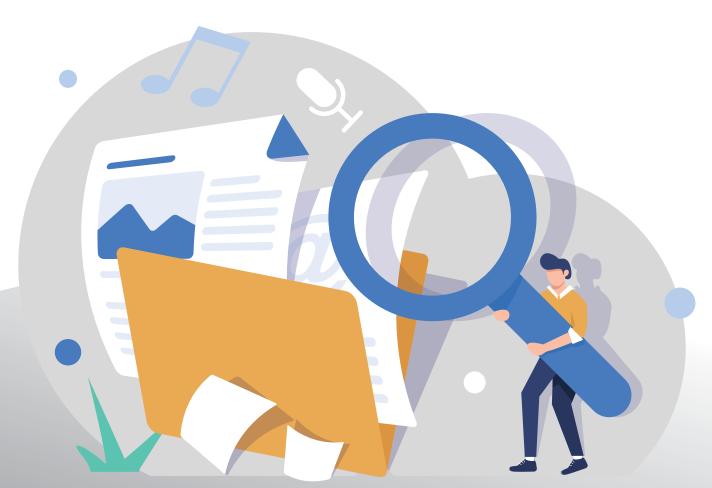


#### The 21st USI Cup Community Tennis Friendship Tournament

USIG along with entities under the same group including TTC and TVCM have commissioned the Linyuan Tennis Association to host the "USI Cup TennisTournament". This event has stepped into its 21st year, aims at promoting friendship and harmony among USIG employees, the industrial park, and community tennis teams through the game, maintaining a harmonious relationship with their neighbors. This serves as an opportunity for communication with stakeholders - community residents, understanding their needs and expectations. The event took place at Linyuan district No. 11 Sports Park Tennis Court on December 16, 2023. It was a wonderful opportunity for everyone to make new friends through sport and all players demonstrated their daily training practice achievements and enjoyed playing with others. The organizing unit also thoughtfully prepared small gifts and encouraged employees to actively participate in community outreach activities and events.

# CH6 Appendix

- 123 GRI Content Index
- 129 United Nations Sustainable Development Goals (SDGs) Contents Index
- **130** SASB Index in Chemicals Industry
- 132 Sustainability Disclosure Indicators Plastics Industry
- 133 Climate-related Financial Disclosures
- **135** Third-Party Assurance Report





# **6.1** GRI Content Index

Statement of Use	Asia Polymer Corporation has reported in accordance with the GRI Standards for the period from January 1, 2023 to December 31, 2023
GRI 1 Usage	GRI 1: Foundation 2021

GRI 2: General Disclosures 2021				
	Disclosure Content			Remarks
	2-1	Organizational details	9	
	2-2	Entities included in the organization's sustainability reporting	<u>3</u>	
The organization and its reporting	2-3	Reporting period, frequency, and contact point	<u>3, 4</u>	
practices	2-4	Restatements of information	<u>3, 64, 75</u>	New disclosure items have been added following verification by a third-party certification body.
	2-5	External assurance	<u>3, 135</u>	
	2-6	Activities, value chain and other business relationships	<u>11, 50, 53</u>	No significant change
Activities and	2-7	Employees	<u>84</u>	
workers	2-8	Workers who are not employees	<u>84, 101</u>	
	2-9	Governance structure and composition	<u>28, 33</u>	
	2-10	Nomination and selection of the highest governance body	<u>28, 29</u>	
	2-11	Chair of the highest governance body	<u>28, 31</u>	
Governance	2-12	Role of the highest governance body in overseeing the management of impacts	<u>17, 29</u>	
Governance	2-13	Delegation of responsibility for managing impacts	<u>33, 34</u>	
	2-14	Role of the highest governance body in sustainability reporting	<u>21, 34</u>	
	2-15	Conflicts of interest	<u>31</u>	
	2-16	Communication of critical concerns	<u>29, 35</u>	

		GRI 2: Gener	al Disclosures 2021	
		Disclosure Content	Page No.	Remarks
	2-17	Collective knowledge of the highest governance body	<u>29, 30</u>	
	2-18	Evaluation of the performance of the highest governance body	<u>31</u>	
Governance	2-19	Remuneration policies	<u>33</u>	
	2-20	Process of determining remuneration	<u>33</u>	
	2-21	Annual total compensation ratio	<u>33</u>	
	2-22	Statement on sustainable development strategy	<u>3</u>	
	2-23	Policy commitments	<u>13, 42, 54, 67, 72, 96, 101</u>	
	2-24	Embedding policy commitments	<u>14, 42, 55, 66, 72, 97, 101</u>	
Strategy, policies and practices	2-25	Processes to remediate negative impacts	37, 44, 46, 53, 61, 63, 66, 79, 86, 99, 100, 110	Material topics management impact, Processes to remediate and prevent negative impacts, Grievance mechanism
	2-26	Mechanisms for seeking advice and raising concerns	43, 44, 99	Ethical Corporate Management, Grievance Mechanism
	2-27	Legal compliance	<u>42, 43</u>	Legal compliance, penalty for violations events
	2-28	Membership of associations	<u>12</u>	
	2-29	Approach to stakeholder engagement	<u>17-20</u>	
Stakeholder Engagement	2-30	Collective bargaining agreements	<u>95</u>	Descriptions: As the Company maintains sound communication with employees through the labor union and labor-management meeting, no collective bargaining agreement has been concluded.

			Topic Disclosures						
Material Topics Management approach and disclosures Page No. Remarks									
Category: Gove	rnance								
		3-1	Process of Determining Material Topics	<u>21</u>					
	GRI 3: Management Approach 2021	3-2	List of material topics	<u>24</u>					
		3-3	Management of material topics	37					
Economic Performance		201-1	Direct economic value generated and distributed	<u>38, 47</u>	Financial performance, R&D outcomes				
renormance	GRI 201: Economic	201-2	Financial implications and other risks and opportunities due to climate change	<u>68-72</u>					
	Performance 2016	201-3	Defined benefit plan obligations and other retirement plans	93	Pension system				
		201-4	Financial assistance received from government	40					
	GRI 3: Management Approach 2021	3-1	Process of Determining Material Topics	<u>21</u>					
Technology		3-2	List of material topics	<u>24</u>					
R&D		3-3	Management of material topics	<u>46</u>					
	Non-GRI Standards top	oic, APC spe	ecific topic	47					
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	GRI 3: Management Approach 2021	3-2	List of material topics	<u>24</u>					
	la l	3-3	Management of material topics	<u>53</u>					
Supply Chain Management	GRI 308: Supplier	308-1	New suppliers that were screened using environmental criteria	<u>56</u>	Indicators for screening new suppliers				
J	Environmental Assessment 2016	308-2	Negative environmental impacts in the supply chain and actions taken	<u>55</u>	Supply Chain Risk, Impact and Preventive Measures				
	GRI 414: Supplier	414-1	New suppliers that were screened using social criteria	<u>56</u>	Indicators for screening new suppliers				
	Social Assessment 2016	414-2	Negative social impacts in the supply chain and actions taken	<u>55</u>	Supply Chain Risk, Impact and Preventive Measures				

	Topic Disclosures								
Material Topics	Material Topics Management approach and disclosures Page No. Remarks								
Category: Envir	onmental								
	CDI 2 M	3-1	Process of Determining Material Topics	<u>21</u>					
	GRI 3: Management Approach 2021	3-2	List of material topics	<u>24</u>					
Raw material		3-3	Management of material topics	<u>61</u>					
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	GRI 301: Materials 2016	301-2	Using recycled and reused materials.	<u>62</u>	Material usage and recycling				
		301-3	Reclaimed products and their packaging materials	<u>62</u>	Product Packaging Use and Recycling				
	GRI 3: Management Approach 2021	3-1	Process of Determining Material Topics	21					
		3-2	List of material topics	<u>24</u>					
Climate		3-3	Management of material topics	<u>66</u>					
change		302-1	Energy consumption within the organization	<u>75</u>					
and energy management		302-2	Energy consumption outside of the organization	_	Unable to conduct energy audits on the supply chain				
	GRI 302: Energy 2016	302-3	Energy intensity	<u>75</u>	Unit Product Energy Consumption				
	20.0	302-4	Reduction of energy consumption	77	Energy Saving Actions and Benefits				
		302-5	Reductions in energy requirements of products and services	_	The Comapny Product Lifecycle has NA energy consumption				
		3-1	Process of Determining Material Topics	21					
	GRI 3: Management Approach 2021	3-2	List of material topics	24					
Water resources		3-3	Management of material topics	<u>63</u>					
management	CDI 202, Mataria a	303-1	Interactions with water as a shared resource	<u>64</u>	Impacts of water acquisition, consumption, and discharge				
	GRI 303: Water and Effluents 2018	303-2	Management of water discharge-related impacts	<u>64, 65</u>	Effluent Management and Standard				
		303-3	Water withdrawal	<u>64</u>					

			Topic Disclosures					
Material Topics Management approach and disclosures Page No. Remarks								
Category: Envir	onmental							
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	CDI 2 Management	3-1	Process of Determining Material Topics	<u>21</u>				
	GRI 3: Management Approach 2021	3-2	List of material topics	<u>24</u>				
		3-3	Management of material topics	<u>79</u>				
		305-1	Direct GHG Emissions (Scope 1)	<u>76</u>				
Air pollution	GRI 305: Emissions 2016	305-2	Energy indirect GHG emissions (Scope 2)	<u>76</u>				
control		305-3	Other indirect GHG emissions (Scope 3)	77				
		305-4	GHG emissions intensity	<u>76</u>				
		305-5	GHG emission reductions	77				
		305-6	Emissions of ozone-depleting substances (ODS)	80				
		305-7	Emissions of nitrogen oxides, sulfur oxides and other significant gases	80				
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Issue)		306-5	Direct Disposal of Waste	<u>81</u>				
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attraction and	GRI 3: Management Approach 2021	3-2	List of material topics	<u>24</u>				
retention	Αρρισασίι 2021	3-3	Management of material topics	86				

			Topic Disclosures		
Material Topics		Management	approach and disclosures	Page No.	Remarks
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attraction and retention	GRI 3: Management Approach 2021	401-2	Benefits provided to full-time employees (not include temporary or part-time employees)	<u>93</u>	
retention		401-3	Parental leave	<u>94</u>	
		3-1	Process of Determining Material Topics	<u>21</u>	
	GRI 3 Material Topics 2021	3-2	List of material topics	<u>24</u>	
	·	3-3	Management of material topics	<u>100</u>	
		403-1	Occupational Health and Safety management system	<u>101</u>	
		403-2	Hazard identification, risk assessment, and incident investigation	<u>102, 103</u>	
Occupational		403-3	Occupational health services	<u>104</u>	
Health and		403-4	Worker participation, consultation, and communication on Occupational Health and Safety	<u>105</u>	
Safety	GRI 403: Occupational	403-5	Worker training on Occupational Health and Safety	<u>106</u>	
	Health and Safety 2018	403-6	Promotion of worker health	<u>105, 106</u>	
		403-7	Prevention and mitigation of Occupational Health and Safety impacts directly linked by business relationships	<u>48, 56, 57, 106</u>	
		403-8	Workers covered by an Occupational Health and Safety management system	<u>107</u>	
		403-9	Work-related injuries	<u>107, 109</u>	
		403-10	Occupational disease	<u>104, 107</u>	
		3-1	Process of Determining Material Topics	<u>21</u>	
Process Safety	GRI 3 Material Topics 2021	3-2	List of material topics	<u>24</u>	
Management	'	3-3	Management of material topics	<u>110</u>	
	Non-GRI Standards to	opic, APC spec	ific topic	<u>111</u>	



## 6.2 United Nations Sustainable Development Goals (SDGs) Contents Index

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Economic Performance	Economic Performance SDG 8.2 Innovation enhances economic capacity		<u>37</u>	2.2 Economic Performance	
	SDG 9.5	Increase in R&D expenditure	4E 47	24 Table a la ma DOD	
Technology R&D	SDG 9.b	High value-added to innovative R&D products	<u>45, 47</u>	3.1 Technology R&D	
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Water resources management	SDG 6.3, 6.4, 6.5	Implement integrated water resources management, control of effluent quality and recycling and reuse, and improve water use efficiency.		4.1 Resource Management	
_	SDG 12.2	Efficient use of natural resources	<u>63</u>		
	SDG 7.3	Enhance energy efficiency	<u>74</u>		
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A:	SDG 11.6	Reduction of harmful environmental substances, proper waste management	79	4.3 Emissions Management	
Air pollution control	SDG 12.4	Reduce air pollutants, waste, and impact on human health and environment	15		
Social					
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retention	SDG 8.5	Equal pay for equal work		5.3 Human Rights Policy	
	SDG 8.7	No child labor, no oppressing of labor.	104, 106		
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	SDG 8.8	Protect labor rights and promote workplace safety	<u>107, 109</u>		
Process Safety Management SDG 3.9 Reduce the Frequency-Severity Indicator (FSI) of deaths and diseases caused by hazardous chemicals and pollutants		110	5.4 Healthy Workplace		

## **6.3** SASB Index in Chemicals Industry

Code	Disclosure Content	Performance and Description	Corresponding Section (Material Topics)	Page No.
Metric for Di	sclosure: Greenhouse Gas Emission			
RT-CH-110a.1	Scope 1 GHG emissions (Mt CO <sub>2</sub> e); Percentage of Scope 1 GHG emissions covered under emissions-limiting regulations (%)	The Scope 1 GHG emissions in 2023 were 10,275Mt ${\rm CO_2}$ e, accounting for 9.5%	4.2 Climate Change and Energy Management	<u>76</u>
RT-CH-110a.2	Discussion of strategy or plan to manage Scope 1 emissions, emissions reduction targets and an analysis of performance against those targets	Through the ethylene recovery system, ethylene from both in-house and exter-nal pipelines is recovered to the production line, and an added composite fuel steam boiler treats the waste oil and tail gas from the process, reducing GHG emissions.	4.3 Emissions Management (Air pollution control)	<u>80</u>
Metric for Disc	closure: Air Quality			
RT-CH-120a.1	Air emissions of the following pollutants: (1) Nitrogen Oxides (NOx); (2) Sulfur Oxides (SOx); (3) Volatile Organic Compound (VOCs); (4) hazardous air pollutants (HAPs)	Air emissions of pollutants in 2023: (1) NOx: 5.3MT (2) SOx: 3.9MT (3) VOCs: 32.8MT (4) HAPs: 0.583MT (Vinyl Acetate Monomer, VAM)	4.3 Emissions Management (Air pollution control)	80
Metric for Disc	closure: Energy Management			
RT-CH-130a.1	(1) Total energy consumed (GJ); (2) Percentage of grid electricity usage (%); (3) Percentage of renewable energy usage (%); (4) Total self-generated energy (GJ)	Total energy consumed in 2023 (1) was 805,494 GJ; (2) Electricity energy usage was 695,742 GJ, accounting for 86.4% (3) Percentage renewable usage 0% (4) Self-generated energy (solar PV) 2,017 GJ	4.2 Climate Change and Energy Management	<u>75</u>
Metric for Disc	losure: Water Management			
RT-CH-140a.1	(1) Total water withdrawn (2) Total water consumption (3) Percentage of operational bases located in "high" or "extremely high" water-stressed regions and the proportion of (1) and (2)	2023 (1) Total Total water withdrawn 489.730 thousand M <sup>3</sup> ; (2) Total water consumption 324.176 thousand M <sup>3</sup> (3) Use of the water risk assessment tool of the World Resources Institute (WRI), Linyuan Plant is not location in regions with "high" or "extremely high" water scarcity region	4.1 Resource Management (Water resource management)	<u>64</u>
RT-CH-140a.2	Number of incidents of non-compliance associated with water quality permits, standards and regulations	All items of discharge water quality control tests in 2023 are within the qualified range, with no violations of discharge permission incidents.	4.1 Resource Management (Water resource management)	<u>65</u>
RT-CH-140a.3	Description of water management risks and discussion of strategies and practices to mitigate those risks	Planned to cooperate with the government's wastewater recycling policy, partly adopting the reclaimed water from the wastewater recycling plant developed by the government as the plant's water supply, achieving a win-win advantage for both the government and corporations.	4.1 Resource Management (Water resource management)	<u>65</u>
Metric for Disc	closure: Hazardous Waste Management			
RT-CH-150a.1	Amount of hazardous waste generated, percentage recycled	General waste is properly handled by qualified companies approved by the Ministry of Environment     There was no hazardous waste generated at the Linyuan Plant in 2023.	4.3 Emissions Management (Non-Material Topic)	<u>82</u>

Code	Disclosure Content	Performance and Description	Corresponding Section (Material Topics)	Page No.
Metric for Disc	losure: Workforce Health & Safety			
RT-CH-320a.1	(1) Total recordable incident rate (TRIR) formula: (Number of Incidents x 200,000)/Total Hours Worked; (2) Fatality rate: (a) direct employees; (b) contract employees	The Total recordable incident rate (TRIR) in 2023 was 0     The fatality rate for both direct employees and contract employees was 0	5.4 Healthy Workplace (Occupational Health and Safety)	107
RT-CH-320a.2	Description of efforts to assess, monitor and reduce exposure of employees and contract employees to long-term (chronic) health risks	<ol> <li>Linyuan Plant arranged four sessions of health checkups for a total of 210 employees in July 2023 and implemented special health checkups and graded management.</li> <li>The results show that there was neither occupational accident nor health hazard, and all employees needed tier 1 and 2 health management based on the health checkup results.</li> </ol>	5.4 Healthy Workplace (Occupational Health and Safety)	104
Metric for Disc	losure: Safety & Environmental Stewardship of Chemical			
RT-CH-410b.1	Percentage of products that contain Globally Harmonized System of Classification and Labeling of Chemicals (GHS) Category 1 and 2 Health and Environmental Hazardous Substances (%), percentage of such products that have undergone a hazard assessment (%).	All APC products comply with the relevant legal and regulatory requirements and contain no Health and Environmental Hazardous Substances as categorized in the Globally Harmonized System (GHS).	3.1 Technology R&D	<u>52</u>
RT-CH-410b.2	Discussion of strategy to manage chemicals of concern and develop alternatives with reduced human and environmental impact	Consider the legal and regulatory requirements such as FDA, CNS, JIS, and EU RoHS right from the feasibility assessment of product development to ensure compliance with the standards, regulations, and laws governing human health and environmental impact.	3.1 Technology R&D	48
Metric for Disc	losure:Genetically Modifier Organism			
RT-CH-410c.1	Percentage of products by revenue that contain genetically modified organisms	APC product falls under plastic materials and does not contain genetically modified organisms	Not applicable	_
Metric for Disc	losure: Management of Legal & Regulatory Environment			
RT-CH-530a.1	Discussion of the Company positions related to government regulations and/or policy proposals that address environmental and social factors affecting the industry	In day-to-day operations, the company constantly monitors and collects informa-tion from government agencies regarding the establishment and amendment of regulations on governance, labor rights, environmental protection, Occupational Health and Safety, and other environmental, social, and governance aspects. It identifies the compliance of these regulations with company operations, updates relevant documents, and conducts risk management or regulatory enforcement.	2.3 Legal compliance (Non- Material Topic)	<u>42</u>
Metric for Disc	losure: Operational Safety, Emergency Preparedness & Response			
RT-CH-540a.1	Process Safety Incidents Count (PSIC), Process Safety Total Incident Rate (PSTIR), Process Safety Incident Severity Rate (PSISR)	Process Safety Incidents Count (PSIC) in 2023: 0 incident Process Safety Total Incident Rate (PSTIR): 0 Process Safety Incident Severity Rate (PSISR): 0	5.4 Healthy Workplace (Process Safety Management)	112
RT-CH-540a.2	Number of transport incidents	Transportation safety incidents in 2023: 0 incident	5.4 Healthy Workplace (Process Safety Management)	112

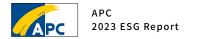


# **6.4** Sustainability Disclosure Indicators — Plastics Industry

No.	Indicator	Indicator Type	Annual Disclosure	Unit	Corresponding Section	Page No.
1	Total energy consumption, percentage of purchased electricity, utilization rate(renewable energy/total energy), and total self-generated and self-use energy	Quantitative	<ul> <li>(1) Total energy consumption: 805,494</li> <li>(2) Percentage of purchased electricity: 86.4</li> <li>(3) Utilization rate (renewable energy/total energy): 0</li> <li>(4) Total self-generated and self-use energy: 0</li> </ul>	GJ (%) (A) GJ	4.2 Climate Change and Energy Management	<u>75</u>
2	Total water withdrawn and total water consumption	Quantitative	(1) Total water withdrawn: 489.730 (2) Total water consumption: 324.176	Thousand M <sup>3</sup>	4.1 Resource Management	<u>64</u>
3	Total hazardous waste generated, and percentage recycled	Quantitative	<ul><li>(1) Total hazardous waste generated: 0</li><li>(2) Percentage recycled: Not applicable</li></ul>	MT (%)	4.3 Emissions management	<u>81</u>
4	Number of employees in and rate of occupational accidents	Quantitative	(1) Number of employees in occupational accidents: 0 (2) Rate of occupational accidents: 0	Person (%)	5.4 Healthy Workplace	<u>107</u> <u>109</u>
5	Production by product category	Quantitative	<ol> <li>Low Density Polyethylene (LDPE), Production: 31,929</li> <li>Ethylene Vinyl Acetate Copolymer (EVA), Production: 100,312</li> <li>Total Production: 132,241</li> </ol>	MT	1.1 About Asia Polymer	<u>11</u>

# **6.5** Climate-related Financial Disclosures

No.	ltem		Implementation Status					
1	Describe the supervision and governance of climate-related risks and opportunities by the board of directors and management.	directors, it repo Management Me	The ESG Committee supervised by the Board is the highest governance body of climate change management chaired by independent directors, it report the climate change implementation planning and performance to the Board every year. The Operations Management Meeting is held monthly and chaired by the Board Chairperson to report the planning and results of material energy conservation and carbon reduction plans.					
2	Describe how the identified climate risks and opportunities impact the organization's	Based on the likelihood and impact of climate-related risks and opportunities, we identified 6 major climate-related risks and 4 major climate-related opportunities and assess the duration of impact and potential financial impacts as tabulated below:						
	businesses, strategies, and financial plan (short- term, medium-term, long-term)	Category	Related Item		Du	ration		
		Physical risk	Flood inundation		Medium-te	erm (3-7 years)		
		Thysicathisk	Drought		Short-ter	rm (<3 years)		
		Transition risk	Carbon Fee		Short-term (<3 years)			
			Renewable Energy Regulations - Risk of Energy-heavy Industries Clause		Short-term (<3 years)			
			Transition of low-carbon technology		Short-term (<3 years)			
			Increased raw materials price		Short-term (<3 years)			
		Category	Related Item	Dev	velopmental	Technical Feasibility		
			High-efficiency production		and aligned with the icies of the company	Expanding development		
		Opportunity	Reduce water usage and water consumption	Progressive existing poli	and aligned with the icies of the company	Matured		
			Use low-carbon energy		and aligned with the icies of the company	Matured		
			Development of Low Carbon Goods and Services - Entry into Renewable Energy Market	Progressive existing poli	and aligned with the icies of the company	Expanding development		



No.	ltem	Implementation Status				
3	Describe the financial impact by extreme weather events and transition.	The financial im	The financial impacts of extreme weather events and transition actions are tabulated below:			
		Category	Related Item	Potential Financial Impact		
			Increased severity of extreme weather events	Increased capital expenditure and decrease in asset value		
		Physical risk	Changes in precipitation patterns and extreme variability in weather patterns	Increased capital expenditure and decrease in revenue		
			Sea level rises	Increase in capital expenditure		
		Transition	Enhance GHG Emission Pricing	Increase in operating costs		
		risk	Raw material cost rises	Increase in operating costs		
			Participation in renewables projects and adoption of energy conservation measures	Upfront costs were high, while later carbon emissions were low and operating costs were reduced		
			Alternative energy / energy diversification	The initial investment cost was high, but the operating costs decrease yearly in the later period		
		Opportunity	Participation in carbon trade	The initial investment in carbon reduction technology was high, but the operating costs decrease yearly afterwards		
			Use low-carbon energy	The initial investment cost was high, but the operating costs decrease yearly in the later period		
4	Describe how to integrate the process for identifying, assessing, and managing climate risks into the overall risk management system	Identify risks and opportunities based on the TCFD framework, communicate with all responsible units, and confirm by senior management every 3 years. Include them in the annual risk assessment. The president reports the risk control measures and management performance to the Audit Committee and the Board every year.				
5	When analysis and evaluate resilience to climate change risk on a scenario basis.  Describe should include the scenario, parameters, assumptions, analysis factors, and key financial impacts used.	No scenario ana analysis in two y	-	nce in climate-related risks. We will include scenario		
6	If there is a transition strategy in place to address climate-related risks, please describe the content, the indicators and targets utilized to identify and manage physical and transition risks	Plans include: Equipment replacement, construction of renewables facilities, optimization of production scheduling, planning building aircon, energy management systems, extreme weather events contingency plans. Please refer to 4.2 Contents of this report for the details.				
7	If internal carbon pricing is used as a planning tool, the basis for price determination should be explained.	No assessment	tool for internal carbon pricing has been use	ed.		
8	If climate-related targets are established, details should be outline regarding the covered activities, the scope of GHG emissions, the projected timeline, and the progress achieved annually, etc. If carbon offsets or Renewable Energy Certificates (RECs) are used to meet these targets, the source and quantity of carbon offset credits or Renewable Energy Certificates (RECs) should be disclosed.	Set 2017 as the baseline year and reduction by 27% by 2030 as the carbon reduction target. Every year we disclose the data of Scopes 1 and 2 GHG emissions in the ESG report and review the achievement progress periodically. No REC has been used for carbon reduction so far.				
9	GHG inventory and verification.	Please refer to Section 4.2 of this report for the details and assurance information on the GHG inventory.				

## 6.6 Third-Party Assurance Report

## Deloitte.

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#### INDEPENDENT AUDITORS' LIMITED ASSURANCE REPORT

Asia Polymer Corporation

We have undertaken a limited assurance engagement on the selected performance indicators in the Sustainability Report ("the Report") of Asia Polymer Corporation ("the Company") for the year

#### Subject Matter Information and Applicable Criteria

See Appendix 1 for the Company's selected performance indicators ("the Subject Matter Information") and applicable criteria.

#### Responsibilities of Management

The management of the Company is responsible for the preparation of the Subject Matter Information in accordance with Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies, Universal Standards, Sector Standards and Topic Standards published by the Global Reporting Initiative (GRI), and the criteria specifically designed by the Company, and for such internal control as management determines is necessary to enable the preparation of the Subject Matter Information that are free from material misstatement resulted from fraud or error.

#### Auditors' Responsibilities

Our responsibility is to plan and conduct our limited assurance engagement in accordance with Standard on Assurance Engagement 3000 "Assurance Engagements Other than Audits or Reviews of Historical Financial Information" issued by the Accounting Research and Development Foundation of the Republic of China to issue a limited assurance report on whether the Subject Matter Information (see Appendix 1) is free from material misstatement. The procedures performed in a limited assurance engagement vary in nature and timing from, and are less in extent than for, a reasonable assurance engagement and, therefore, a lower assurance level is obtained than a reasonable assurance

We based on our professional judgment in the planning and conducting of our work to obtain evidence supporting the limited assurance. Because of the inherent limitations of any internal control, there is an unavoidable risk that even some material misstatements may remain undetected. The procedures we performed include, but not limited to:

- Inquiring of management and the personnel responsible for the Subject Matter Information to obtain an understanding of the policies, procedures, internal control, and information system relevant to the Subject Matter Information to identify areas where a material misstatement of the subject matter information is likely to arise.
- Selecting sample items from the Subject Matter Information and performing procedures such as inspection, re-calculation, and observation to obtain evidence supporting limited assurance.

- 1 -

#### Inherent Limitations

The Subject Matter Information involved non-financial information, which was subject to more inherent limitations than financial information. The information may involve significant judgment, assumptions and interpretations by the management, and the different stakeholders may have different interpretations of such information.

#### Independence and Quality Control

We have complied with the independence and other ethical requirements of the Norm of Professional Ethics for Certified Public Accountant in the Republic of China, which is founded on fundamental principles of integrity, objectivity, professional competence and due care, confidentiality and professional behavior.

The firm applies Standard on Quality Management 1 "Quality Management for Public Accounting Firms" issued by the Accounting Research and Development Foundation of the Republic of China, which requires the firm to design, implement and operate a system of quality management including policies or procedures regarding compliance with ethical requirements, professional standards, and applicable legal and regulatory requirements.

Based on the procedures we have performed and the evidence we have obtained, nothing has come to our attention that causes us to believe that the Subject Matter Information is not prepared, in all material respects, in accordance with the applicable criteria.

We shall not be responsible for conducting any further assurance work for any change of the Subject Matter Information or the applicable criteria after the issuance date of this report.

The engagement partner on the limited assurance report is Chang, Cheng-Hsiu

Deloitte & Touche Taipei, Taiwan Republic of China

August 5, 2024

#### Notice to Readers

For the convenience of readers, the independent auditors' limited assurance report and the accompanying summary of subject matter information have been translated into English from the original Chinese version prepared and used in the Republic of China. If there is any conflict between the English version and the original Chinese version or any difference in the interpretation of the two versions, the Chinese-language independent auditors' limited assurance report and summary of subject matter information shall prevail.

#### APPENDIX

#### SUMMARY OF SUBJECT MATTER INFORMATION

#	Subject Matter Information	Corresponding Section	Applicable Criteria	Industry-specific Disclosures of the Sustainability Metrics Describe in the Rules Governing the Preparation and Filing of Sustainability Reports - Plastics Industry
1.	Linyuan plant: In 2023, the total energy consumption was 805,494 GJ, the percentage of purchased electricity was 86,4%, the utilization rate (renewable energy/total energy) was 0%, and total self-generated and self-use energy was 0 GJ.	Disclosure	Total energy consumption, percentage of purchased electricity, utilization rate (renewable energy/total energy), and total self-generated and self-use energy	Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies Article 4, Paragraph 3, Appendix 1-5, No. 1
2.	Linyuan plant: In 2023, total water withdrawn was 489.730 thousand M², and total water consumption was 324.176 thousand M².	6.4 Sustainability Disclosure Indicators - Plastics Industry	Total water withdrawn and total water consumption	Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies Article 4, Paragraph 3, Appendix 1-5, No. 2
3.	Linyuan plant: In 2023, total general waste generated was 575.04 MT, and percentage recycled was 40.8%. Total hazardous waste generated was 0 MT, and percentage recycled was not applicable.	4.3 Emissions management 6.4 Sustainability Disclosure Indicators - Plastics Industry	Total general and hazardous waste generated, and percentage recycled	Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies Article 4, Paragraph 3, Appendix 1-5, No. 3
4.	Linyuan plant: In 2023, the number of employees in occupational accidents was 0 person, and the rate of occupational accidents was 0%.	6.4 Sustainability Disclosure Indicators - Plastics Industry	Number of employees in and rate of occupational accidents	Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies Article 4, Paragraph 3, Appendix 1-5, No. 4
5.	Taipei HQ and Linyuan plant: As of December 31, 2023, the proportion of female managements was 4.17%.	5.1 Talent Selection	Proportion of female managements = (Number of female managements)/ (Total number of managements as of December 31, 2023) (%). Managements were defined as at the section chiefs level or above.	Not applicable



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