

2024

TTY Biopharm Company Limited

Sustainability Report



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Letter from the CEO

In 2024, the world is changing rapidly, geopolitical risks are increasing, and the global supply chain is being restructured. Although these uncertainties have brought challenges to the global pharmaceutical industry, the drive of innovative technology, the development of biomedicine and pharmaceuticals, and cross-border pharmaceutical cooperation have brought us to a critical era full of challenges and turning points. TTY has been developing steadily in Taiwan for more than 60 years. Under the leadership of the board of directors and chairman Chuan Lin, we adhere to the core values of integrity and honesty, believe in the people-oriented sustainable concept, continue to create value and enrich the development momentum of international transformation.

Since its establishment in 1960, TTY has continuously adjusted its business strategy in response to changes in Taiwan's pharmaceutical environment, from distribution to R&D and self-production, and then gradually expanded to a full-industry chain business model of R&D, production, and sales that is rare in Taiwan. This is the most competitive advantage and also a niche in targeting the international market. Looking back at 2024, we are encouraged to see the strategic planning, optimized management, cost reduction and efficiency improvement to enable the company to grow.

Through the three-arrow operation strategy of "self-production of domestic new drugs", "License-in international new drugs" and "export difficult generic drugs", TTY leads the team to move forward steadily under the vision of "improving the quality of human life with scientific innovation". It further actively introduces "team collaboration" and "critical thinking" mechanisms and combines the corporate culture of "integrity and honesty", "team responsibility", "professionalism" and "compliance with regulations", making TTY a trusted and preferred partner for global and international pharmaceutical companies.

As a leading pharmaceutical company in the local market, TTY has always upheld the belief of practicing corporate social responsibility. Starting from the core business of health, we attach importance to the people-oriented sustainable concept and formulate an ESG development strategy blueprint. We have derived the three major work aspects of "stable development of the company", "protecting a healthy society", and "promoting green transformation". We are committed to creating diverse values for stakeholders and providing diverse solutions for medical treatment to respond to social expectations.

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In terms of "steady development of the company", TTY relies on its own difficult generic drug technology platform, manufacturing high-quality new drugs and sales distributing capabilities to actively cooperate with partners to explore the ASEAN, EU and US markets, and expand the MIT brand. TTY builds a diverse professional board of directors to strengthen the governance mechanism, introduces an international law compliance audit system, and plans systematic education and training to implement the concept of ethical operations. The company has been ranked as the top 5% of the TPEx-listed companies in the TWSE corporate governance assessment sponsored by the Taiwan Stock Exchange.

In terms of "protecting a healthy society", TTY launched the three-year "TTY Rice Project" in 2022. It not only supports small farmers in growing non-toxic rice but also supports the daily needs of multiple social welfare organizations by donating rice. TTY understands the needs of the organizations to organize volunteer charity activities. TTY also co-organizes cancer education with multiple patient groups. The "Regional Care for the Cancer-affected" has been running for more than 20 years and has been held on in Taiwan, outlying islands and remote areas.

In addition, in order to cultivate talents for Taiwan's biotech industry, TTY has been organizing the Summer Internship Program (SIP) for students in relevant departments and institutes across the country for more than 15 consecutive years. Meanwhile, with the rapid increase in Taiwan's aging population, immune aging brings severe health challenges. For this reason, in addition to participate in the public influenza vaccine, TTY also converts some of its adjuvanted influenza vaccines for public welfare purposes, provides them to local governments to strengthen public health and epidemic prevention, and to demonstrate the health commitment of public-private collaboration to jointly enhance social welfare.

In terms of "promoting green transformation", TTY adheres to the management policy of "giving priority to environmental sustainability in all operational activities" and actively promotes environmental sustainability measures, including implementing greenhouse gas inventory and verification, optimizing process efficiency, reducing energy consumption, and purchasing equipment and products with environmental labels. It also requires suppliers to sign and fulfill ESG commitments, hoping to coexist with the environment together with like-minded partners.

TTY has focused on the pharmaceutical fields of cancer, critical infection, vaccines, and healthcare. In addition to using drugs that have passed EMA and FDA factory inspections to treat patients, TTY also willing to invest funds and manpower to cooperate with medical institutions in local clinical trials and contribute to the real-world data of clinical drug use in Taiwan. These efforts are long-term commitments to patient health, medical reciprocity, and corporate sustainability.

Facing a future full of changes and challenges, TTY will always move forward and uphold the sustainable spirit of "people-oriented and altruistic", hoping to become one of the benchmark companies in Taiwan's biotechnology industry, create long-term positive value for stakeholders, lay the foundation for corporate growth, and create positive power for society.

Sara Hou
TTY Biopharm CEO



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About TTY Sustainability Report

TTY Biopharm Co., Ltd. ("TTY") has issued a sustainability report for 9 consecutive years. Through this report we demonstrate to all stakeholders as part of our sustainable management goals, performance data and related management methods implemented for corporate governance, maintenance of patients' health and safety, responsible products and manufacturing, environmental protection, supply chain management, and employee care and social welfare. We also propose future improvement goals to implement corporate citizenship through concrete actions.

Scope of Reporting

This report covers data from 1/1/2024 to 31/12/2024. The financial statement and data include the headquarters in Taiwan and subsidiaries. The scope of the report based on the operating locations listed in the below chart. The data within the report pertains to 2024 if not otherwise indicated. No change has been made to the information given since the preceding issue.

Scope of Disclosure	TTY Biopharm					Subsidiaries
	Headquarters	Chungli Factory	Lioudu Factory	Neihu Factory	Pharmaceutical Development Center	
Economic and Financial data	●	●	●	●	●	●
Governance	●	●	●	●	●	
Social (Employee, Public Welfare)	●	●	●	●	●	
		●	●			
Environmental (GHG Inventory)	●	●	●		●	
		●	●		●	
		●	●	●		
Production / Procument / Suppliers		●	●	note		

In response to TTY’ s development strategy, the Neihu Factory will no longer be operating in 2024, so there is no data on production, raw material procurement and suppliers to disclose.

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Issuance Frequency

The Company is committed to publishing a sustainability report every year going forward. The last report was published in August 2024 in the Sustainability section of the Company's website for stakeholders to download and review. This report was published in August 2025. The next report will be published in August 2026.

Compilation Guidelines

This report is prepared under the guidance of the Sustainability Reporting Standards (GRI Standards) 2021. The GRI index is listed in the Appendix.

Report Quality Control

To strengthen the comprehensiveness and credibility of this report, we have established a sustainability report compilation procedure, internal audit, and outside validation procedures based on the Taiwan Stock Exchange Corporation Rules Governing the Preparation and Filing of Sustainability Reports by TWSE Listed Companies.

Compilation	The report is planned by various groups under TTY Biopharm Sustainable Development Committee, who then compile and proofread by the Fiance Department on the disclosure, data, and performance index prepared by responsible units.
Internal Review	Each unit shall confirm the completeness and accuracy of the report, and the highest unit officers make final approvals.
External Guarantee	<p>Afnor Asia Ltd., an independent assurance institution, is commissioned to ensure after examination against the AA 1000 AS v3, Type 1 and The Moderate Assurance that the report aligns with GRI and AA 1000 AP (2018).</p> <p>The GHG emission data is commissioned a third-party verification agency, Universal Certification Service Co., Ltd. (UCS), to perform ISO 14064-1:2018 GHG verification in accordance with ISO 14066:2011, ISO 14065:2020, and ISO14064-3:2019 standards. Category 1 and Category 2 meet the reasonable level of assurance. Other indirect GHG emission data are verified in accordance with agreed-upon procedures (AUP).</p> <p>Financial data is IFRs approved by KPMG Taiwan, in the currency of Taiwan dollars.</p>
Finalization	The report is reviewed by the groups under the Sustainable Development Committee before issued. It will then be reported to the Sustainable Development Committee for proof reading, and release the edition after being presented and approved by the Board of Directors for review.

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Basic Information

Operating Sites

Headquarters

- TEL: +886-2-26525999
- Address: 3rd Floor, No. 3-1, Park Street, Nangang District, Taipei City

Chungli Factory

- TEL: +886-3-4522160
- Address: No.838, Sec.1, Zhonghua Rd., Chungli Dist., Taoyuan City

Lioudu Factory

- TEL: +886-2-24512466
- Address: No. 5, Gongjian West Road, Qidu District, Keelung City

Pharmaceutical Development Center

- TEL: +886-2-27967383
- Address: 3rd Floor, No. 124, Xingshan Road, Neihu District, Taipei City

Neihu Factory

- TEL: +886-2-27967383
- Address: 5th Floor, No. 118, Xingshan Road, Neihu District, Taipei City

TTY Subsidiary Information

Company Name	Subsidiary
TTY	Xudong Haipu Pharmaceutical Industry Limited Company (Cayman) (Xudong Haipu)
	Worldco Int. Co., Ltd. (HK) (Worldco Int.)
	American Taiwan Biopharma Philippines
	TSH Biopharm Co., Ltd. (TSH)
	EnhanX Biopharm Inc. (EnhanX)
	Chuang Yi Biotech (CYB) Co., Ltd.

Information

Please contact Financial Department with any question or suggestions regarding the content of the report.

TTY Biopharm Co., Ltd.

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ESG x SDGs Annual Report Highlights

Main Aspects	SDGs Index	2024 TTY Highlights
<div>E</div> <div>Environmental</div>	<div><div>6 CLEAN WATER AND SANITATION</div><div>13 CLIMATE ACTION</div></div>	<ul style="list-style-type: none">• Effluent discharges and emissions within and far lower than legal standards• All waste was delivered to qualified disposal contractors for treatment, and achieved a 100% compliance rate in weekly and monthly audits• The energy emission intensity was 13.2 MJ / Revenue NTD Thousand, that reached the bottom point in the past 5 years• 11 energy-saving measures<ul style="list-style-type: none">- 455,984.79 kWh saved- 1,641,545.244 MJ of energy saved- 225.26 tonCO₂e emissions reduced
<div>S</div> <div>Social</div>	<div><div>1 NO POVERTY</div><div>3 GOOD HEALTH AND WELL-BEING</div><div>4 QUALITY EDUCATION</div><div>8 DECENT WORK AND ECONOMIC GROWTH</div></div>	<ul style="list-style-type: none">• Purchased 32,880 packets of 35g Mentholatum ointment as 2024 shareholder meeting souvenirs.• Awarded 615 scholarships to students of cancer-affected families.• Sponsorship for 27 “Hope Foundation For Cancer Care” camps. A total of 663 participants.• Subsidize 1,027 individuals to receive hospice care at home and respite care.• Provided 1,500 adjuvant influenza shots to volunteers who related with environmental protection, health and epidemic prevention and elderly people in long-term care institutions to enhance their protection.• Free cellular influenza and adjuvant influenza shots for 919 staff and their first-degree family members in 2024.• 93 staff members received special physical checks, and no level 3 management result was examined.• Organized Summer Internship Program for 17 consecutive years with 417 participants over the years.• Organized 20 cancer programs on remote campuses.• Organized health education with a total of 6,953 cancer patients and their family members attended over these years.• Organized 15 sessions of osteoporosis and bone health lectures with a total of 866 participants.• Entered the 3rd year of the 3-Year TTY Rice project, and donated a total 4,000kg TTY rice.

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ESG x SDGs Annual Report Highlights

Main Aspects	SDGs Index	2024 TTY Highlights
<div>G</div> <div>Governance</div>	<div><div>8 DECENT WORK AND ECONOMIC GROWTH</div><div>16 PEACE, JUSTICE AND STRONG INSTITUTIONS</div></div>	<ul style="list-style-type: none">• The average salary of female entry-level employees is 1.40 times that of the basic salary, and 1.38 times for male employees.• 140 drug licenses.• 36+ drugs are under NHI coverage.• Self-produced second-line antibiotic Bobimixyn (Polymyxin B injection) obtained licensed and achieved NHI price.• TTY, relevant material suppliers, and logistic partners are GDP-certified operators.• Currently, 5 valid invention patents and 202 valid trademarks were granted.

Sustainable Development Strategies & Performance

- ESG Performance and Goals
- Integrated Reporting, IR

Sustainability Topics of Concern Analyzed

- Stakeholder Engagement
- Material Topics Identification



1 Sustainable Management

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Sustainable Development Strategies & Performance

	1 Core	3 Main Aspects	7 Material Topics
ESG Strategic Development of TTY Biopharm	HUMAN Health Union Motivation Awesomeness Navigation	 Green Transformation Encourage vendors to adopt green manufacturing and actively support environmental protection and fight against climate change.	Action Plans Encompassing Climate Green Operations
		 Health of Society Committed to serve the community with our professional ability, provide medical support for healthier population.	Innovative R&D Healthcare
		 Robust Corporate Development Good moral practices and good risk management to create a favorable corporate environment for talent cultivation.	Integrity Operations Risk Management Talent Development



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Material Topic : Sustainable Development Strategies

Corresponding GRI Index	Self-established Topic
SDGs Principle	<div><div>2 ZERO HUNGER</div><div>3 GOOD HEALTH AND WELL-BEING</div><div>4 QUALITY EDUCATION</div><div>8 DECENT WORK AND ECONOMIC GROWTH</div><div>9 INDUSTRY, INNOVATION AND INFRASTRUCTURE</div><div>10 REDUCED INEQUALITIES</div><div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div><div>13 CLIMATE ACTION</div><div>17 PARTNERSHIPS FOR THE GOALS</div></div>
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers, Local Communities, NPOs/NGOs and Media</p> <p>(+) Positive impact: As a member of corporate citizens, the information disclosed about our emphasis and feedback on the environment, society, and corporate governance; action on stakeholder topics of concern (ESGs) with positive communications and interactions, which benefits brand image.</p> <p>(-) Negative impact: Stakeholders hold back and have reserved opinions about corporations that fail to disclose sustainability information. Withdrawal of investment, damaging brand image, and affecting corporate economic performance.</p>
Policies and Commitments	<p>With a focus on sustainable operations, and inclusive and sustainable economic growth, TTY has established company policies and sustainable development strategies in phases to comply with laws and respond to the expectations of the general public. Accordingly, TTY not only operates from environmental, social, and governance perspectives, but also fulfills supplier management expectations in developing new economic situations, and maintains close alliances with international partners and global investors.</p>
Goals and Targets	<p>Short-term Goals</p> <p>To drive a positive cycle in the pharmaceutical industry, TTY strongly cooperates with suppliers and reduces supply chain risks through supplier selection, qualification assessment, risk rating, and grading management. Furthermore, we have introduced a concept of "Supplier CSR Questionnaire and Commitment" to create a "Supplier ESG Questionnaire" to promote sustainable economic, social, and environmental development with suppliers.</p> <p>Mid- to Long-term Goals</p> <p>Establish sustainable consciousness of employees through public welfare activities and daily promotion, allowing employees to carry the TTY business culture in their daily lives and working environment, and assist TTY to achieve sustainable goals based on development strategies aimed at sustainability transformation.</p>

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Material Topic : Sustainable Development Strategies

Responsibilities and Resources	<p>The Sustainable Development Committee is subordinated to the Board of Directors, and there are several groups under SDC, which is in charge of the planning, implementation, and execution of sustainable development policies, systems, and guidelines as well as action plans. The Committee submits reports to the Board of Directors regularly.</p> <p>See Chapter 4 > Governance Structure (SDC) and Governance Principles (Promoting Sustainable Development) for detailed information.</p>
Annual Action Results	<ul style="list-style-type: none">• Progress of supply chain sustainable management “Supplier ESG Questionnaire” have been delivered to suppliers. In 2022-2024 we retrieved 55% from suppliers.• Awareness of sustainability All staff completed SDGs online training and corporate ethics online lectures. 2 environmental sustainability promotions.• Medical knowledge promotion 6 e-letters to all staff to emphasize the importance of health. 2 cancer information lectures to patients. 15 speeches to remind and advise sufficient intake of calcium and Vitamin D.• Social welfare participation Cooperate with Department of Public Health, Taoyuan, Health Bureau of Taichung City Government and Department of Health, Kaohsiung City Government to donate 1,500 adjuvanted vaccines for volunteers and elders of local communities. During the 3rd year of the 3-year TTY Rice project, 4 health-themed events were organized. In 2024, there are 58 patients covered by daytime hospice service. There has been 1,027 people used the service within 2021-2024.• See ESG Performance and Goals for the results of the year.

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ESG Performance and Goals

Environment

2024 Target	2024 Implementation Results	2024 Achievement	Short-term Goal 2025	Mid-term Goal 2026~2027	Long-term Goal 2028~
2 environmental sustainability promotions every year	<ul style="list-style-type: none">7/1 Choose right method to save energy in the office12/31 Challenges and future prospects of global plastic reduction	V	1. Organize 2 environmental sustainability promotions every year 2. 2% annual electricity conservation rate	1. To continue the management over carbon emission, wastes and water usage 2. To explore the technologies that improve operation-related environmental sustainability, evaluate the purchase of green energy and energy-efficient equipment to minimize eco-impact	1. Green building plan for the future if applicable 2. Establish a green supplier management system to quantify sustainability indicators
Waste management policy - waste resources recycling to reach 5 tons in total	8.94 tons wastes recycled	V	3. To continue the ISO 14064-1 GHG inventory standards and acquire certification	3. Carry out water resources recycling	3. Join climate initiative organization or alliance, declare environmental sustainability, increase ratio of renewable energy
Incorporate ISO 14064-1 inventory standards and pass certification	GHG Inventory was assured by independent institution and certificate received in April	V	4. Waste resources recycling to reach 7 tons in total		
2% annual electricity conservation rate*	Electricity conservation: Liudu Factory: 2.52% Chungli Factory: 3.82%	V			

*Note: The value reported to MOE was gained from [the annual electricity reduction result ÷ (electricity saved + annual electricity consumption)]

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2024 Target	2024 Implementation Results	2024 Achievement	Short-term Goal 2025	Mid-term Goal 2026~2027	Long-term Goal 2028~
Promote employee health through lectures and activities, a friendly work environment, and protection against human rights infringement.	<div>1. 7/19 A health online lecture of "Office workers' posture is wrong - prevention of human factors harm caused by standing and sitting for a long time"</div> <div>2. 10/25 "How to eat out" online lecture</div> <div>3. 11/15 "Anti-stress and good mood, accompany you to release stress" mental health seminar</div>	V	<div>1. Promote employee health through lectures and activities, a friendly work environment, and protection against human rights infringement</div> <div>2. Provide health check and consult to ensure employees' health and safety</div> <div>3. Collaboration with NGOs and NPOs continued</div>	<div>1. Collaboration with NGOs and NPOs continued</div> <div>2. Lectures and activities to raise health and human right awareness</div> <div>3. Provide health check and consult to ensure employees' health and safety</div>	<div>1. Work with medical institutions and other businesses to establish an online medical inquiry application, and expand service targets</div> <div>2. Design high-demand products and services that respond to climate change and the changing environment</div>
Activities to cultivate regular exercise for employees.	Completed an online walking competition in August with 153 participants, totaling 55,229,538 steps, 38,660,058 meters, 1,481,304 calories burned, and 7,842.6 kg of carbon emissions reduced	V	<div>4. Pay attention to patients and their families, and provide diversified communication and assistance</div> <div>5. Continue health education activities to increase public acceptance and popularization</div>		
Collaboration with NGOs and NPOs continued	Build Healthy Sustainability for the Super-Aged Society- Series of activities with multiple NPO	V	<div>6. Create a healthy workplace for employees</div>		
Continue with the daytime hospice service	By year 2024, 58 people received hospice services at home	V			

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2024 Target	2024 Implementation Results	2024 Achievement	Short-term Goal 2025	Mid-term Goal 2026~2027	Long-term Goal 2028~
More than 30% of suppliers have committed ESG initiatives	55% of 2022-2024 "Supplier ESG Questionnaire" returned	X	1. Conduct the corporate governance courses that compliance with laws and regulations, and sustainable development	1. Cultivate the corporate sustainable governance culture 2. Establish a training mechanism for new directors (initial training courses)	1. Create opportunities for sustainable reformation 2. Cultivate the training pool to promote corporate ethics 3. Strengthen the connection between sustainability performance and senior management salary. The performance of the senior management team is evaluated against ESG work
Online ethics promotion courses and strengthen the implementation of ethics audits, including marketing activities and external conflicts of interest/avoidance	3 online courses had been announced on 9/25, and all training was completed by 12/31	V	2. Introducing the TCFD risk management mechanism 3. Strengthen the information security management	3. Improve the Information security control 4. Planning to introduce ISO 27001	
Information security awareness, simulation and improvement	1. The security drill and vulnerability scan were completed in August. 2. Staff was notified of online courses and all training was completed by December	V	4. Introduce and promote the internal control system management of sustainable information		
Improvement of corporate risk management mechanism and framework; enhancement of corporate risk management	Submit to the functional committee and the Board of Directors on 3/8, and continue manage risks and track improvement plans; to facilitate the internal control review of risk management operations by audits on 6/28.	V			

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Integrated Reporting, IR

Six Major Sources of Capital	Capital Contribution		Capital Output
	Action Concept	Action Plan	
Financial Capital	TTY has created solid cash flow based on strong manufacturing and sales abilities. In addition to sharing operational results with shareholders, capital is further contributed to new market development, and to introduce quality products via strategic cooperation with international partners as an international enterprise.	Reinforce manufacturing abilities and optimize sales channels with income received from sales, CDMO, and international market development, and introduce research results to the global market following overseas authorization. Focus on the medical environment of target areas, identify unmet medical needs, apply group resources to achieve short-mid- and long-term operational goals, and create the profits expected by stakeholders.	<ul style="list-style-type: none">• Market value NTD\$18,101,717 thousands• Total assets NTD\$10,862,766 thousands• Consolidated revenue NTD\$5,893,847 thousands• EPS \$4.2
Manufacturing Capital	TTY is an international pharmaceutical enterprise with high standards, high quality management process, and good production management. The manufacturing base is satisfactory to international standards and used to produce pharmaceuticals with highly competitive barriers and high added value on the global market.	<ul style="list-style-type: none">• Chungli factory passed the GMP/GDP audit of the Taiwan TFDA. During the 2008-2024 periods, TTY passed 26 international audits of 17 countries and acquired official GMP verification.• The Lioudu factory passed 14 international audits in 5 countries and acquired official GMP verification in year 2013-2024.	Annual capacity of the Chungli factory: 600,000~700,000 vials of liposome injections; 2.5 million vials of cytotoxicity oncology injections; 25 million oncology oral capsules. Annual capacity of the Lioudu factory: 350 million oral tablets; 72 million oral capsules; 1.5 million vials of liquid injections; 200,000 vials of lyophilized liposome injections.
Intellectual Capital	<p>In respect of technology, TTY has enhanced the stability of product quality through continuous innovation and customized production design of the existing successful platform of long-released specialty dosage to create a win-win between TTY and partners.</p> <p>In respect of intellectual property, TTY firmly follows the Business Secrets Act to protect important core technologies so it can establish a brand within target markets. TTY applies patents to protect all research results and registers trademarks in target product markets.</p>	<p>In respect of technology, more than a hundred patent applications have been proposed to protect the development of formulations, processes, and functional excipients in synthetic technologies.</p> <p>In respect of intellectual property, we follow registrations and launch schedule to apply for trademark registration of product names and marketing feature designs to block forgery or use of similar product names to establish a company brand and increase product visibility. TTY has applied for approximately 395 trademarks to date.</p> <p>In addition, TTY reviews and eliminates patents and trademarks without value or practical use or protection to reduce maintenance fees and avoid wasting resources.</p>	By the end of year 2024, a total of 3 invention patents were approved, 202 trademark registrations were approved and 12 trademark applications are under review.

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Six Major Sources of Capital	Capital Contribution		Capital Output
	Action Concept	Action Plan	
Human Resource Capital	TTY publicly appraises employees with long service tenure every year and the salaries of new employees are higher than the base salary standard. TTY does not discriminate salaries based on gender. We also value salary increases and promotion system, allowing employees having opportunity to boost their salary and earn a promotion.	<p>TTY conducts rotations across departments to cultivate more professional talents, explore the potential of each colleague in different fields, and promote cross-departmental cooperation.</p> <p>TTY has an annual salary increase plan split into "general salary raises" and "special salary raises" as an incentive to increase productivity and retain outstanding talent. Individual performance bonuses are distributed according to the performance assessment regulations and overall operational conditions to connect remuneration to performance.</p>	<ul style="list-style-type: none">• A total of 523 employees• Employee recruitment rate of 21.80%• Employee turnover rate of 18.74%• Employee training of 108.72 hours per person on average
Social Relationship Capital	The Social Welfare team under the SDC has launched the "TTY Rice" project, hoping to promote public welfare through non-toxic contracts. TTY organizes various social service activities, and build a healthy and sustainable concept for the ultra-aged population, promote social care and subtly transform public welfare into TTY culture, and work together for the common good of the world.	<p>TTY holds the "Regional Care for the Cancer-affected" program on remote campuses to promote cancer prevention and healthcare lectures every year. It also organizes group purchase activities through the "Boshiyuan" charity club.</p> <p>The social welfare team of the SDC initiated the "TTY Rice" project to promote toxic-free farming.</p>	<ul style="list-style-type: none">• 20 remote campus programs• 2 physical anti-cancer health lectures in-person were organized in year 2024 with a total of 82 participants.• 17 healthcare lectures were organized in year 2024 with a total of 948 participants.• The "TTY Rice" project "Support TTY, Support Health" organized 4 charity events, and a total of 2,600 kg toxic-free rice have been donated to several social welfare organizations and public sectors.
Nature Capital	TTY has established energy and water-saving policies and plans based on government regulations to examination standards of different countries. TTY is also committed to saving water, improving processing and sewage discharge, and traces and audits waste.	The sewage discharged by TTY complied with the Water Pollution Control Act, self-governance laws of local governments, and incoming water quality standards for sewage treatment factories in industrial zones. In addition, all clearance vehicles of waste contractors have GPS systems for tracing, and on-site and vehicle audits are conducted.	<ul style="list-style-type: none">• In year 2024, the Lioudu and Chungli factories reduced energy consumption by 455,984.79 Joules, and greenhouse emissions (CO2e) by 225.26 tons.• The total waste of TTY was about 79.60 tons in year 2024.• The Chungli and Lioudu factories achieved 100% in weekly and monthly waste clearance contractor follow-up audits.

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Sustainability Topics of Concern Analyzed

TTY material topics are identified and reported based on Inclusiveness, Materiality, Responsiveness and Impact, the 4 principles of AA1000 Accountability Principle, 2018.

STEP 1	8 categories of stakeholder
Identification and Communication of Stakeholders	
<ul style="list-style-type: none">Stakeholder Engagement Standards to identify 8 categories: government, investors, customers, employees, suppliers, local communities, non-profit/non-governmental organizations, and the media.Getting to know stakeholders’ topics of concern through multiple feedback channels.	
STEP 2	17 topics of concern
Collecting Sustainability Topics of Concern	
<ul style="list-style-type: none">17 sustainability topics that are highly reflecting TTY operation are sorted based on industrial updates, domestic policies and international initiatives.Topics included: Economic performance, ethical management, marketing ethics, talent attraction and retention, subject safety, occupational safety and health, social participation, drug safety, access to medicine, counterfeit drugs, reasonable pricing, supplier management, response to climate change, information security, sustainable development strategies, water resource management, and waste management.	
STEP 3	32 topics of concern questionnaires received 115 stakeholders’ concern questionnaires received
Material Topics of Concern Survey	
<ul style="list-style-type: none">The 17 topics of concern are included in the “Sustainability Topic - Materiality Assessment” survey, which is filled by level I & II and higher managers under CEO. The results are quantified and assessed in accordance with levels of impact and severity (scale, scope), likelihood of occurrence, and risk of human rights violations of each issue. In 2022, we received 32 answered questionnaires.TTY’s stakeholders fill out the "Sustainability Topic - Levels of Concern" survey, refer to the level of concern of external stakeholders to identify and prioritize the major topics; a total of 115 questionnaire results were collected in 2024.Excluding significant changes in business scopes and in industrial value chains, the survey runs every other year. However, due to the management changes in 2024, the “Sustainability Topic - Materiality Assessment” survey was temporarily suspended. Instead, an internal discussion and resolution was made to continue using the materiality results of the previous analysis in 2024.	

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<div>STEP 4</div> <div>Material Topics Identification, Examination and Establishment</div>	12 sustainability topics
<ul style="list-style-type: none">TTY received 32 questionnaires completed by senior managers in 2022 which reported and approved by the directors, also referred to 115 external stakeholder surveys in 2024, then quantified and analyzed to finalize 11 material topics, with additional of “Occupational Safety and Health” as the final 12 material topics of the year 2024.TTY’ s 12 material topics of 2024 are audited and assured by qualified third party for their adaptiveness of procedures and standards, and the integrity and inclusiveness of the topics.	
<div>STEP 5</div> <div>Sustainability Report Review and Assurance</div>	9 sustainability reports
<ul style="list-style-type: none">In accordance with the GRI Standards 2021, this report discloses the impact of each topics, as well as the company’s corresponding policies, commitments, management actions, indicators and goals. It also calibrates TTY’ s sustainable development goals and strategies based on this to enhance the effectiveness of external communication.Afnor Asia is commissioned to give external assurance of disclosures in the report in accordance with Type 1 of AA1000AS v3 and the moderate assurance. HGH emission report data is verified by UCS in accordance with ISO 14064-1:2018. Financials are IFRs-approved by KPMG Taiwan. This is the 9th issue of the report by TTY. The report is reviewed by the groups under the SDC, and then reviewed by the SDC before being submitted to the Board for approval. The management of sustainable information has also been included in the annual audit plan.	

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Stakeholder Engagement

The 8 stakeholders, government, investors, customers, employees, suppliers, local communities, NPOs and NGOs, and media are outlined based on the nature of our operation and the industry, and the 5 principles of AA1000 Stakeholder Engagement Standard, SES, 2015 over Dependency, Responsibility, Tension, Influence and Diverse Perspectives.

To get a comprehensive idea of stakeholders' concerns and the level of impacts of the topics that deal with existing and potential impacts, we gather information in daily practices, which include partnerships, government-academic exchange, routine investigations, and active communications with stakeholders. We can locate specific demands and expectations from them while underlining their topics of concern and readjusting operations accordingly. We provide responses that answer key concerns, ranging from critical company policies to updates on business and news, and the report on corporate governance, social welfare, and eco-protection for stakeholders' review.

TTY reported communication results with stakeholders in year 2024 (results submitted to SDC on 2/25/2025) :

▼Topics of concern to TTY stakeholders, communication method, frequency, and specific procedures

Stakeholders	Stakeholder Significance to TTY	Topics of Concern	Engagement Method	Communication Frequency	Communication Performance
Governmental Agencies	Governments direct our development. Each location abides by local regulations, and ensures transparent communication to seek government support and partnership.	Ethical management Marketing ethics Information security Water resources management Waste management Drug safety Subject safety	Visits/Phone/Official letters/ Email/Dissemination/Industrial, government, and academic seminar/Stakeholder Sustainability Topics of Concern Survey	Irregularly	<ul style="list-style-type: none">• 2 disseminations organized by TPEx• More than 30 industrial, government, and academic seminars• More than 846 official letters• 1 time occupational safety audit• Forward policies and orders announce• 1 time toxicity response practice• Fire safety inspection and report• GMP factories routine audit• 22 times regulation conferences• Business waste operation audit

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Stakeholders	Stakeholder Significance to TTY	Topics of Concern	Engagement Method	Communication Frequency	Communication Performance
Investors	Investors are critical supporters of the Company. Our transparent and comprehensive company governance guidelines reassure investors, which consequently facilitate the Company's sustainable development.	Marketing ethics Counterfeit drugs Access to medicine Information security Drug safety Reasonable pricing Subject safety Occupational safety and health	Annual general meeting/ Annual report Quarterly financial report Operational overview announcements Investor conferences Material information announcements/Press releases/Corporate website/Phone/Email/Investor relationship mailbox/Stock affairs and investor relationship contact/Reception of domestic and foreign analysts/Stakeholder Sustainability Topics of Concern Survey	Annually Quarterly Monthly Quarterly or more frequently Irregularly	<ul style="list-style-type: none">• 40 material information announcements in Mandarin and English• 18 email replies• 4 investor conferences
Customers	Customers constitute key partners in the Company's development. TTY keeps aligned with business trends, provides superior products and service, and maintains constant communication with customers to create a win-win.	Drug safety Reasonable pricing Subject safety	Exhibitions/Academic activities/Educational seminars/Academic platforms/Clinical trials/Factory visits, inspections/Visits/Phone/Email/Letter/Stakeholder Sustainability Topics of Concern Survey	Irregularly	TTY provides more high-quality products and services that meet market needs, TTY interacts with domestic and foreign customers, including via: <ul style="list-style-type: none">• Domestic/foreign medical exhibitions: 26 sessions• Education activities/seminars: 158 sessions• Academic platforms: total of 4 academic platforms, and the Central Taiwan Hematology Academy and Northern Taiwan Hematology Academy continue.• Clinical trial research: oncology, intensive care, healthcare totaling 18 projects.• 7 visits to production factories• 11 audits to production factories

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Stakeholders	Stakeholder Significance to TTY	Topics of Concern	Engagement Method	Communication Frequency	Communication Performance
Employees	Employees are a key asset to our Company. In addition to protecting workers' rights, various wellbeing initiatives, salary packages, and benefits are in place to attract more talent to join the family. We also encourage employee growth with TTY.	Talent attraction and retention Drug safety Occupational safety and health	Annual performance interviews and assessment Labor management meetings Personnel announcements/ Intranet/Sexual harassment complaint channel/ Infringement reports/ Stakeholder complaint mailbox/Orientation plan and satisfaction survey/Employee welfare committee/Internal education training and e-learning/External education training subsidies/Stakeholder Sustainability Topics of Concern Survey	Twice annually Quarterly Irregularly	<ul style="list-style-type: none">Regular KPI review with all 496 permanent employees (employees on probation excluded).Organized 4 labor-management meetings.No employee complaints were received in the year 2024.10 people applied for parental leave without pay in 2024.37 in-person and 10 online lectures were held.There were 11 external educational trainings subsidized by the Company.Organized 2 environmental sustainability promotions.TTY provides directors, all employees and their first-degree family members with cellular and adjuvant influenza vaccinations for free, benefiting a total of 919 people in 2024.Provide occupational health care services on siteEmployees health checkEmployee benefits are organized by the Employee Welfare Committee.➢ Provided scholarship/financial aid in 2023. (Once each in the 1st and 2nd semesters)➢ Distributed holiday vouchers and e-gift coupons (Lunar New Year, Labor Day, Dragon Boat Festival, Mid-autumn Festival)➢ Employees travel subsidy - Distributed e-gift coupons➢ Family day, end-year event
Suppliers	Suppliers are critical of TTY' s development from production to operations. We manage the risk of social responsibility and work with vendors to deliver quality service.	Occupational safety and health Information security Supplier management	Supplier questionnaire survey/Supervision on the validity of supplier quality assurance/Supplier audit Email/Phone calls/Visits/ Stakeholder Sustainability Topics of Concern Survey	Annually Irregularly	<p>New Suppliers are required to update the survey based on the assessment of qualification of quality system management, 19 suppliers of the key raw materials have passed the evaluation.</p> <p>Ensure the effectiveness of suppliers' GMP certificates and compliance of raw materials. No GMP violations announced by international drug regulatory organizations.</p> <p>Annual supplier performance is assessed to identify risk levels and to monitor frequency. No supplier was graded C in year 2024.</p>

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Stakeholders	Stakeholder Significance to TTY	Topics of Concern	Engagement Method	Communication Frequency	Communication Performance
Local Communities	Local communities are our partners. Through communication and interaction we can achieve harmony in our relationship. By benefiting the community, we emphasize positive energy in society.	Access to medicine Counterfeit drugs Social participation	Email/Visits/Phone/ Meetings/Educational seminars/Stakeholder Sustainability Topics of Concern Survey	Annually or Irregularly	<ul style="list-style-type: none">Cooperated with the Department of Public Health, Taoyuan, Health Bureau of Taichung City Government, and Department of Health, Kaohsiung City Government, TTY delivered 1,500 adjuvant flu shots to protect the environment, health and pandemic volunteer, along with the elders from long-term care institutions.Contracted toxic-free rice from Daxi small-scale farmer as souvenirs for blood donors through Taipower Keelung District and for charity activities usage to the organizations for disadvantaged groups who in needs through the Department of Social Welfare, Taoyuan.Cooperate with a private story house to hold a 2-day food and agriculture education event for parents and children.
NPOs/NGOs	NPOs are partners in developing sustainable impact. Knowing their needs, making lasting connections, and driving ecological and societal themes propels benefits back to society.	Sustainable development strategies Information security Waste management Talent attraction and retention Occupational safety and health Social participation	Activity participation/Email/ Visits/Phone/Meetings/ Stakeholder Sustainability Topics of Concern Survey	Irregularly	<ul style="list-style-type: none">Sponsored the Hope Foundation for Cancer Care and provided NTD\$1 million to support children with cancer family through college.Cooperated with cancer-related NPOs to organize health education lectures for cancer patients and families with totaling 82 participants.Cooperated with Huashan Social Welfare Foundation to deliver meals and greetings, to clean the house for living alone elderly.Cooperate with Hondao Senior Citizen's Welfare Foundation to accompany the elders experiencing rice harvesting.

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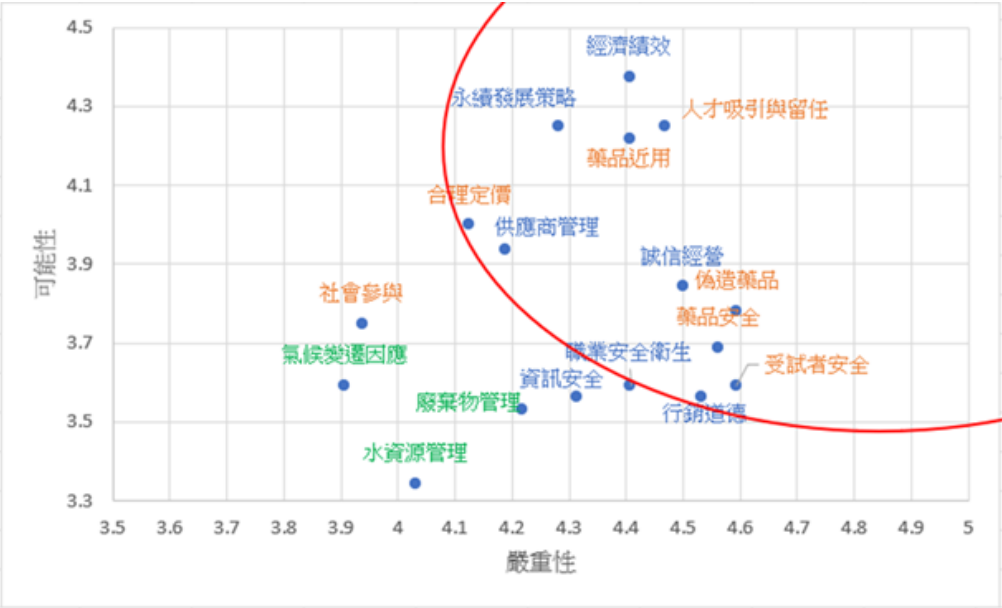
Stakeholders	Stakeholder Significance to TTY	Topics of Concern	Engagement Method	Communication Frequency	Communication Performance
Media	A positive link with the media bridges corporations and the public, facilitates proper Company information and brand image, and allows stakeholders to openly access complete Company information.	Economic performance Reasonable pricing Ethical management Access to medicine Drug safety Talent attraction and retention Social participation	Media visits/ Phone/ Press conference/ Media press conference/ Brand event/ Interview/ Visits/ Stakeholder Sustainability Topics of Concern Survey	Irregularly	To guide media stakeholders to understand the dynamic development of the Company's overall operations and product layout, communication is as follows: <ul style="list-style-type: none">• 1 Vaccine donation forum• 1 Product health education press conference• Press release of Health Bureau of Taichung City Government responds the Vaccine health education• 1 Antibiotic health education forum• 3 media interview• Instructions for irregular visits and telephone contacts



Material Topics Identification

TTY has identified a total of 11 material topics, which are economic performance, talent attraction and retention, access to medicine, sustainable development strategies, counterfeit drugs, ethical management, drug safety, subject safety, reasonable pricing, supplier management, and marketing ethics in 2022~2023; After verified and confirmed by external consultants, then reported and approved by the directors. Due to the management changes in 2024, the “Sustainability Topic - Materiality Assessment” survey was temporarily suspended. Instead, an internal discussion and resolution was made to continue using the materiality results of the previous analysis in 2024. also referred to 115 external stakeholder surveys in 2024, then prioritize and finalize 11 material topics, with additional of “Occupational Safety and Health” as the final 12 material topics of the year 2024.

▼ TTY’ s 2022-2024 sustainability topics materiality assessment matrix chart



▼ TTY’ s 2024 Top 10 material topics of concern to the external stakeholders

Ranking	Sustainable Topics
1	Drug safety
2	Occupational safety and health
3	Talent attraction and retention
4	Subject safety
5	Marketing ethics
6	Reasonable pricing
7	Supplier management
8	Access to medicine
9	Counterfeit drugs
10	Ethical management

Note: all the topics were included within material topics in 2022~2023 except Occupational safety and health, and TTY adopted suggestions of external stakeholders to add Occupational safety and health as one of the material topics.

▼ TTY 's Material Topics and Scope in Year 2024

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Material Topic	Aspect	Significance and Importance to TTY	Value Chain Impact			Chapter
			Upstream	Midstream	Downstream	
			API Supplier	TTY	Generic drug factories Medical hospitals Original factories	
Economic performance	Economic/ Governance	TTY is navigating inclusive, sustainable economic growth, and is accelerating the development of generic drugs of specialty dosage forms and new drugs of high barrier and economic value, as well as unmet medical needs, improving the quality of human life with scientific innovation.		√		About TTY Biopharm
Talent attraction and retention	Social	Our talent is our foremost asset. TTY is a friendly workplace, promotes learning, and is an inclusive, innovative incubator where people envision self-positioning and self-value. A comprehensive education system and tailored training plans for employees of high potential and successors, through attract and retain talent so we are well prepared for a changing market and improving our technologies and innovations.		√		Workplace Happiness Talent Cultivation
Access to medicine	Social	Health promotions or lectures and partnerships with NPOs/social organizations dedicated to disease awareness of illness prevention. We also worked with external organizations to prepare the communities against viruses and diseases.			√	Social Participation
Sustainable development strategies	Economic / Governance	The Sustainable Development Committee (SDC), ethical management implementation of CSR as a core value, and better planned specific responsibility are all in place to drive our sustainable goals. The Committee revises and reviews related policies, execution, performance, and systems.		√		Sustainable development strategies & performances
Counterfeit drugs	Human rights	All raw materials are sourced from qualified suppliers, and customers of the drug supply chain can be tracked via shipping records. GPS is installed in transportation of drugs to ensure quality of delivery to the designated destination and user safety. The qualified GDP logistic service shows our commitment to intact packing and content quality, eliminating counterfeits in the supply chain.	√	√	√	Supply Chain Traceability

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Material Topic	Aspect	Significance and Importance to TTY	Value Chain Impact			Chapter
			Upstream	Midstream	Downstream	
			API Supplier	TTY	Generic drug factories Medical hospitals Original factories	
Ethical management	Economic / Governance	The pharmaceutical business works closely with the national economy and people's health, and drives environmental sustainability. In light of this, the Legal & Compliance Division under the SDC takes responsibility for ethical operations and the holistic development of our corporation, as well as the setup of risk assessment procedures of unethical behavior to fortify internal control. The 4 th version of "Procedures for Ethical Management and Guidelines for Conduct" of May 2024 continues to prevent dishonesty, bribery, and illegality by directors, managers, and employees.	√	√	√	Ethical Management
Drug safety	Human rights	The pharmaceutical business is directly related to the life and health of users. The API dictates the effectiveness and safety of preparations. As such, TTY uses discretion in reviewing and managing API suppliers of US/EU generic drug makers, which are required to have Taiwan DMF registration, cGMP and PIC/S GMP. TTY's key products fully comply with applicable health and safety regulations.	√	√	√	Drug Safety
Subject safety	Human rights	Development of drugs in TTY follows the Human Subjects Research Act and the Guidance for Good Clinical Practice. Human research and clinical trials for cancer drugs have been approved by the Ethics Committee and regional health authority. Individual cases are insured to protect test subjects' rights. We also have a standard procedure for clinical trial operations, which is executed by fully trained clinical specialists to ensure drug use safety.		√	√	Subject safety
Reasonable pricing	Social	TTY operations strictly comply with government regulations and controls to provide safe, effective products at the best quality and reasonable price. Our dedicated team is devoted to quality generic drugs, and applies NHI prices that are fairer to the original makers to balance NHI financial impact.			√	Responsibility of Sales

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Material Topic	Aspect	Significance and Importance to TTY	Value Chain Impact			Chapter
			Upstream	Midstream	Downstream	
			API Supplier	TTY	Generic drug factories Medical hospitals Original factories	
Supplier management	Economic/ Governance	TTY evaluates vendors' financial status, organization management, realization of CSR based on Quality Assurance, Stable Production Capacity, Cycle Time Reduction, and Sustainability as a goal. The system is referred to the Supplier Management mechanism. Annual assessments and risk ratings are given to existing suppliers to facilitate graded management. Questionnaires are distributed to suppliers to evaluate their sustainability. The insight of suppliers' overall condition serves as a reference for each factory when determining supplier qualification.	√			Supplier Screening and Management
Marketing ethics	Economic/ Governance	TTY regards patient medical wellbeing and care as its foremost concern. We adopt business guidelines and codes of conduct following ethical management and health care ethics to ensure good business operations and a sustainable future.			√	Responsibility of Sales
Occupational safety and health	Social	TTY properly manages safety and health issues in the workplace, prevents occupational hazards, maintains the safety and health of workers, complies with laws and regulations, and ensures company operations smoothly.	√	√		Occupational Safety and Health

TTY Basic Introduction

- Operation Result
- External Engagement

TTY Strategy Deployment

- New Drug Launch to Complete Intensive Care, Vaccine and Oncology Product Line
- Extensive Product Portfolio and Combinations for Local and Overseas Markets
- CDMO (Contract Development Manufacturing Organization) to Expand into the EU/US market

TTY Operational Development Strategies

- Short-term Development Plans
- Mid-term Development Plans
- Long-term Development Plans



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Key Performance

- ✓ Consolidated revenue was **NTD 5,893,847 million** in the 2024 (7.04% CAGR for 2015-2024).
- ✓ Complete product lines for intensive cases, vaccines, and oncology continuously.
- ✓ The oral chemotherapy drug licensed-in from Japan for first-line treatment of advanced cholangiocarcinoma, TS-1, received early breast cancer indication in August.
- ✓ The domestically produced second-line antibiotic new drug with new efficacy and new usage which has been approved and obtained NHI price.
- ✓ Sole distributor of anesthetic formulas. Complete full-line choices for health checks, beauty surgeries, and medical operations.
- ✓ The "cocktail therapy" was an additional product portfolio of oncology drugs for metastatic colorectal cancer that TTY cooperated with international pharmaceutical partners.
- ✓ Agreement on a memorandum with **5 advanced Vietnamese hospitals** to facilitate the ASEAN Medical Collaboration Project.
- ✓ TTY provided **650,000** NHI-covered vaccines in 2024.

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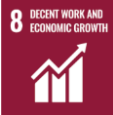

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Material Topic : Economic Performance

Corresponding GRI Index	GRI 201-1 Direct Economic Value Generated and Distributed from the Company		
SDGs Principle			
Impact Assessment	Related Stakeholder Engagement: Government, Investors, Customers and Employees (+) Positive impact: Revenue increase, effective and smooth operation, support by stakeholders, and improve funding opportunities. (-) Negative impact: Changes in the investment market affect the confidence that the stakeholders had in our company.		
Policies and Commitments	In view of the aging population, the demand for health awareness and treatment should continue to soar in the future, which is why TTY has become so advanced in the field of target treatment, not to mention its well-recognized and comprehensive customer cooperation relationship and healthcare education programs for patients. In the future, TTY will continue to develop competitive pharmaceuticals in specialty dosage forms to sustain its stable operations and strive to reach the goal of sustainable operations.		
Goals and Targets	Short-term Goals TTY will deploy a complete sales network throughout Taiwan. Aside from increasing the coverage of sales areas and improving the efficacy of using company resources, it will also strengthen strategic cooperation for drugs with certain market sizes and values and introduce new drugs in late clinical stages from targeted treatment areas through authorization. To combine this with the efforts of the marketing team, we will optimize revenue for the product. Mid- to Long-term Goals TTY will continue to specialize in the development and manufacturing of oncology, intensive care, and anti-infection treatments, develop generic drugs and new drugs in specialty dosage forms with high barriers and high economic value, and strengthen relationships with our international partners to complete regulatory submission and launch.		
Responsibilities and Resources	The management center will plan development strategies and schedules for high-barrier drugs, strengthen regulatory negotiation and breakthroughs, and speed up the launch of products in target markets by deepening awareness and knowledge of pharmaceutical regulations of various target markets worldwide and integrating R&D project management capabilities.		
Annual Action Results	<ul style="list-style-type: none">• In the year 2024, the parent-level sales revenue of TTY was NTD 4,985 million, and profit before tax was NTD 1,776 million.• The consolidated sales revenue in the year 2024 reached NTD 5,894 million.• The R&D expenses in the year 2024 reached NTD 271 million, amounting to 4.60% of the total annual revenue.		

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Operation Result

TTY Biopharm Co., Ltd. was founded on July 22, 1960, and it was listed on the OTC in September 2001 (4105:TT). TTY has made Taiwan its primary market for providing services, while the area for export is mainly Southeast Asia, including Thailand, the Philippines, and Vietnam. No products or services are prohibited from any specific markets. the primary categories of businesses include manufacturing, processing, and trading of various pharmaceuticals and chemicals. Primary products include oncology (cancer) drugs, anti-infective drugs, vaccines, anesthetic drugs, and healthcare drugs for chronic diseases. Sales channels are mostly direct to medical centers and regional hospitals, while regional hospitals, clinics, and pharmacies are marketed by distributors. The majority of beneficiaries are cancer patients, hospitalized patients with infectious diseases, or patients with gastroesophageal reflux, osteoporosis, high uric acid, and bacterial infections, and satisfy the needs of vaccine market. The paid-in-capital was NTD 2.486 billion, with consolidated revenue reaching NTD 5,893 million in the year 2024.

In recent years, TTY has adopted three key strategies that focus on export difficulty generic drugs, license-in international new drugs and self-developed new drug as the three arrows operations. It’ s expected to be the force to drive revenue for the next 5 years.

▼Consolidated Financial Statements for TTY and its Subsidiaries for the Recent 5 Years (Currency: NTD)

Item/Year	Unit	2020	2021	2022	2023	2024
Paid-in Capital	Thousand NTD	2,486,500	2,486,500	2,486,500	2,486,500	2,486,500
Operating Revenue	Thousand NTD	4,221,836	4,535,610	5,061,606	5,505,542	5,893,847
Gross Profit	Thousand NTD	2,607,052	2,766,553	3,021,115	3,282,130	3,414,734
Operating Income	Thousand NTD	957,379	1,140,652	1,227,957	1,372,433	1,393,856
Income Tax	Thousand NTD	222,848	264,811	305,249	300,864	366,333
Net Income	Thousand NTD	978,677	822,569	1,103,090	1,118,601	1,519,354
Profit Attributable to Owners of The Parent	Thousand NTD	924,178	831,894	1,094,391	1,128,509	1,449,622
EPS	NTD	3.72	3.35	4.40	4.54	5.83
R&D Expense	Thousand NTD	261,597	287,595	353,436	310,438	271,392
Cash Dividends	NTD/Share	4.0	3.0	3.4	3.5	4.2

Note:

1. The entities in the consolidated financial statements include TTY and all its subsidiaries. For detailed information on subsidiaries, please refer to About TTY Sustainability Report > TTY Subsidiary Information.
2. 2024 cash dividends will be distributed by the resolution of the Board of Directors meeting on 2/25/2025.

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▼Direct Economic Value Generated and Distributed by the Organization

Item (Unit: Thousand NTD)/Year		2020	2021	2022	2023	2024
Direct Economic Value Generated (A)	Operating Revenue	4,221,836	4,535,610	5,061,606	5,505,542	5,893,847
	Non-operating Revenue	38,335	23,940	54,873	97,444	105,121
	Operational Costs	1,705,875	1,813,704	2,087,126	2,268,772	2,521,600
Economic Value Distributed (B)	Employee Salary and Benefits	1,035,162	1,032,301	1,075,497	1,087,730	1,182,381
	Payments to Providers of Capital	994,599	994,600	745,949	945,410	870,275
	Payments to Government	226,453	268,315	308,853	304,739	371,286
	Community Investment	46,230	47,099	86,735	116,568	190,631
Economic Value Retained (A-B)		1,246,451	1,398,131	1,558,268	1,825,177	862,795

Operation Analysis

TTY has long-term collaborations with international pharmaceutical companies, we have built strong development and manufacturing abilities to provide an all-compassing solution for drug delivery systems. The 2 production sites have observed cGMP, and Chungli factory focus on oncology and Lioudu factory dedicated to non-oncology lines. TTY has passed central compliances (US FDA, EU EMA, Japan PMDA, and Taiwan FDA) and partner operators' audits.

TTY 3 main product teams, Oncology Business Unit (TOT), Intensive Care Business Unit (TIT), and Key Account Management Division (KAM) provide consistent revenue for the Company; the Contract Development and Manufacturing service provides "manufacturing-related" solutions, such as dosage R&D, amplified mass production, and even tailored design for equipment and production site and commercial mass produce at a later stage, throughout the entire pharmaceutical value chain to help our partners relax on the budget and use investment to explore products that best address market needs. This is how we maintain trust and collaborations with international pharmaceutical companies. In 2024, the CDMO contributed to 7% of the revenue, with customers located in Taiwan and Japan.

▼Revenue Proportion of TTY for the Recent 3 Years

Business Unit / Year	2022	2023	2024
TOT	51%	48%	47%
TIT	27%	21%	26%
KAM	5%	12%	5%
CDMO	9%	7%	7%
BDD	6%	11%	14%
Others	2%	1%	1%

TO ENHANCE R&D
TECHNOLOGY,
TO IMPROVE THE
QUALITY OF HUMAN LIFE.

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External Engagement

Facing the rapid economic, social, and environmental changes around the world, TTY has, as an excellent biotech pharmaceutical company, focused on the development of specialty dosage forms and new drugs, actively participated in external initiatives and public associations, and maintained a good relationship with the industry, government, and academic circles. In the year 2023, TTY participated in 7 major external initiatives and 13 public associations, held significant positions, and participated in conferences to communicate industry viewpoints and progress ideas through information exchange and sharing. This high degree of participation has helped provide assistance to the sustainable development of the biotechnology and pharmaceutical industry and facilitate collaboration with peers to establish a far-reaching social influence.

External Initiative

1. Sustainable Development Goals, SDGs
2. Sustainability Reporting Guidelines (Global Reporting Initiative, GRI)
3. Sustainability Accounting Standards Board, SASB of Biotechnology and Pharmaceutical Industry Disclosures
4. The United Nations Global Compact, UNGC
5. Task Force on Climate-related Financial Disclosures
6. World Economic Forum, “WEF”’ s Partnering Against Corruption — Principles for Countering Bribery”
7. The Commonwealth Water Conservation Action Initiative "Do One Thing for Tamsui River" centers on 5 commitments: standard discharges of sewage and waste only supervision to ensure no illegal dumping by waste contractors; green purchase maximization; encouraging public governance of the Tamsui River System; and TTY Ecology Action.

Participation in External Associations and Memberships

Name of the Organization	Strategic Significance	Position Held
Institute for Biotechnology and Medicine Industry (IBMI)	Work together on pharmaceutical and bio-technology development, improve technology, promote R&D, to maintain national health and national economic growth.	Member
Taiwan Bio Industry Organization	Work together on pharmaceutical and bio-technology development, improve technology, promote R&D, to maintain national health and national economic growth.	Member
Taiwan Pharmaceutical Manufacture and Development Association	Work together on pharmaceutical and bio-technology development, improve technology, promote R&D, to maintain national health and national economic growth.	Director, Deputy Chairperson of Intellectual Property and Legal Committee
Taiwan Pharmaceutical Manufacturers Association	Improve connections within the industry to seek shared profit. Find methods to improve and promote the pharmaceutical industry for economic development.	Member
Taipei Pharmaceutical Agents and Distributors Association	Bridge agents of Western drugs across Taiwan to facilitate conversation with government, medical and healthcare policies, and the drafting and promotion of medical and pharmaceutical regulations.	Director
Taipei Pharmaceutical Business Association	Bridge agents of Western drugs across Taiwan to facilitate conversation with government, medical and healthcare policies, and the drafting and promotion of medical and pharmaceutical regulations.	Member

A close-up photograph of two individuals in business attire shaking hands. The person on the left is wearing a white long-sleeved shirt, and the person on the right is wearing a dark blue suit jacket over a light blue shirt and a patterned tie. The background is a blurred, bright office environment with large windows.

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TTY Strategy Deployment

The three-arrow operation strategy of "Export Difficulty Generic Drugs", "License-in International New Drugs", and "Self-produced Domestic New Drugs". Each arrow has made substantial progress and steady growth. "Export Difficulty Generic Drugs" has the self-developed liposomes product, Lipo-AB has been exported to US steadily. For "License-in International New Drugs", the company licensed-in Pemigatinib, the world's first targeted new drug approved by the US FDA for cholangiocarcinoma. It also licensed-in the cell-based influenza vaccine and adjuvanted influenza vaccine of CSL Seqirus, and the new drug Remimazolam for sedation and anesthesia. In the " Self-produced Domestic New Drugs" section, the second-line antibiotic Polymyxin B is also included in the National Health Insurance. TTY continues to work on its core business and arranges deployment steadily, providing diversified medical solutions for patients globally and adding momentum to the company's operations and internationalization.

New Drug Launch to Complete Intensive Care, Vaccine and Oncology Product Line

Self-produced Domestic New Drugs

Polymyxin B Second-line Antibiotic Polymyxin B Injection

- ✓ Obtained licensed in Feburary, 2024 and achieved NHI price in December.
- ✓ Achieved the two milestones: the first second-line self-produced antibiotic drug indicated as a treatment recommendation by the international treatment guildline, and also the first domestic produced second-line antibiotic drug with new efficacy.

As a long-time developer in severe medical territory, TTY works on new formulations and complex generic drugs, and distributing multiple antibiotics in Taiwan. Statistics have shown that the sales of TTY's antibiotic injections for severe diseases have reached the top 3 in Taiwan; Also, the antibiotic therapy relies much on the judgment of local clinical data, therefore, TTY works closely with all levels of hospitals on numerous clinical trials to maintain trustworthy relations.

- The introduction and development of antibiotics and oncology drugs continuesly, and deepend products deployment.
- The development and exportation for complex generic drugs continues.

Licensing-in The International New Drugs

Cellular Influenza Vaccines and Adjuvant Influenza Vaccines

- ✓ Taiwan is the first country in Asia to market a cell-based influenza vaccine, and also the first country has been listed in public vaccinations.
- ✓ TTY provided public-funded cellular influenza vaccines and self-pay partially since year 2020.
- ✓ Considering the needs of the elderly in an ultra-aging society, TTY further licensing-in the "adjuvanted influenza vaccine" for people over 65 years old, which helps to prolong and enhance the efficacy of influenza vaccination for the elders.

With the introduction of the "cell-based influenza vaccine" and "adjuvanted influenza vaccine" products, TTY provided Taiwanese people of different ages with influenza vaccine products that are preferred by advanced countries such as the United States, the United Kingdom, and Australia. In the future, we will create more unique and superior vaccine products, and to contribute to the transformation of Taiwanese health from treatment to prevention.

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Sustainable Management	<p>New Anesthetic Drugs Remimazolam</p> <p>The emerging markets of medical surgery, health check-up, dentistry, and medical beauty drives the clinical demand for anesthetic drugs. There are very few new anesthetic drugs in recent years. TTY breaks through the current situation and introduces the "new generation drug Remimazolam".</p> <ul style="list-style-type: none"> ✓ Reduce side effects such as respiratory depression, cardiac depression and blood pressure drop, making the surgery smoothly and safely. ✓ This is a commitment to serve anesthetic options and build an all-around anesthetic line through the importation of sedatives, anesthetics, and painkillers for all stages of operation. <p>Ensuring safe, comfortable, and diverse medical solutions.</p>
About TTY Biopharm	<p>New Generation of Oral Chemotherapy Drug TS-1</p> <p>Following the Ministry of Health and Welfare's National Health Insurance Administration's "temporary payment" in May 2023, the world's first targeted drug approved by the US FDA for the treatment of cholangiocarcinoma, Pemazyre, was included for the second-line treatment of cholangiocarcinoma patients with FGFR2, TTY also licensed-in the "new generation of oral chemotherapy drug TS-1" from Japan.</p> <ul style="list-style-type: none"> ✓ TS-1 conducted a registration trial for advanced cholangiocarcinoma in Taiwan and expanded its indication in 2022. ✓ TS-1 obtained the NHI price on first-line treatment of advanced cholangiocarcinoma in February 2024. ✓ TTY expanded drug options on advanced cholangiocarcinoma treatment actively for domestic needs, and provided with the option of first-line oral chemotherapy drug for patients. ✓ TS-1 obtained approval by the Ministry of Health and Welfare's National Health Insurance Administration for the indication of early breast cancer in August 2024. ✓ In a large-scale clinical study of patients with early breast cancer, the incidence of side effects such as gastrointestinal discomfort, decreased appetite, and decreased blood cells was less than one-fifth of that of breast cancer targeted drugs, and these side effects could be alleviated by adjusting the dose. ✓ It is expected to help 5,000 breast cancer patients reduce the risk of recurrence each year in the future, and it is estimated to generate NTD\$700 million in revenue.
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Cocktail Therapy For Colorectal Cancer

To meet the clinical needs of medical treatment, TTY cooperated with an international pharmaceutical company as a strategic alliance partner in 2024 to taking care for domestic patients who need Bevacizumab.

- ✓ By expanding the product portfolio of cancer drugs to leverage the international new treatment trends, and to build the complete product line of treating colorectal cancer.
- ✓ Combining Lonsurf, a compound oral chemotherapy drug, with Bevacizumab, a monoclonal antibody targeted drug, to form a "Colorectal cancer cocktail therapy".
- ✓ This therapy was approved by TFDA in July 2024, and will target an overall market of more than NT\$400 million per year.

TTY will continue to present standard therapy options while screening new targeted medications to enrich oncology therapy lines, driving revenues, and echoing our vision of improving the quality of life with scientific innovation.



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Extensive Product Portfolio and Combinations for Local and Overseas Markets

Among the numerous unmet medical needs in Taiwan, the 2 territories of oncology, intensive care and anti-infection are the most critical. Our collaboration for a comprehensive R&D strategy, manufacturing, and complete product lines will keep us thinking of speed and quality. Other than research and marketing for the 2 fields, a series of novel types of drugs will also be introduced to Taiwan, giving medical personnel more remedy solutions. TTY aims at Taiwan-based international pharmaceutical company that specialize in cancer treatment and severe case anti-infection.

Year 2024, TTY takes "providing diversified medical solutions for global medical care" as its mission and strive to enhance the breadth and depth of its overseas market deployment. Based on its excellent product quality and innovative cooperation model, the proportion of overseas market revenue has steadily increased from 11% in year 2023 to 13% which demonstrating the effectiveness of global market development.

Focus on the US market: continuous breakthroughs and steady growth

Deepening Vietnam’ s layout: a model of medical cooperation program

Steadily deepening its presence in Thailand: consolidating its bridgehead in the ASEAN market

Comprehensively promote the development of ASEAN and emerging markets

TTY’ s overseas deployment not only limited on sales expansion but also building the regional medical value chain, and becoming the promoter of the global medical solution.

CDMO (Contract Development Manufacturing Organization) to Expand the EU/US market

By lifting production capacity and quality, we plan to introduce the self-developed complex generic Liposomes, Lipo-AB to the US, EU, and Southeast Asia. At the end of 2022, Lioudu, the production site of the generic drug, acquired US FDA’ s certification and began to supply the US market stably. In Q2 2023, we started partnerships with international pharmaceutical company to joint-developed and promote the market share of Liposome products. In recent years, we also have worked with EU, US, and Japanese pharmaceutical companies on exploring solutions to global medical issues and establishing global markets through industrial collaboration.

TTY Operational Development Strategies

Short-term Development Plans

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Long-term Development Plans

R&D Strategy	<ul style="list-style-type: none"> Seek the evaluation and investment balance of targeted drug development for the initial, middle, and final phases; optimize product combinations and competence of the targeted disease treatment domain (specialty drug, biological drug, new drug). Sustain the company’ s short- and long-term growth momentum as well as value chain integration. Foster international partnerships and/or self-accelerated development to meet unmet medical needs, high-barrier drugs, the need for brand-name drugs and new drugs with specialty dosages of profitable value, or clinically and medically associated products with a market niche.
Production Strategy	<ul style="list-style-type: none"> Continuously maintain drug manufacturing sites that follow, renew, and comply with international drug regulations. Install a new production line for new drugs to accomplish the commercialization and globalization of drugs of specialty dosage forms and new drugs for production integration. Marketing Strategy Maximize manufacturing energy and supply chain management through critical strategic actions including M&A, strategic alliances, and joint ventures; complete consolidation of production quality and efficiency.
Marketing Strategy	<ul style="list-style-type: none"> The ongoing optimization of business activities and business life cycle management for each target market. TTY’ s international business development expansion through company-owned and co-developed competitive specialty drugs, sustainable co-development business practice pattern, and cross-border consolidated marketing strategies for new and specialty drugs. Accelerate the expansion of overseas sales and distribution; strengthen proprietary trading markets and targeted management; extend corporate core market borders to enhance the Company’ s mid-to-long-term revenue and international development diversity.
Operation Strategy	<ul style="list-style-type: none"> Commit to the development of new drugs, drugs with specialty dosages, biological drugs, and medical treatment technology to create a more complete product portfolio. Continue to strengthen and develop high-barrier dosage drug platforms to extend their application benefit. Continue to expand the development and manufacturing territories for cancer, intensive care, anti-infection, and specialty dosage drugs; continue to increase international market share. Become one of the world’ s most innovative biotech pharmaceutical companies and the most sought-after partner to work with for international biotech companies.

Pharmaceutical Industry Value Chain

The Power of Intellectual Property

- Investment in R&D
- Patent and Brand Deployment

Supplier Screening and Management

- Eligibility of New Suppliers & ESG Selection & Survey
- Assessment for Existing Suppliers & Classification Management

Drug Safety

- PIC/S GMP Certifications
- Supply Chain Traceability
- Cold Chain Management
- Subject Safety
- Drug Safety Surveillance Management & Adverse Reaction Reports

Responsibility of Sales

- Marketing Regulations
- Reasonable Pricing

3 Supply Chain Management



Key Performance

- ✓ Currently holding **140** valid drug licenses.
- ✓ More than **36** pharmaceutical items were listed in the NHI Pharmaceutical Benefits and Reimbursement.
- ✓ By the end of 2024, **3** valid invention patents were awarded.
- ✓ By the end of 2024, **202** valid trademarks were granted.
- ✓ The trial drug is in full conformity with International PIC/S GMP Pharmaceutical standards and Good Distribution Practices for products.

Pharmaceutical Industry Value Chain

In the pharmaceutical manufacturing supply chain, there are 3 stages: upstream, midstream, and downstream. Upstream and midstream refer to the preparation of raw materials (APIs), while downstream involves the manufacturing of drugs and sales channels. Drugs are categorized into original, bioequivalence generic (BE) drugs (imported or domestic), and non-BE generics. In Taiwan's pharmaceutical industry, most suppliers focus on downstream operations and manufacture and sell non-BE generics. However, TTY is a leading biotechnology pharmaceutical company that offers one-stop services from research to production and sales. They specialize in developing specialty dosage forms and new drugs. No significant changes in the supply chain occurred during the reporting period.

Value Chain of TTY

Supply Chains	Upstream	Midstream	Downstream
Relationship	API Factories API Agencies	TTY Biopharm	Sales Channels Distributors
Activities	<ul style="list-style-type: none">• Manufacture and sales of Active Pharmaceutical Ingredients (APIs) required for generic drugs• Provide APIs required for new drug development• Traders of raw materials	Manufacturing medicines with expired patent rights, and converting them into injections or tablets	Distribution and logistics services; the sale and promotion of medical drugs
Entities	<ul style="list-style-type: none">• API factories: Merck, Biofer, DuPont, DSM, Formosa Laboratories, ScinoPharm, SCI Pharmtech, Oriental Silicas, Ming Tai Chemical• Traders of raw materials: Lynnbros, Suanhong Trading, G. Excipients	Generic drug factories: TEVA, Pfizer, Roche, TTY Biopharm, Yungshin Pharm	<ul style="list-style-type: none">• Direct sales channels: medical centers and regional hospitals• Distribution: local hospitals, clinics, and pharmacies

The Power of Intellectual Property

Investment in R&D

TTY is a well-established company in Taiwan that specializes in high-quality manufacturing. It conducts active research and development to produce pharmaceuticals that address the unmet needs of the medical market. TTY has also expanded into overseas markets by producing complex generic drugs. TTY is considered one of the few pharmaceutical R&D and manufacturing companies in Taiwan that provides a one-stop service from front-end R&D to manufacturing to sales. The organization's R&D capability is at the forefront in Taiwan, having spent over NTD\$1.5 billion in R&D in the recent 5 years. Approximately 5% of its annual revenue is allocated towards R&D each year. In 2024, R&D expenses amounted to NTD\$271,392 thousand, which is 4.6% of total revenue. In the future, TTY will leverage the strengths of these platforms, invest resources, and develop products for various diseases such as those related to the blood-brain barrier, hormones, mental health, and other related diseases. Additionally, it will expand the drug indications to prolong product life cycles while continuing to allocate 6% of its annual revenue to R&D investment.

▼ TTY R&D Expenses in the Recent 5 years

Item	Unit	2020	2021	2022	2023	2024
Operating Revenue	Thousand	4,221,836	4,535,610	5,061,606	5,505,542	5,893,847
R&D Expense	Thousand	261,597	287,595	353,436	310,438	271,392
Percentage	%	6.20%	6.34%	6.98%	5.64%	4.60%

Patent and Brand Deployment

To facilitate successful R&D and product launches, TTY has filed corresponding patent and trademark applications. By the end of 2024, the Company had a total of 3 invention patents, 202 registered trademarks, and 12 trademark applications under review.

▼ Regional Distribution Statistics of TTY's Valid Patent and Trademark Applications

	Area	Taiwan	Japan	Korea	China	Southeast Asia	Others	Total
Number of Invention Patents	Certificates claimed	3	0	0	0	0	0	3
	Under application	0	0	0	0	0	0	0
Number of Trademark Patents	Certificates claimed	119	0	8	21	37	17	202
	Under application	4	0	0	4	4	0	12

Note: Statistics as of 31/12/2024.

Supplier Screening and Management

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Material Topic : Supplier Management

Corresponding GRI Index	GRI 308-1 New Suppliers That Were Screened Using Environmental Criteria GRI 308-2 Negative Environmental Impacts in the Supply Chain and Actions Taken GRI 414-1 New Suppliers That Were Screened Using Social Criteria GRI 414-2 Negative Social Impacts in the Supply Chain and Actions Taken
SDGs Principle	<div><div>8 DECENT WORK AND ECONOMIC GROWTH</div><div>17 PARTNERSHIPS FOR THE GOALS</div></div>
Impact Assessment	Related Stakeholder Engagement: Suppliers, Customers (+) Positive impact: With good management over the quality, cost, delivery, service, and supply consistency of suppliers, we can grow our brand image by word of mouth. (-) Negative impact: Suppliers' potential risks in the areas of employment, health and safety, environment, and ethics and morality can damage the governance, environment, and society, and affect the sustainable operation of the global supply chain.
Policies and Commitments	Enhance management so that the supply chain conforms to laws and regulations, values quality and self-discipline, and improves overall competence and operation flexibility.
Goals and Targets	In addition to quality and legal compliance review, new suppliers must align in terms of sustainable development. We also emphasize implementation among existing suppliers.
Responsibilities and Resources	The procurement team reviews suppliers and manages vendors' sustainable development strategies according to SOP and survey.
Annual Action Results	<ul style="list-style-type: none">• In 2024, all new suppliers were screened and selected according to the selection mechanism.• From 2022 to 2024, the total cumulative number of existing cooperative suppliers' commitments to fulfill ESG commitments reached 55%.• The result of the annual assessment concluded that no supplier should be stopped from trading due to significant quality hazards.

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Eligibility of New Suppliers & ESG Selection and Survey

Active pharmaceutical ingredients (API) are substances extracted from natural plants, synthesized chemically, and then processed by the Company's high-quality technology to create a universally approved and certified safe drug that can be used directly by patients. API, or Active Pharmaceutical Ingredient, is a crucial component of drugs that determines their safety and effectiveness. Therefore, TTY, as a responsible corporation, cautiously inspects and manages EU and US brand-name drug suppliers. We use Drug Master File (DMF), current Good Manufacturing Practice (cGMP), and Pharmaceutical Inspection Co-operation Scheme (PIC/S) GMP as the primary criteria for selecting the appropriate suppliers. We also conduct a thorough examination and assessment of their manufacturing of raw materials, product risks, competency in quality system control, and order execution.

TTY provides a survey to new and existing material suppliers, as described in the Supplier Assessment Guidelines. The survey includes management of API factories and suppliers of each TTY site and ESG questionnaires, regarding proper recycling of solvents, cleaning procedures and validation of production equipment, pest and rodent control, proper air conditioning, and a water system to avoid cross-contamination. It also includes a SOP to minimize environmental impact, and evaluation and continued strengthening of, and compliance with, control concerning environmental risks. All fields must be approved by a professional consultant. Moreover, TTY conducts ad-hoc audits on all suppliers based on a review plan to ensure consistent quality. Inspections are carried out either by questionnaire or on-site inspection.

We evaluate our suppliers based on the four policies - Quality Assurance, Stable Production Capacity, Cycle Time Reduction, and Sustainability. Our advanced Supplier Management Mechanism ensures that we select potential suppliers based on their qualifications, renew existing suppliers, and assess, grade, manage, and offer correction guidance for potential risks. This mechanism ensures that our partnership with vendors is sustainable and transparent. Starting in 2024, all new suppliers were selected based on this selection mechanism.

1. Quality Assurance: Assessment and onsite due diligence to ensure a quality system and supply.
2. Stable Production Capacity: Multiple suppliers are required to maintain a flexible and stabilized supply and quantity.
3. Cycle Time Reduction: Credible suppliers with qualified delivery capabilities are needed to promote cycle time reduction.
4. Sustainability: Establishing long-term partnerships is crucial to building stable developments and creating a sustainable supply chain. TTY requires its suppliers to follow eco-friendly practices and prioritize safety, security, human rights, and corporate social responsibility. Additionally, suppliers must engage in risk management and have a sustainable operational plan.



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Evaluation for Existing Suppliers & Classification Management

- General evaluation: Scores are deducted for any abnormality of material delivered by suppliers and referred to for annual evaluation.
- Suppliers' assessments are held annually, and these assessments include Cycle Time (on time, credibility), Quality (stable supply quality), Customer Complaints (whether have significant mistakes, timely improvement of customer quality complaints); Supportiveness (speedy and immediate return and exchange of goods); and Sustainability (environmental protection and human rights assessment).
- The on-site audits and paper review results are categorized to grade and manage our suppliers.
- Suppliers failing to meet TTY's requirements are terminated from the purchase contract and subsequently removed from the supplier list.

▼Grading and Management for Chungli and Lioudu Suppliers

Grade	Risk	Scores	Measures
Grade A	Low	90 ~ 100	1. Supplier to be considered when new items are required to be purchased. 2. "Paper review" based inspection.
Grade B	Medium	70 ~ 89	1. Normal purchase contract. 2. Paper review-based inspection. Suppliers should provide an action plan according to the inspection results. When improvements fail to meet TTY's requirements, an on-site inspection** will be conducted.
Grade C	High	≤ 69	1. Discontinue purchasing items from the supplier. 2. Deemed disqualified and the contract is terminated.

The 2024 review and investigation at Chungli and Lioudu sites reported no suppliers achieving a Grade C or who did not qualify. No obvious negative impact was discovered during the environmental and societal (human rights) assessment.

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Paper Review

Other than routine quality surveys, the Taipei headquarters and purchase teams each perform a Sustainable Supplier Review as well as giving an assessment score. Each site then selects the suppliers it needs. In the recent 3 years, the total number of existing cooperative suppliers who responded to the "Supplier ESG Self-Assessment Questionnaire" has reached 55%.

The Supplier ESG Questionnaire contains the following.

Economy	Quality	Environment	Human Rights
1. Operation Overview	1. Management of Source Suppliers	1. GHG Emissions	1. Occupational Safety and Health
2. Client Management	2. Quality Control	2. Water Resource Management	2. Promotion of Worker Health
3. Safety Stock, Delivery Time	3. Drug Master File	3. Energy Management	3. Welfare Policy
	4. Relevant GMP Compliance	4. Waste Management	4. Feedback Channels
	5. GDP Compliance	5. Overall Environmental Evaluation	5. All Forms of Discrimination
		6. Environment, Safety, and Health	6. Compliance with Laws and Regulations
		7. Compliance with Laws and Regulations	

Onsite Inspections

TTY conduct on-site audits to strengthen follow-up management and improvement measures for some suppliers that have not been rated A in the past two years. Suppliers should provide the following information as the criteria for on-site audits:

- Company Introduction: product supply, capacity, process description, facility, and equipment introduction.
- Environment, Safety and Health Management: information regarding overall environmental safety, health control and management, waste control, and cross-contamination prevention.
- Certificates and Licenses: acquired government or global certified QC documents (PIC/S GMP or ISO 9001) and certification of the environmental management system (ISO 14001).
- Quality System Management: a document for the procedure of handling CCs (Customer Complaints), defects, abnormality management, change management, and corrective and preventive action.
- Raw Material Information: SDS and COA, production procedure.

In year 2024, Chungli factory conducted 2 on-site inspections for 2 suppliers, and Lioudu factory 3 times.

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Chungli Factory

In 2024, qualified suppliers of the Chungli factory include 603 raw material suppliers (OEM included) and 111 manufacturers, of which 126 are raw materials (API and Excipient) and 477 are materials. There were 14 additions in 2024, of which 3 comprised raw materials and 11 material suppliers.

▼ 2024 TTY Chungli Factory Supplier List

Category	API	Excipient	Packing Material	Total
Number of items	34	92	477	603
Number of manufacturers	25	45	41	111

The results indicated 304 classified as Grade A represented excellent, 1 as Grade B continued improvement to meet the standards, and none as Grade C.

▼ 2024 TTY Chungli Factory Items Classified Assessment Results

Category	API	Excipient	Packing Material	Total
Grade A Supplier (lowest risk)	23	59	223	305
Grade B Supplier (moderate risk)	0	0	1	1
Grade C Supplier (highest risk)	0	0	0	0
Total	23	59	224	306

Lioudu Factory

Qualified suppliers of the Lioudu factory include 497 raw material suppliers and 188 manufacturers, of which 277 are raw materials (API and Excipient) and 270 are material suppliers. There were 31 additions in 2024, of which 13 were raw materials and 18 were material suppliers.

The 241 items purchased in 2024 by the Lioudu factory were assessed based on quality and customer complaints. The results indicated that 241 classified as Grade A, 0 as Grade B, and 0 as Grade C.

▼ 2024 TTY Lioudu Factory Supplier List

Category	API	Excipient	Packing Material	Total
Number of items	90	137	270	497
Number of manufacturers	67	75	46	188

▼ 2024 TTY Lioudu Factory Items Classified Assessment Results

Category	API	Excipient	Packing Material	Total
Grade A Supplier (lowest risk)	47	93	101	241
Grade B Supplier (moderate risk)	0	0	0	0
Grade C Supplier (highest risk)	0	0	0	0
Total	47	93	101	241



Drug Safety

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Material Topic : Drug Safety

Corresponding GRI Index	GRI 416-1 Assessment of the Health and Safety Impacts of Product and Service Categories GRI 416-2 Incidents of Non-compliance Concerning the Health and Safety of Products and Services
SDGs Principle	<div><div>3 GOOD HEALTH AND WELL-BEING</div><div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div></div>
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers and Media</p> <p>(+) Positive impact: International compliance, the adoption of GMP, distribution, marketing of good drugs, and monitoring of drug safety contribute to quality, protected logistics, user safety, corporation reputation, and trustworthiness.</p> <p>(-) Negative impact: Mismanagement can severely endanger patient rights, leading to product recalls or removal from shelves, delays in product launches, and a loss of trust from regulatory authorities, users, and partners, resulting in a direct hit to revenue and reputation. This can create crises and operational risks within the market.</p>
Policies and Commitments	To facilitate patients' access to high-quality, safe and effective, and affordable medications, TTY rigorously enforces drug safety management protocols. This includes adherence to regulations set forth by the Taiwan Food and Drug Administration (TFDA) regarding safety information for pharmaceutical products, as well as compliance with international standards to uphold drug safety standards.
Goals and Targets	<p>Continuous Goals</p> <p>TTY complies with the International PIC/S GMP Pharmaceutical Standards and Good Distribution Practice for product distribution to ensure pharmaceutical manufacturing and sales processes meet standards, so that the company provides safe products for clinical treatment.</p> <p>Mid- to Long-term Goals</p> <p>To realize the corporate vision of improving the quality of people's lives with scientific innovation, TTY actively accommodates medical needs through 3 product territories:</p> <ul style="list-style-type: none">• Oncology: Aims to offer cancer patients high-quality anti-cancer drugs, so that TTY can provide patients and physicians with optimal treatment plans.• Intensive Care: Moving toward the emergency and severe diseases territory, as well as the approach of disease prevention actively. Meanwhile, we expect through the vaccination to protect the communities from the occurrence and spread of influenzas.• Healthcare: The nutritional supplements cater to the needs of different patients and improve people's health.

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Material Topic : Drug Safety

Responsibilities and Resources	<p>Our consistent practice of Adverse Drug Reaction Reporting is realized through procedure and training. Specialists promptly report any adverse reactions within the specified timeframe to uphold drug safety standards. Notifications to the FDA are made within 15 days, and medical monitors assess the reported data to identify potential safety signals. Response actions are then determined based on thorough risk analysis.</p>
Annual Action Results	<ul style="list-style-type: none">• TTY works in compliance with International PIC/S GMP Pharmaceutical Standards and Good Distribution Practices, and 100% of its primary products are subject to health and safety regulatory audits. No product or service has been found to have violated health and safety-related regulations.• TTY's product range comprises both licensed-in and self-manufactured drugs. For licensed-in drugs, we guarantee that the production processes and quality standards in the country of origin adhere to both Taiwan's drug manufacturing regulations and those of the respective locality. Similarly, our self-manufactured drugs must comply with local drug manufacturing regulations and meet the quality and manufacturing specifications of the export destination country.• The well-established drug safety monitoring system continues to monitor risk control measures. Regular drug safety reports are submitted by designated deadlines and are aligned with Regulations for the Management of Drug Safety Surveillance.• We observe drug safety monitoring and follow personal data protection and other applicable laws when gathering, processing, and using personal information.• According to the TFDA's Reporting Regulations for Reporting Severe Adverse Drug Reactions, it collects safety information on drug products and completes reporting within a specified time limit. The compliance rate reached 100%, ensuring the implementation of drug safety management.• All employees at TTY have undergone comprehensive internal training on Adverse Drug Reaction Reporting and have successfully passed the assessment.

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To enforce drug safety management, TTY has allocated substantial resources across the drug research and development, production, storage, and labeling processes, ensuring the safety of our products. In addition to implementing various safety control measures for licensed-in and authorized drugs, as well as brand generic drugs, TTY has pioneered featured products utilizing liposome and microsphere coating, along with long-acting sustained-release injection technology, aimed at minimizing the body's drug burden. Furthermore, all TTY-sold drugs are accompanied by a package insert containing usage instructions as mandated by law, with the package insert also available for reference on our official website.

▼ Safety Control Measures by TTY

Licensed-in and Authorized Drugs	Brand Generic Drugs
<ul style="list-style-type: none">Before introducing licensed-in and authorized drugs, TTY first evaluates the approval status of drugs in various countries around the world, for instance, if the drugs have been approved by the US Food and Drug Administration (FDA), the European Medicines Agency (EMA), or any of the other top 10 advanced pharmaceutical countries.If a drug requires clinical trials in Taiwan before its launch, TTY ensures compliance with the law by conducting these trials. We evaluate both efficacy and side effects based on the test results to substantiate the effectiveness and safety of our products. Dedicated personnel are assigned to monitor drug safety throughout the process.After the drug is launched, incidents of adverse drug reactions are evaluated, and a real-time reporting mechanism is established. A reporting mailbox for adverse drug reactions is also set up at: drugsafety@tty.com.tw.	<ul style="list-style-type: none">Brand generic drugs include oncology and anti-severe infection drugs.For generic drugs that need to undergo bioequivalence, TTY will conduct bioequivalence tests in accordance with the Bioavailability and Bioequivalence Studies Regulations to apply to the central health authority for marketing authorization of such generic drugs.

PIC/S GMP Certifications

Products in the pharmaceutical industry are closely related to the health and safety of users so safety and effectiveness must be particularly reviewed. TTY follows the most stringent PIC/S GMP standards recognized around the world, and safeguards are in place for raw material supply, plant facilities, and equipment from the source of drug manufacturing. Production and quality control operations are also ensured via the prevention of cross-contamination, avoidance of confusion, validation, and other methods in the process to guarantee the continuous and stable manufacture of drugs. By the end of 2024, TTY obtained a total of 140 drug licenses, while more than 36 pharmaceutical items are listed in the Taiwan National Health Insurance (NHI) Pharmaceutical Benefits and Reimbursement Schedule.

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▼PIC/S GMP Inspection Certificate of TTY (Valid until 2025/09/30)



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▼Statistics of Valid Drug Licenses of TTY in 2024

Business Unit	Domestic	Foreign	Subtotal
Oncology Business Unit (TOT)	40	60	100
Intensive Care Business Unit (TIT)	23	2	25
Key Account Management Division (KAM)	8	7	15
Total	71	69	140



Supply Chain Traceability

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Material Topic : Counterfeit Drugs

Corresponding GRI Index	Self-established Topic
SDGs Principle	<div><div>3 GOOD HEALTH AND WELL-BEING</div><div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div></div>
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers, Local Communities, NPOs/NGOs and Media</p> <p>(+)Positive impact: Managing a safe, traceable supply chain enables TTY to effectively control product quality, promptly detect and remove doubts, prevent counterfeiting, and minimize potential defects, recalls, and the return of products.</p> <p>(-)Negative impact: Failure to effectively manage the information and traceability of drug materials poses significant risks to the product supply chain, drug quality, and user safety. This indirectly jeopardizes our credibility and reputation.</p>
Policies and Commitments	<p>Unwitting access to counterfeit and fake products within the supply chain presents significant challenges. To mitigate this risk, TTY exclusively procure raw materials from registered, reputable companies listed as qualified suppliers. Our transportation procedures are meticulously documented, providing customers with full visibility into the drug supply chain. Operating in compliance with Good Distribution Practice (GDP) and Good Manufacturing Practice (GMP) standards, our methods ensure traceability and uphold the safety and stability of the supply chain.</p>
Goals and Targets	<p>Continuous Goals</p> <p>TTY and all suppliers remain GDP-compliant, routine supplier assessment to keep quality and packaging integrity during storage and transportation.</p>
Responsibilities and Resources	<p>Specialists monitor API and drug GDP compliance.</p>
Annual Action Results	<p>TTY, along with its API suppliers and logistic services are GDP-certified operators, ensuring quality and packaging integrity during storage and transportation, and deliver to customers within a reasonable timeline. Regular assessments and quality contracts maintain standards and prevent counterfeit product entry into the supply chain.</p> <p>We fortify logistics service management by employing GPS during product transportation. Drugs are driven to their designated medical establishment which notifies us if the delivery did not arrive, ensuring drug quality and safety for users.</p>

Letter from
the CEO

Cold Chain Management

As the leading manufacturer of Liposomes in Asia, TTY enforces stringent control over API management, product storage, and cold chain logistics. This commitment ensures drug quality and stability meet international standards, safeguarding customer safety.

Step	Step Statement
1. API Management	Despite Taiwan's API management not yet being under GDP, the Chungli factory has followed the international management system and is ready to follow potential regulations in Taiwan. API storage and management comply with the GDP of PIC/S GMP. Liposome is a product under cold chain management. Since the arrival at the factory, the API and excipient of Liposome are stored in a temperature-controlled warehouse until entering the manufacturing process.
2. Product Storage	Once the products are packaged, they are immediately stored in a warehouse at 2°C ~8°C. To ensure 24-hour temperature control, all refrigeration warehouses are equipped with 2 air conditioners and fans, so either can cover a faulty air-conditioner should the occasion arise. All refrigeration warehouse equipment has backup power to prevent equipment malfunction or power disruption. General maintenance of refrigeration warehouses includes twice-daily inspections and continuous monitoring via data loggers and alarms. If temperatures deviate from the specified range, flashing lights and sound alarms activate, prompting security to notify relevant authorities. Access to refrigeration warehouses at the Chungli factory is restricted to authorized personnel only, minimizing temperature fluctuations caused by unnecessary entry and exit. Additionally, Temperature Mapping Qualification (TMQ) is conducted during the coldest and hottest seasons to ensure storage temperatures meet requirements.

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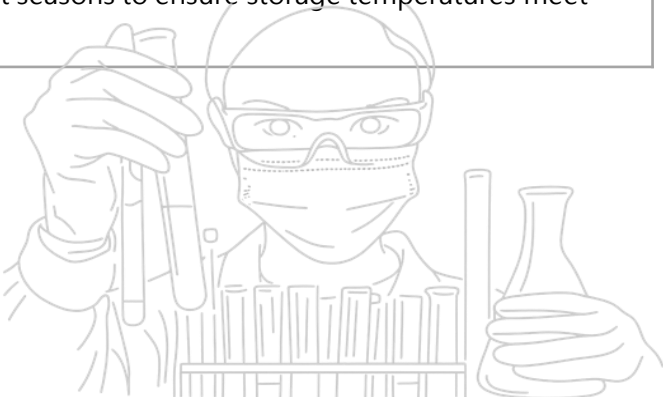
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Step	Step Statement
3. Cold Chain Product Transportation	<p>2°C~8°C end-to-end temperature control must be maintained during the transportation and delivery of Liposome to hospitals and clients. The warehouse and QC departments have conducted several visits and audits to find a qualified logistics company that can ensure the storage, delivery, and temperature control of LN2, gel packs, and dry ice. TTY has signed agreements with select logistics companies, which have been designated as qualified cold chain logistics suppliers. Our Liposome products are transported from the refrigerated warehouse at the Chungli factory using specially designed refrigerated delivery boxes made from qualified materials. Each shipment includes clear guidelines on the maximum number of times ice can be used, its effectiveness period, and other standard procedures. Additionally, the package is sealed using TTY-logo void tape with a 3M Monitor Mark, ensuring security and integrity during transit. TTY invests nearly a million NTD annually on WHO-certified 3M Monitor Marks to uphold quality standards. There were no reported cases of abnormal temperatures in 2024.</p> <p>Cold chain delivery by ground or by air to the Taiwan mainland, Kinmen, and Penghu should not exceed 24 hours from pickup to proof of delivery. 3 statistic tests and route dynamic tests are each performed for different box sizes, and the shortest delivery time should be selected and recorded as a standard for general transportation management. Validations should be run once every summer and winter to eliminate various factors affecting temperature changes during transportation.</p>
4. Continuous Improvement	<p>To enhance the stability of its cold chain, TTY has streamlined the design of coolers' inner boxes, standardizing the material and volume, and the new inner box outperforms the original, offering more stable temperatures to ensure the product quality, and also to simplify material and storage management. In response to inventory and shipment increased, and optimized the cancer factory production line, TTY has also completed the expansion of cold storage space and replacement or purchase additional cold storage warehouse equipment in 2022~2023.</p> <p>In the future, TTY will continue to improve and enhance cold chain management in response to product storage and transportation needs.</p>

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Subject Safety

The management and monitoring of research drugs adhere to the standards outlined in PIC/S GMP (Part I, Attachment 13 of the Good Manufacturing Practice for Pharmaceuticals in Taiwan), ICH E6 (Good Clinical Trial Practice Guidelines for Pharmaceuticals in Taiwan), and the standard operating procedures of the pharmaceutical research institute. All processes are documented in both written and electronic formats to ensure effective management and compliance.

Furthermore, to ensure subject safety, human research and clinical trials of cancer drugs undergo approval by both the ethics committee of the testing institution and the local health authority. They are conducted in strict accordance with the standard operating procedures of the medical academic division and comply with relevant domestic and foreign laws and regulations, including ICH E6 and human research laws. Insurance coverage is provided on a case-by-case basis. Potential risks, compensation for damage, and insurance details are explicitly outlined in the Informed Consent, allowing subjects to make informed decisions about participating in a clinical trial. In 2024, no TTY business group incurred monetary losses due to legal suits related to drug clinical trials in developing countries.

Material Topic : Subject Safety

Corresponding GRI Index	Self-established Topic
SDGs Principle	<div><div>3 GOOD HEALTH AND WELL-BEING</div><div>12 RESPONSIBLE CONSUMPTION AND PRODUCTION</div></div>
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers, Local Communities, NPOs/NGOs and Media</p> <p>(+) Positive impact: Legal compliance and a high standard of clinical trials enable us to gain reliable data on the safety and efficacy of drugs on humans, provide references to the drug registration and patient treatment, and minimize legal risks.</p> <p>(-) Negative impact: Legal violations and safety concerns regarding subjects pose substantial risks to their health and can lead to significant costs. This may result in delays in drug development and launches, failure to obtain necessary licenses, and ultimately harm the company's reputation.</p>
Policies and Commitments	We adopt and manage by the strictest standards and all business units follow "Human Research Law" and "Regulations for Good Clinical Trial Practices" as we are committed to the safety and welfare of the clinical trial subjects.
Goals and Targets	Enhance quality control of clinical trials to ensure subject safety, rights, and data credibility.

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Self-established Topic : Subject Safety

Responsibilities and
Resources

TTY follows the Good Clinical Trial Practice Guidelines for Pharmaceuticals to establish SOPs for clinical trial practice, and only those who have completed the training and passed the assessment can perform clinical trial related work, and assigns well-trained specialists to execute work to ensure drug safety.

Annual Action Results

- All our trial drugs fully comply with the International PIC/S GMP Pharmaceutical Standards, and GDP, and the management, return, and destruction of trial drugs fully adhere to the Clinical Trial Practice Guidelines for Pharmaceuticals without any violation of health and safety laws.
- All staff members of the Medical Affairs Division in the oncology unit and the TIT Clinical Research Department have undergone SOP and regulation training and have successfully passed the required tests.
- The Oncology Unit's protocols must be IRB approved and signed agreement to carry out any clinical trial. During the trial, specialists regularly monitor the progress in compliance with the Good Clinical Trial Practice Guidelines for Pharmaceuticals.
- TTY and investigators conduct trials in accordance with the protocols approved by the Ministry of Health and Welfare and Research Ethics Committee (REC). The results of on-site inspections and audits by the competent authority and REC did not locate any significant deficiency or violation, proving the strict quality we hold regarding subject safety and trial execution.
- The Intensive Care Unit's protocols must be TFDA-and-IRB-approved to carry out any clinical trial. During the trial, specialists regularly monitor the progress.



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Drug Safety Surveillance Management & Adverse Reaction Reports

The TTY Drug Safety Team reports to TOT, TIT and KAM. The team for the collaborations and coordination conducts according to the “Plan for the Management of Drug Safety Monitoring” to ensure the collection and report of drug safety information comply with the Pharmaceutical Affairs Act, Regulations of Drug Safety Surveillance Management, and Regulations for Reporting Severe Adverse Drug Reactions.

Plan for Drug Safety Surveillance Management	In compliance with the Regulations of Drug Safety Surveillance Management, our Drug Safety Team has finalized the Drug Safety Surveillance Management in 2022, and Continuous updates in 2023 and 2024. This comprehensive plan delineates the roles and responsibilities of TTY members, outlines the planning, operation, and management of monitoring activities, identifies sources and methods for collecting, analyzing, and controlling drug safety information, and reports on the implementation outcomes and quality of monitoring efforts.
Education Training of Drug Safety Surveillance	In compliance with legal safety requirements, TTY conducts annual online training lectures for all employees and maintains records of this training. In 2024, all employees, including new hires in 2024, received the required annual training, achieving a 100% completion rate.
Risk Management of Drug Safety	For the safety and risk of market-available drugs, TTY applies drug risk management procedures following drug risk levels and Regulations of Drug Surveillance Management. We relay to the medical specialists with "Medical Professionals Communication Program" and "Special Risk Preventive Measures" for market-available drugs that require risk management, and provide "Drug medication instruction" to users to minimize drug risks and safeguard people with good practice.
Mechanism for Reporting Severe Adverse Drug Reactions	<div>To file a report about a severe adverse reaction after normal application of market-available drugs, make use of the following channels.</div> <ul style="list-style-type: none">• Medical specialists and the public may use the email address drugsafety@tty.com.tw on our official website to reach out to the responsible team.• Medical specialists and the public may look for the Report Hotline on our website to reach out to the responsible personnel.• Upon receiving reports, TTY reflects them on https://adr.fda.gov.tw/ following “Guidance for Market Available Drug Adverse Reaction Reporting, and Guidance for Market Available Vaccine Adverse Reaction Reporting.”

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Responsibility of Sales

Marketing Regulations

Material Topic : Marketing Ethics

Corresponding GRI Index	GRI 417-1 Requirements for Product and Service Information and Labeling GRI 417-2 Incidents of Non-compliance Concerning Product and Service Information and Labeling GRI 417-3 Incidents of Non-compliance Concerning Marketing Communications
SDGs Principle	
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers and Media</p> <p>(+) Positive impact: With comprehensive and accurate drug labeling, medical teams and administrators gain access to objective and authentic information, empowering them to deliver adequate services to patients. This enhances the corporation image and social reputation, and elevates our corporate value, underscoring our commitment to social responsibility.</p> <p>(-) Negative impact: Collaborative exaggeration, providing false information, and omission of crucial details can contribute to drug abuse, potentially leading to legal violations and tarnishing the brand image, and may result in compensation incidents.</p>
Policies and Commitments	<p>To promote transparent and ethical business practices and ensure that customers and relevant personnel engaging in business with TTY have a clear understanding of our standards, we have implemented guidelines for each unit and established a comprehensive code of conduct, which gradually achieve the goals of success business operations and sustainable management.</p> <p>TTY staff strictly adhere to the company's Drug Advertising Management and Standard Operating Procedures to ensure compliance with regulations governing medical advertisements. This commitment helps minimize the improper promotion of medicines, which could lead to misinformation about drug effects. When marketing and selling products, our priority is the medical well-being of patients and the quality of care they receive. All actions in this regard must adhere to ethical regulations, and comply with legal regulations related to drugs and medical treatments.</p>

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Material Topic : Marketing Ethics

Goals and Targets

When conducting marketing, sales, or delivering products, a pharmaceutical corporation must comply with ethics and adhere to drug and medical regulations.
Our products are sold in conformity with the marketing promotion plan, which commits to the obligation and responsibility of a pharmaceutical firm to provide objective, authentic, and correct information. All relevant marketing personnel undergo annual training lectures covering product information and illness knowledge. This ensures that medical staff are well-versed in the use of each prescription drug, enabling them to provide patients with appropriate services.

Responsibilities and
Resources

TTY adopts procedures to hold events and training, designates employees to check the procedure of marketing events, and has established an internal review system to reinforce the compliance of drug marketing, which includes examination of multiple advertisement points to prevent any potential violations.
We provide medical personnel with thorough instructions and information regarding potential side effects. This ensures that risks are carefully considered, prioritizing patient well-being and enabling proper decision-making.

Annual Action Results

- All drug purchases in 2024 adhered to the Government Procurement Act, without violation of product information and labeling (such as the Pharmaceutical Affairs Act and Pharmaceutical Affairs Act Enforcement Rules regarding Drug Advertisements), and marketing and communication (including advertisement, promotion, and sponsorship) regulations.
- Online training includes drug safety monitoring and GDP management theory to eliminate potential drug violations. We have also reinforced our management mechanism. TTY drug advertisement checklist ensures that drug advertising management and standard operating procedures are in compliance by the marketing team and corporation.
- TOT regulates the marketing team to attend product knowledge refreshes at a minimum of 3 times every year. Approved package inserts are declared with complete information on our TTY website.
- TIT makes annual reports to the internal audit regarding compliance matters. In 2024, advertisement marketing and a NHI drug price and adverse drug reaction reports were audited to ensure full compliance in operations and by employees.
- In 2024, KAM conducted 3 product knowledge courses with assessment tests; re-communication on adverse drug reaction reports and made audit procedures regarding advertisement and marketing and adverse drug complaints and professional health education counseling. All programs and implementations are under the guidance of central laws.

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the CEO

All TTY products fully comply with the Regulations for Registration of Pharmaceutical Products on the labeling of products on outer packaging. The packagings are labeled with product ingredients and indications. The instructions, dosages, and precautions should be attached with the instructions. In 2024, no violation was made by TTY regarding product information, labeling regulations, and marketing communications for human use and animal use drugs.

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TTY Marketing Regulations and Principles for Drug Sales

- Marketing information should be clear, easily understandable, accurate, balanced, and complete so that information receivers are capable of deciding the therapeutic effects of drugs. Content should be based on evidence, such as labeling approval of scientific proof, and not contain any false or exaggerated information.
- spread the knowledge of our products, which must be of a reasonable price and related to medical treatment.
- Free drug samples may be offered to medical personnel with the privilege of prescribing such drugs to facilitate patient care. Drugs offered must be explicitly labeled as samples to eliminate resale or repurpose.
- Product information should be conveyed accurately and transparently, with the primary purpose of hosting and/or sponsoring medical conferences, seminars, marketing activities, and scientific or expert meetings being the dissemination of informed, scientific, or educational information.
- Medical personnel may be invited as consultants for paid meetings or activities, such as speeches, hosting or attending meetings, scientific studies, clinical trials, training programs, advisory board meetings, or market research purposes.
- Any interaction with patient organizations must be based on ethical regulations and respect the independence of the organizations.
- If marketing materials constitute drug advertising, the Ministry of Justice's approval shall be sought and the approval number marked on the materials as regulated. TTY staff have been following the Company rules and regulations in completing procedures and publishing advertisements.

Reasonable Pricing

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Material Topic : Reasonable Pricing

Corresponding GRI Index	Self-established Topic
SDGs Principle	
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers and Media</p> <p>(+) Positive impact: Proper pricing offers options for clinical treatment, removing the financial stress from patients, ensuring the accessibility, fairness, and continuity of supply, bringing positive reviews and consistent revenue.</p> <p>(-) Negative impact: Failure to establish reasonable pricing can result in violations of central policies, erosion of patient trust, negative media coverage, and reviews. This can disrupt collaborations with suppliers, and customer orders, and ultimately impact the financial status of the National Health Insurance (NHI).</p>
Policies and Commitments	<p>To fulfill the goal of quality, safe, and effective drugs at reasonable prices, we ensure full compliance with NHIA regulations. Each drug undergoes NHI coverage by category to ensure the price is covered by the NHI. The price adjustment also follows the National Health Insurance Act.</p>
Goals and Targets	<p>We follow applicable regulations within the drug and medical fields. Our price is based on cost with a reasonable profit. To introduce a new drug or authorized drug, we review the price adopted in the top 10 advanced countries and the medical technology report before authorization. We then run a financial impact simulation to advise the new addition to NHI coverage. The NHI covered price is determined through a conference; to further reduce the NHI financial impact, we also develop quality generic drugs.</p>

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Material Topic : Reasonable Pricing

Responsibilities and Resources	<p>We have a team dedicated to bringing in new drugs and NHI drug applications, while the development laboratory works on high-quality generic drugs that match NHI prices to balance out those of the original ones.</p> <p>The application for NHI pricing, which includes data gathering for the application, drug basic information, recommended NHI price, and references to prices of same-category drugs, is prepared by the marketing unit responsible for the product. This data encompasses information such as TFDA drug licenses, drug prices from the top 10 advanced countries, and clinical trial control prices. To ensure reasonable pricing, all application documents are authorized by TTY.</p>
Annual Action Results	<ul style="list-style-type: none">• One new product under procedure for NHI coverage (New drug Bobimixyn containing Type 2A new composition entered NHI coverage).• Operations of 2024 followed authority regulations and passed review. Prices were adjusted according to the NHI Agency's Drug Price Adjustment Detail.• 2024 drug prices were declared under the Guidelines for NHI Drug Price Adjustment. No notice from the NHI Agency was received indicating non-conformity.

▼TTY 2024 YoY Changes of Drug Sale Prices*(Note)

Business Unit	Portfolio (Number of Drugs)	Average Sale Price Changing Rate	Average Net Price Changing Rate
Oncology Business Unit (TOT)	49	-2.97%	-4.09%
Intensive Care Business Unit (TIT)	13	-2.4%	-2.2%
Key Account Management Division (KAM)	5	0%	-3.03%
Products With The Largest Annual Growth		69%	17.7%

Note: Changing ratio: (average price of 2024 portfolios - average price of 2023 portfolio of same period)/average price of 2023 portfolio of same period

Governance Structure

- Diversity and Professionalism of the Board of Directors
- Internal Control and Audits
- Functional Committees

Governance Principles

- Promote Corporate Sustainability Development
- Ethical Management

Risk Management

- Major Risk Items and Countermeasures
- Information Security Risks

4 Governance

A background image showing two business women in an office setting. One woman, wearing a grey blazer over an orange top, is pointing at a document on a table with a white pen. The other woman, in a dark blazer, is looking at the same document. The document has some text and a table visible. A laptop is partially visible on the right side of the table.

Key Performance

- ✓ TTY has been ranked among the top **5%** of TPEX-listed companies in the 11th TWSE Corporate Governance Assessment.
- ✓ The board comprises **2** female directors and **3** independent directors, which shows a diversified and independent governance culture.
- ✓ 8 board meetings were convened in 2024, with an attendance rate of **98.61%**.
- ✓ The average advanced training of board members reached **13.22** hours in 2024.
- ✓ The Remuneration Committee convened 2 meetings in total, and all members attended these meetings in person, resulting in a **100%** attendance rate.
- ✓ The Audit Committee also held 5 meetings, with all members attending these meetings in person for a **100%** attendance rate.
- ✓ In 2024, the Company did not receive any penalties for illegal incidents or violating any of the relevant laws and regulations.

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TTY closely monitors long-term investment market trends to determine whether an investment is profitable while considering environmental, social, and corporate governance factors. Additionally, TTY adheres to the OECD Principles of Corporate Governance published by the Organization for Economic Cooperation and Development to ensure the effective implementation of corporate governance.

To facilitate SDG 5 "Gender Equality," the Board of Directors has introduced the Taiwan Intellectual Property Management System (TIPS) to improve the intellectual property confidentiality management system. This echoes SDG 9 "Industry, Innovation, and Infrastructure." The Sustainable Development Committee and the Ethical Management Promotion Center (EMPC) are implementing a corporate sustainable operational development to respond to SDG 11 "Sustainable Cities and Communities." To meet SDG 16 "Peace, Justice, and Strong Institutions," the Company has established a system to prevent Interest Avoidance and implement independent supervision, ethics, and integrity. Finally, in response to SDG 17 "Partnerships for Goals," TTY follows international trends, implements risk evaluation and management, and fosters global sustainable development



TTY's directors are committed to creating value for stakeholders and contributing to global sustainable goals. The Company advocates the 17 sustainable development goals (SDGs) of the United Nations in terms of corporate governance.

Governance Structure

Diversity and Professionalism of the Board of Directors

At TTY, we strongly believe in the concept of integrity and value the interests of our shareholders. Our commitment to transparency and effectiveness is reflected in the composition of our Board of Directors, which forms a solid foundation for sustainable business practices. We are proud to have a diverse group of directors with different backgrounds and professional competencies that cater to TTY's business and development needs. They are all aligned with the Company's core value of integrity and possess expertise and skills covering a range of areas, including biotechnology, financing, banking, business, law, finance, and accounting. These competencies are essential for a functional board to maximize profits and supervise fraud prevention, ensuring the Company operates sustainably.

The board of directors comprises 9 members, ranging in age from 31 to 80, with 2 female members (22.22%) and 3 independent directors (33.33%). The current term started on 30/5/2024 and will end on 29/5/2027. The board members, hailing from Taiwan and the USA, represent both genders and bring a range of ages and expertise to the table. They are competent in business strategy and decision-making, with a focus on the economy, environment, and society. The board also acts in a supervisory capacity for the operating team and risk management. In 2024, TTY convened 8 board meetings, all attended by the directors in person, with an attendance rate of 98.61%.

The board oversees the Audit, Remuneration, and Sustainable Development Committees, each with a dedicated function to optimize the board's performance. The functional committees assist the board in supervising and managing the Company's vital activities, deciding on the overall remuneration policy and compensation for directors and managers, and facilitating plans and strategies for corporate sustainability. The CEO oversees the Occupational Safety and Health Team, business groups, centers, and other departments, each with its detailed role outlined in TTY's annual report.

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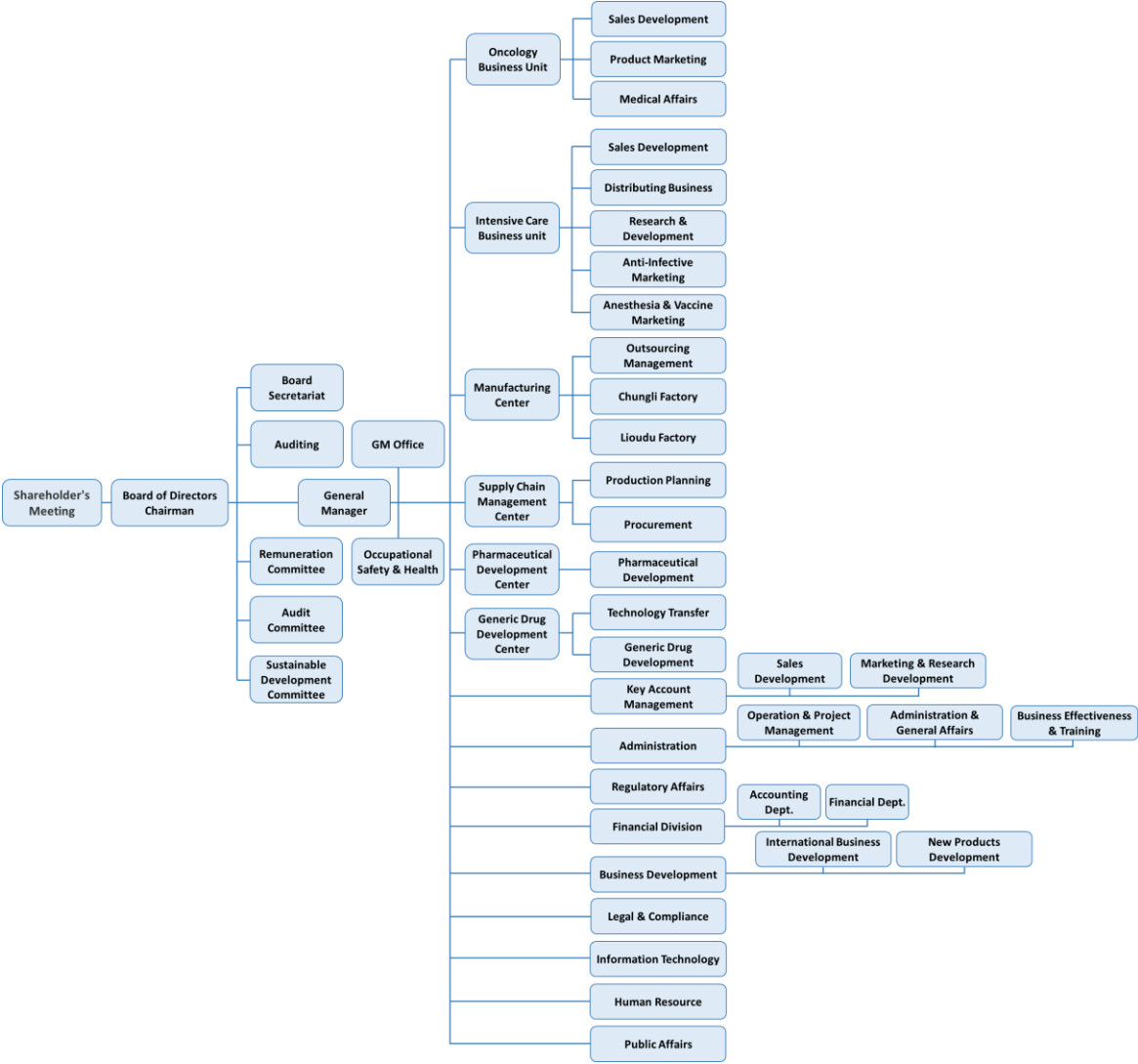
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▼ TTY's Board Members in Year 2024

Title	Name	Gender	Nationality	Age Group	Times to Attendance
Chairman	Lin Chuan	Male	R.O.C.	71-80	7
Vice Chairman	Chang Wen-Hwa	Female	R.O.C.	61-70	7
Directors	Carl Hsiao	Male	USA	31-40	7
	Yang Tze-Kaing	Male	R.O.C.	61-70	7
	Hsu Shih-Chang	Male	R.O.C.	61-70	7
	Liao Ying-Ying	Female	R.O.C.	61-70	7
Independent Directors	Cheng An-Li	Male	R.O.C.	71-80	7
	Hsueh Ming-Ling	Male	R.O.C.	61-70	7
	Chang Ming-Dao	Male	R.O.C.	71-80	7

Note: The new elected directors were appointed by the shareholders' meeting on 30/5/2024, and all of them were attended in-person of the 4 board meetings held in year 2024.

▼ TTY's Organization in 2024



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Board Meeting Resolution

The board meetings was held 8 times in 2024; an average of once every two months with an attendance rate of 98.61%. The performance of the Company and key ESG strategies and events were reviewed during these meetings, and the authorities for each matter were appointed and verified. The follow-up, supervision of progress, and updates were reviewed in consequent meetings. In 2024, the board discussed over 67 matters spanning 10 perspective matters, including the revision of articles, business management, finance and accounting, related party transactions, remuneration, and other key events.

▼ TTY's Board Proposals in 2024

Board Meeting total of 67 proposals									
Business Management	Appointment and Dismissal	Remuneration	Acquisition and Disposal of Assets	Related Party Transaction	Reinvestment Management	Finance and Accounting	Internal Control	Revision of Articles	R&D
17	7	9	2	5	4	6	2	14	1

Nomination and Selection of Board Members

On March 8, 2024, Lin Chuan, Chang Wen-Hwa, Carl Hsiao, Yang Tze-Kaing, Hsu Shih-Chang, and Liao Ying-Ying were nominated as board members by the board. Additionally, Cheng An-Li, Hsueh Ming-Ling, and Chang Ming-Dao were nominated as independent directors. The nomination process ensured that the nominees for independent directors met the criteria of professionalism, independence, and concurrent serving restrictions as outlined in the Regulations Governing the Appointment of Independent Directors and Compliance Matters for Public Companies. Subsequently, under these regulations and the Company Act, these nominees were shortlisted for positions as directors and independent directors for 2024. Finally, on May 30, 2024, all 9 nominees, including 3 independent directors, were elected as directors during a regular shareholders' meeting.

On January 15, 2018, the board decided to appoint Lin Chuan as chairman. He was subsequently re-elected for 2nd term, and 3rd time during a board election at a shareholders' meeting held on May 30, 2024. Mr. Lin's extensive background in economics, taxation, and financial matters, coupled with his prior experience as the CEO of a research organization, college instructor, and public official, as well as his tenure as chairman, director, and independent director of numerous listed companies (including VIS, Chartis Taiwan Insurance, Pegatron, Casetek Holdings, and Inotera Memories, among others), uniquely qualified him for the position.

Since 2011, Mr. Lin has held the position of chairman and remains dedicated to advancing biotechnology in Taiwan. His commitment is evidenced by his election as a director of PharmaEngine, a pioneer in novel drug development, in 2015. With extensive expertise in pharmaceutical drug development, innovation, manufacturing, and marketing, Mr. Lin brings a global perspective and profound understanding of corporate governance to the table. His invaluable insights are expected to contribute significantly to TTY's market strategy, manufacturing objectives, industry consolidation, mergers, and lean management practices. Under his leadership, TTY is actively pursuing international opportunities and aspires to set a standard for pharmaceutical companies, establishing itself as an industry leader in Taiwan. Mr. Lin's decision-making process, business management, strategy proficiency, and crisis-handling capabilities are welcomed as TTY enters this new chapter. Throughout his tenure as chairman, Mr. Lin has provided comprehensive guidance and advice on business management and investment decisions, aiding TTY in enhancing its corporate governance. His re-election demonstrates the continued confidence in his leadership. Please refer to the annual report for various metrics that illustrate the Board of Directors and its functional committees' commitment to core values.

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Interest Avoidance

TTY's adoption of the Board of Directors Rules of Procedure for Board Meetings follows the Regulations Governing the Procedure for Board of Directors Meetings of Public Companies and emphasizes the avoidance of conflicts of interest among directors. To address potential conflicts of interest, particularly if a director holds a position in counterparty, TTY implements measures to prevent and mitigate such conflicts. Directors are reminded in meeting notices to disclose any significant stake they may have in matters being discussed, especially if there is a potential conflict between a proposal and their personal interests or the interests of the corporation they represent. If a conflict of interest is likely to compromise the Company's interests, the director in question abstains from participating in discussions, voting, or representing another director's voting rights. Through the comprehensive system of avoidance of conflicts of interest, the board members required self-discipline and prudence to fulfill their ethical obligations as managers, and to execute business faithfully. In 2024, TTY reported 11 instances of practices aimed at avoiding conflicts of interest during board meetings, and the board members involved in relevant affairs were practically avoid the conflicts of interest. All practices for avoiding conflicts of interest concerning proposals discussed during board meetings are fully disclosed in the annual report.

Board Performance Evaluation

TTY conducts annual performance self-evaluations of the Board of Directors, functional committees, and individual directors. Additionally, every 3 years, TTY engages an external professional, independent institutes, or experts and scholars to conduct evaluations. The Remuneration Committee utilizes the results of these evaluations, both internal and external, to recommend remuneration payment standards and precise amounts, and these recommendations are based on the overall operating performance of the Company, serving as the evaluation basis.

Since 2016, TTY has implemented self- and peer evaluations among directors and the board, with annual evaluations submitted for review by the board in the following Q1. In 2024, the average score for the performance self-evaluation of the Board of Directors was 4.90 out of 5 points, while directors achieved an average score of 4.86 out of 5 points, and Audit Committee was scoring Of 4.94. Furthermore, the performance self-evaluation of Remuneration Committee and Sustainable Development Committee received full scores. These evaluation results were promptly submitted to the Remuneration Committee and the Board of Directors on February 25, 2025. Both the Board of Directors and the functional committees have demonstrated favorable performance.

In addition to self-assessment of the board and functional committees, external professional and independent institutes, experts, and scholars are engaged to assess the Company's governance according to the Regulations for the Assessment of the Performance of the Board and Functional Committees every 3 years. For the period from August 1, 2023, to July 31, 2024, TTY commissioned the Taiwan Corporate Governance Association to conduct an evaluation. The board assessment was divided into the 5 areas based on the composition of the Board and division of labor, guidance and supervision, authorization and risk management, communication and collaboration and self-discipline and improvement, and was conducted through a written review and on-site evaluation. For detailed summaries and suggestions provided by the Taiwan Corporate Governance Association, as well as the corresponding actions taken by the company, please refer to TTY's official website.

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Enhancing Directors’ Knowledge

To capitalize on opportunities arising from global risk trends and to enhance their understanding of economic, environmental, and social issues, the TTY board members aggressively participate in various advanced training courses to create maximum operational value for all stakeholders. In 2023, the average number of advanced training hours of board members was 13.22 hours.

Title	Name	Study Date	Course	Hour(s)	Total Hour(s)
Chairman	Lin Chuan	2024/08/13	Cybersecurity Risk Governance	1.5	15.0
		2024/09/04	Company Legal Compliance and Ethical Management, and Directors’ Understanding of Labor Standards Act Legal Practices - Friendly Workplace and Gender Equality Law	3.0	
		2024/09/24	How the Board of Directors Supervises Corporate Risk Management and Crisis Handling (Including Introduction to the Latest Practical Developments in Gender Equality Law)	3.0	
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	
		2024/11/12	Anti-trust and Competition Law Compliance	1.5	
		2024/11/13	Digital Technology and Artificial Intelligence Trends and Risk Management	3.0	
Vice Chairman	Chang Wen-Hwa	2024/09/04	Company Legal Compliance and Ethical Management, and Directors’ Understanding of Labor Standards Act Legal Practices - Friendly Workplace and Gender Equality Law	3.0	6.0
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	
Director	Carl Hsiao	2024/04/30	Practical Operations of the Sustainability Development Committee (Chief Sustainability Officer, Working Group)	3.0	15.0
		2024/09/04	Company Legal Compliance and Ethical Management, and Directors’ Understanding of Labor Standards Act Legal Practices - Friendly Workplace and Gender Equality Law	3.0	
		2024/10/16	20th (2024) Corporate Governance International Summit Forum - Focusing on Governance Priorities and Leveraging talent Advantages	3.0	
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	
		2024/11/14	Analysis of Corporate Acquisition Synergies and Practical Transaction Execution	3.0	

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Title	Name	Study date	Course	Hour(s)	Total Hour(s)
Director	Yang Tze- Kaing	2024/08/07	AI Industry New Trends and Ecosystem Competition and Cooperation	3.0	9.0
		2024/09/24	How the Board of Directors Supervises Corporate Risk Management and Crisis Handling (Including Introduction to the Latest Practical Developments in Gender Equality Law)	3.0	
		2024/11/13	Digital Technology and Artificial Intelligence Trends and Risk Management	3.0	
Director	Hsu Shih- Chang	2024/08/07	AI Industry New Trends and Ecosystem Competition and Cooperation	3.0	12.0
		2024/07/17	Operational Diversification Strategies Under Geopolitical Risk	3.0	
		2024/9/24	How the Board of Directors Supervises Corporate Risk Management and Crisis Handling (Including Introduction to the Latest Practical Developments in Gender Equality Law)	3.0	
		2024/11/13	Digital Technology and Artificial Intelligence Trends and Risk Management	3.0	
Director	Liao Ying- Ying	2024/09/04	Company Legal Compliance and Ethical Management, and Directors' Understanding of Labor Standards Act Legal Practices - Friendly Workplace and Gender Equality Law	3.0	6.0
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	
Independent Director	Hsueh Ming- Ling	2024/01/26	2024 Taiwan Economic Trend Analysis	3.0	32.0
		2024/03/29	Production Technology and Market Development of High-Value Steel Products	2.0	
		2024/04/18	Anti-Money Laundering, Counter-Terrorism Financing, and Insider Trading Prevention Education	3.0	
		2024/04/30	TCFD & SBTi Development Trends and Directors' Responsibilities	3.0	
		2024/05/03	Nickel Industry Development Prospects and Resilient Supply Chain Sustainability Management	3.0	
		2024/05/16	Financial Consumer Protection Act and Treating Customers Fairly Principles (Course content includes "Financial Inclusivity and Rights of Persons with Disabilities Convention")	3.0	
		2024/09/04	Company Legal Compliance and Ethical Management, and Directors' Understanding of Labor Standards Act Legal Practices - Friendly Workplace and Gender Equality Law	3.0	
		2024/09/05	Cybersecurity Threat Trends and Crisis Management	3.0	

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Title	Name	Study date	Course	Hour(s)	Total Hour(s)
Independent Director	Hsueh Ming-Ling	2024/10/16	20th (2024) Corporate Governance International Summit Forum - Focusing on Governance Priorities and Leveraging Talent Advantages	3.0	
		2024/10/30	Information Security Governance Practices: Analysis of Critical Management Issues	3.0	
		2024/11/08	Taiwan Cable Industry Development and Prospects, and Creating a Friendly Workplace (Including Sexual Harassment Prevention)	3.0	
Independent Director	Cheng An-Li	2024/06/21	Regulatory Framework for Sustainability Reports	3.0	12.0
		2024/08/02	Corporate Governance Officer Compliance Practices	3.0	
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	
		2024/11/15	Comprehensive Intellectual Property Protection Strategies—New Approaches to AI-Assisted IP Compliance Management	3.0	
Independent Director	Chang Ming-Dao	2024/03/21	Corporate Governance Lecture - Anti-Money Laundering and Counter-Terrorism Financing Regulations and Board Requirements	3.0	12.0
		2024/05/09	Corporate Governance Lecture - Introduction to Regulations Related to Fair Treatment and Protection of Elderly Customers and Policyholders	3.0	
		2024/07/09	AI Strategy and Governance	3.0	
		2024/10/17	AI Explosion: ChatGPT Chatbots Transforming Industry New Trends	3.0	

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Internal Control and Audits

Internal Audit Organization and Operation

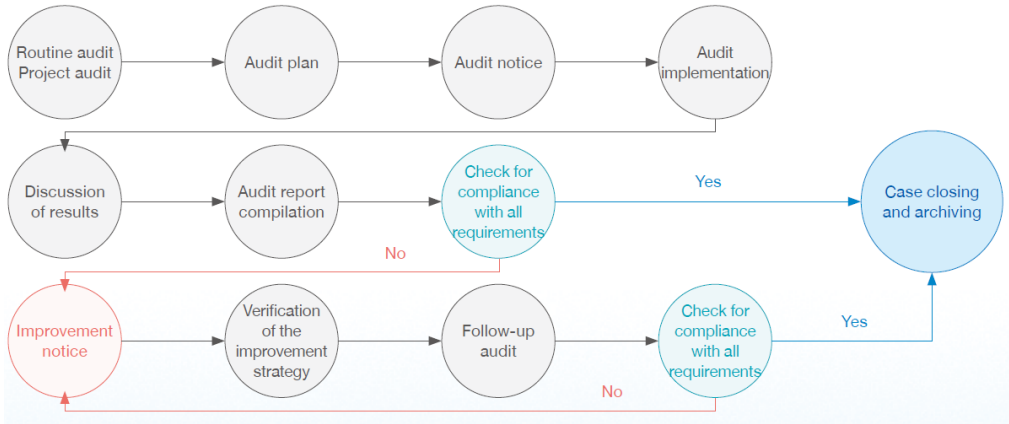
TTY manages internal audit affairs according to the Guidelines for the Establishment of Internal Control Systems of Public Companies, as long as in compliance to the domestic regulations of environmental, intellectual property, and drug advertising management. Furthermore, based on the evaluation requirements of foreign assessment institutes evaluate for corporate ESG implementation, we develop our own audit items and plans based on different operating cycle categories. The audit office, under the Board of Directors, is responsible for internal audits. The audit office has a chief auditor and a team of auditors tailored to the company's scale, business dynamics, management needs, and relevant laws and regulations. Internal auditors work autonomously to prepare the annual audit plan, identify monthly, quarterly and annual audit targets, and assess the internal control system. Upon the Board of Directors approval, audit reports, including any discrepancies found, are submitted. Audited business units are required to propose improvement measures, which are detailed in the audit report. Discrepancies and abnormalities are monitored, and the internal audit regularly report to the Audit Committee, which also attended the Board of Directors to report.

The Company has stipulated that the employment, assessment, and remuneration of internal auditors be based on employment, the performance development plan and performance bonus assessment, and salary management regulations in accordance with the Internal Audit System. Except for the employment of the chief internal auditor, which is approved by the Audit Committee before submission to the Board of Directors for approval, its performance bonus assessment has been reviewed by the independent directors before submitting to Chairman for approval. all remaining items shall be reported by the chief auditor to the Chairman for approval. Internal auditors shall be qualified and competent for the role, and engage in advanced training hours as required sustainably to conduct annual declaration.

▼TTY's Internal Audit Reporting Status

Submission Deadline	Report Content	Counterparty
End of January annually	Basic information of internal auditors	Website appointed by the competent securities authority
End of February annually	The implementation status of the audit plan in the previous year	
End of May annually	Discrepancies in the internal control system and improvement for abnormal affairs from the previous year	
End of December annually	Audit plan for the coming year	

▼TTY's Internal Audit Flowchart



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Types of Audits and Handling Status

The main audit aspects at TTY encompass "Operation," "Environment," and "Legal and Compliance," each consisting of various audit items. Audits are conducted according to scheduled frequencies, including routine yearly, quarterly, and monthly audits mandated by laws and regulations. Additionally, irregular audit items are addressed annually, even if not specified in relevant laws and regulations. Annual audit plan has been conducted in accordance with the BOD approval. In the audit findings for 2024, no abnormalities were identified. The Audit Office tracks the improvement plans for the recommended improvement items until the improvement is completed and closed.

▼ TTY Operation

Per Cycle	Frequency	Audit Items	Auditee
Cycle of Sales and Receipts	Half a year	<ul style="list-style-type: none">Samples and gifts, customer management, and payment collectingOrder processing, shipment, invoice issuance, and return of sold goods and discount	The BUs, Financial unit
Cycle of Purchasing	Half a year	<ul style="list-style-type: none">PurchasingContract management	SCM Center, Financial unit
Cycle of Production	Half a year	<ul style="list-style-type: none">Warehouse managementOutsourcing and OEM work	Manufacturing Center, SCM Center
Cycle of Payroll	Yearly	<ul style="list-style-type: none">Attendance, education and training, performance appraisal, job appointment, job promotion and transfer, and resignation operation	HR
Cycle of Financing	Yearly	<ul style="list-style-type: none">Reimbursement of general expenses, non-operating income and expenditure operationsShort term, mid-to-long term loans operation, and change fund operation	Financial unit
Cycle of Property, Plant, and Equipment	Yearly	<ul style="list-style-type: none">Disposal of property, plant, and purchase or disposal equipment	Financial unit
Cycle of Investment	Yearly	<ul style="list-style-type: none">Acquisition or disposal of assets	Financial unit
Cycle of R&D	Half a year	<ul style="list-style-type: none">R&D achievement management	Legal & Compliance
Computer Processing	Half a year	<ul style="list-style-type: none">Cybersecurity inspection	IT

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Per Cycle	Frequency	Audit Items	Auditee
Other Management Systems	Yearly	<ul style="list-style-type: none">Regulatory complianceAudit Committee meeting operation managementRemuneration Committee meeting operation managementSustainable corporate managementManagement of related party transactionsManagement of financial statement preparation process	All Functional units, SDC, Board Secretariat Division
	Half a year	<ul style="list-style-type: none">Standardized procedures for board meetingsSupervision and management of subsidiariesManagement of preventing insider trading	Board Secretariat Division, Financial unit
	Irregularly	<ul style="list-style-type: none">Management of personal data protectionSustainable corporate management	HR, Legal & Compliance

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▼ TTY Environment: Audit of 4 Major Categories

Category	Regulation(s) followed	Handling status
Occupational Security	Regulation Governing Occupational Safety and Health	A grade-A occupational safety and health business officer has been appointed.
Fire Protection	Enforcement Rules of Fire Services Act	Regularly overhaul fire safety equipment and complete the application of relevant overhaul items; implement fire extinguishing, notification, and shelter-seeking training.
Air Pollution	Air Pollution Control Act	Regularly monitor fixed emission sources and ensure the compliance of emissions with relevant standards.
Sewage	Water Pollution Control Act	Regularly monitor the water quality of effluents generated from the manufacturing site and ensure that the effluents comply with discharge standards without the risk of pollution.

In addition to explicitly incorporating relevant specifications into contracts or documents in accordance with regulations and management rules, the Company regularly conducts initiatives to promote regulatory compliance and provides corresponding education and training lectures to enhance employees' awareness. These efforts include education and training for new employees, programs related to the concept and protection of the Taiwan Intellectual Property Management System (TIPS), practices for submitting pharmaceutical advertisements for review and audit, and education training courses on corporation ethical management. In 2024, the Company did not receive any correspondence from relevant competent authorities or other entities, nor did it receive reports from internal units regarding new violations of regulations pertaining to intellectual property rights such as the Patent Act and Trademark Act, as well as the Personal Data Protection Act, Criminal Code, and Securities and Exchange Act.

▼ Internal Audit and Internal Control Systems of TTY Legal and Compliance

Category	Handling status
Intellectual Property Protection	<ul style="list-style-type: none">Perform internal control according to relevant corporate regulations including Regulation Governing Intellectual Property Management System and Documents and Regulation Governing Trade Secrets.Implement classified confidentiality and management of confidential documents.Specify the ownership of intellectual property rights and restrictions on their use in contracts related to intellectual property.Explicitly specify the ownership and confidentiality standards in the recruitment and termination documents regarding patents/trademarks produced by employees during their tenure.
Pharmaceutical Advertisements and Marketing	<ul style="list-style-type: none">Conduct internal control according to the Management of Pharmaceutical Advertisements and Standard Operating Procedure.For the pharmaceutical advertisements determined per the process, a relevant checklist shall be filled out, and an approval letter of the advertisement shall be obtained from the competent authority in advance.
Personal Data Protection	<ul style="list-style-type: none">Clauses regarding personal data have been included in contracts that involve personal data, e.g., annual health examination and testing contracts, etc. signed with employees of the Company, to ensure that the manufacturers do not use personal data without authorization.
Ethical Management	<ul style="list-style-type: none">Make notifications for the prevention of insider trading.Establish a clause in contracts prohibiting unethical behavior.

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Functional Committees

To assist the board with supervision, TTY has established Remuneration, Audit, and Sustainable Development Committees.

	Establishment Purpose	Members	Responsibilities	Annual Performance
Remuneration Committee	To streamline the remuneration system for board members and managers and ensure the equity of performance and individual compensation relative to economic, environmental, and social factors, TTY has established the Remuneration Committee under the Board of Directors.	3 independent directors 1 external expert	<ol style="list-style-type: none">1. The Remuneration Committee diligently reviews the remuneration system to ensure internal fairness within the Company. It takes into account industry payment standards, overall company performance, and the personal achievements of directors and managers in corporate governance and operational excellence. Additionally, the committee regularly provides recommendations to refine the remuneration structure.2. To assist the Board of Directors in evaluating overall remuneration and welfare policies. This ensures that TTY's remuneration practices align with relevant laws and regulations while upholding principles of fairness.3. In the future, it aims to integrate board member remuneration with sustainable performance metrics, encompassing environmental stewardship, employee well-being, and social responsibility. This approach will embed the ethos of sustainable operations throughout TTY's leadership, starting from the directors themselves.	It convened total 4 meetings, and the attendance rate of all members of the Remuneration Committee in 2024 was 93.75%.

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	Establishment Purpose	Members	Responsibilities	Annual Performance
Audit Committee	To strengthen supervision and reinforce management mechanisms, the board has established an Audit Committee in accordance with the Securities Exchange Act.	3 independent directors	Duties including financial statements, internal audits, internal control system, acquisition or disposal of assets, financial derivative transactions, fund lending to other parties, endorsements and guarantees, issuing securities, compliance with relevant laws, potential conflicts of interest among managers and directors, fraud investigations, risk management, employment, termination, and compensation of the CPA, and employment and termination of financing, accounting, and internal chief auditor staff.	It convened total 7 meetings, and the attendance rate of all members of the Audit Committee in 2024 was 100%.
Sustainable Development Committee	Following the Sustainable Development Best Practice Principles for TWSE/TPEX Listed Companies, TTY established a Sustainable Development Committee following the Principles of Corporate Social Responsibility Practice on October 7, 2019 (renamed as the Principles of Sustainable Development Practice on December 24, 2021). The Sustainable Development Committee is subordinated to the Board of Directors to promote and implement the company's sustainable development strategy goals.	Four groups are set up according to the organizational regulations include corporate governance group, sustainable environment group, social welfare group, and sustainable information disclosure group. The committee is supported by 1 executive secretary, fulfilled by the chief corporate governance officer, who manages committee meetings and tasks delegated by the Board of Directors.	Its duties include setting policies, goals, strategies, and execution plans relating to sustainable development from an environmental, social, and governance perspective, as well as conducting an annual review and revision of the implementation system and results for submission to the Board of Directors.	It convened total 5 meetings, and the attendance rate of all members of the Sustainable Development Committee in 2024 was 100%.

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Governance Principles

TTY has integrated policies pertaining to the United Nations Global Compact (UNGC) and relevant regulations and best practice principles of TWSE/TPEX listed companies into its rules and regulations, including Principles of Corporate Governance, Principles of Procedures for Ethical Management, and Principles of Practice for Sustainable Development. These documents have been approved by the Board of Directors and subsequently implemented. For the comprehensive contents of these documents, please visit the official website .

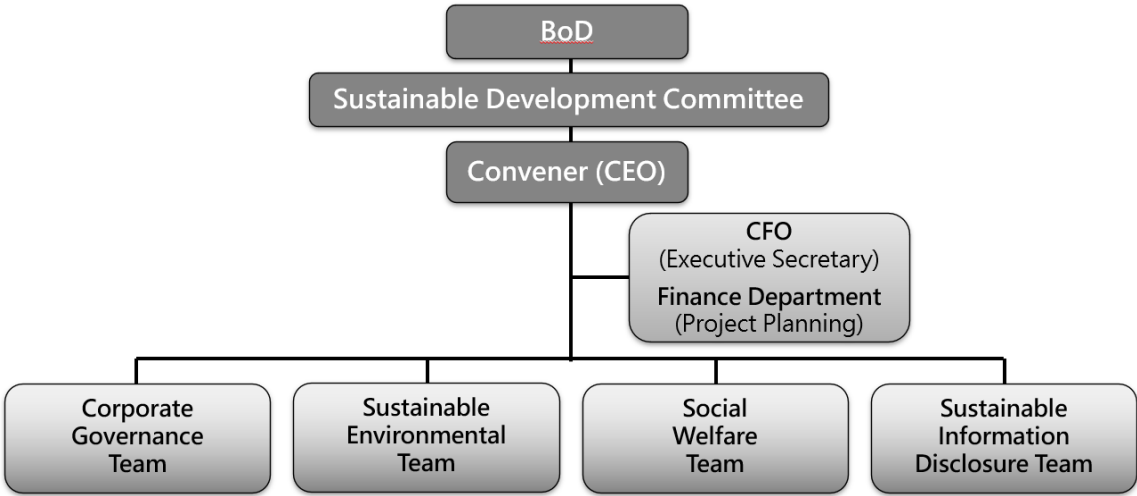
Promote Corporate Sustainability Development

The board of TTY has established groups according to organizational regulations, that is responsible for the proposal and implementation of sustainable development policies, systems, relevant guidelines, and promotion plans. It submits such plans to the Sustainable Development Committee for approval, then subsequently reports to the Board of Directors. The CEO serves as the convener of the Sustainable Development Committee, while the financial department is tasked with promoting relevant policies.

The Sustainable Development Committee is divided into corporate governance, social welfare, sustainable environment, and sustainable information disclosure groups based on ESG. In addition, a stakeholder section has been established in the "Sustainability" area on the Company's website and serves as a smooth and effective communication channel. The center also has internal meetings to confirm the requirements and expectations of stakeholders of the Company. Meanwhile, all groups propose methods to improve ESG operations and advance future goals to promote the concept of business operations and social responsibility.

The group of SDC makes the implementation plan for the upcoming year by the end of the current year and submits the plan to the Sustainable Development Committee and Board of Directors. The work plan for 2024 was submitted to the Sustainable Development Committee for implementation upon approval on November 3, 2023.

▼Organization Structure of TTY's Sustainable Development



Ethical Management

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Material Topic : Ethical Management

Corresponding GRI Index	GRI 205-2 Communication and Training on Anti-corruption Policies and Procedures GRI 205-3 Confirmed Incidents of Corruption and Actions Taken
SDGs Principle	
Impact Assessment	<p>Related Stakeholder Engagement: Government, Investors, Customers, Employees, Suppliers, Local Communities, NPO/NGOs and Media</p> <p>(+) Positive impact: The enterprise adheres to the business concept of ethics, integrity,, transparency, and accountability to benefit sustainable management. Ethical management not only establishes high-standard moral requirements for colleagues in the corporate, but also helps to win the trust of stakeholders, create business profit, and improve corporate value.</p> <p>(-) Negative impact: If incidents like dishonesty and corruption occur and affect the Company’ s business activities or infringe upon stakeholders’ interests and consequently undermine stakeholders’ trust and support for the corporate, the subsequent corporate operation will be further impacted, which does not benefit corporate sustainability.</p>
Policies and Commitments	Engage in business activities on the principle of fairness, honesty, good faith, and transparency, and effectively implement an ethical management policy, aggressively preventing dishonest behavior, and allowing the Company to be responsible to stakeholders.
Goals and Targets	Short-term Goals: organize corporate ethics-related online and in-person courses. Mid- to Long-term Goals: commit to creating a business culture of ethical management.
Responsibilities and Resources	The Legal & Compliance Division under the Sustainable Development Committee is responsible to develop an ethical management system.
Annual Action Results	<p>The Sustainable Development Committee convened 5 meetings in 2024. The Legal & Compliance Division reported the ethical management status and proposed to the Sustainable Development Committee a 2025 work plan; organized 1 corporate ethical management promotions and 1 insider trading prevention programs.</p> <ul style="list-style-type: none">• Regulations: establish Principles of Procedures for Ethical Management, Procedures for Ethical Management and Guidelines for Conduct, Internal Material Information Management, and Procedures for the Prevention of Insider Trading for a holistic anti-corruption system.• Education and training: prevention of insider trading was publicized and instructed to directors and managers on September 4, 2024; besides, the Company held 1 in-person prevention of insider trading lecture in 2024 and 52 colleagues attended the lecture on-site and through online live streaming. The total training time amounted to 26 hours; furthermore, 1 corporate ethical management convened online lecture was held, and all employees completed online learning.• Reporting mailbox: dedicated personnel report non-advertising or spam mail to the Sustainable Development Committee immediately after receipt, which shall then report a summary of mail received quarterly.• TTY did not experience any corruption-related issues in 2024.

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Principles of Procedures for Ethical Management

To prevent dishonest behavior, TTY has designated the Sustainable Development Committee as the responsible unit with the CEO as the convener. This center comprises a Report and Process Team, as well as an Administration Team. All senior management staff are required to declare compliance with ethical management practices, with both the CEO and Vice President signing an ethical conduct statement. Legal & Compliance Division as the administrative Management Team establishes ethical management as a business culture, drafts the Principles of Procedures for Ethical Management, the Procedures for Ethical Management and Guidelines for Conduct, and Operating Procedures for Handling Internal Material Information and Insider Trading Prevention as the key regulations of ethical management and systems to process case reports and ensure employees do not engage in improper interests or corruptive practices.

Ethical Management Education and Training

To ensure comprehensive awareness of ethical management regulations, TTY actively disseminates relevant policies to all new employees. This includes providing each newly recruited employee with an ethical policy program and prohibited unethical behaviors promotion circulating announcements regarding the Procedures for Ethical Management and Guidelines for Conduct via the intranet and email to all employees.

In terms of communicating anti-corruption policies and procedures to members of the governance unit, TTY ensures that directors, managers, and employees receive training on laws and regulations related to the prevention of insider trading at least once annually. Additionally, the operating results of these efforts are reported regularly to the Sustainable Development Committee and the Board of Directors each year. The Company publicized the prevention of insider training to directors and managers on September 4, 2024; meanwhile, the operation status of annual ethical management education and training as well as whistleblowing of unethical behaviors in 2023 was reported to the Sustainable Development Committee and the Board of Directors on March 8, 2024.

To advance employee development, TTY organizes ad hoc training courses on a variety of subjects. The 2024 online courses included Drug Safety Supervision, Introduction to Good Drug Practice (GDP) Management, Information Security, and Concept and Protection of intellectual Property, Corporate Ethical Management, all of which were compulsory. All employees completed the online courses. The Drug Advertisement online course was requirement for all the employees of Intensive Care Business Unit, Oncology Business Unit and Key Account Management Division in year 2024, and all have been completed.

▼TTY Anti-corruption Training Status of Year 2024

Employee Category	Total Employees	Actual Participants	Percentage
Administration	91	91	100%
Marketing & Sales	160	160	100%
Research	25	25	100%
Factory	247	247	100%
Total	523	523	100%

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Regulatory Compliance

To ensure the compliance of its operating activities with the laws and regulations of the local government, TTY pays close attention to the formulation and latest corrections of regulations that may impact the Company. It provides suggestions on regulatory compliance to each department or all employees for reference, to ensure that the practical operations of each unit conform to the specifications required.

Each unit reviews regulatory compliance annually. We also disclose major penalty cases ^(Note) or major incidents that seriously affect the corporate operation in the sustainability report, to follow company principles of transparency, and the requirements of GRI standards for balanced reporting. In 2024, the Company didn't receive any penalties for any violations of the laws and regulations, and no corruption-related situations occurred in the Company. There was a reported incident involving the former TTY CEO regarding an insider trading. Due to his personal behavior and he has already resigned. TTY has actively Initiated internal investigation and coordinated with the district prosecutor's office to investigate the case; depending on the development of the case, relevant persons will be held accountable according to the law. The Company will actively strengthen internal publicity in compliance with laws and ethical management education to optimize internal control and compliance culture, and to avoid the reoccurrence of similar situations.

Note: A material penalty refers to a fine per single violation of over NTD\$ 1 million.



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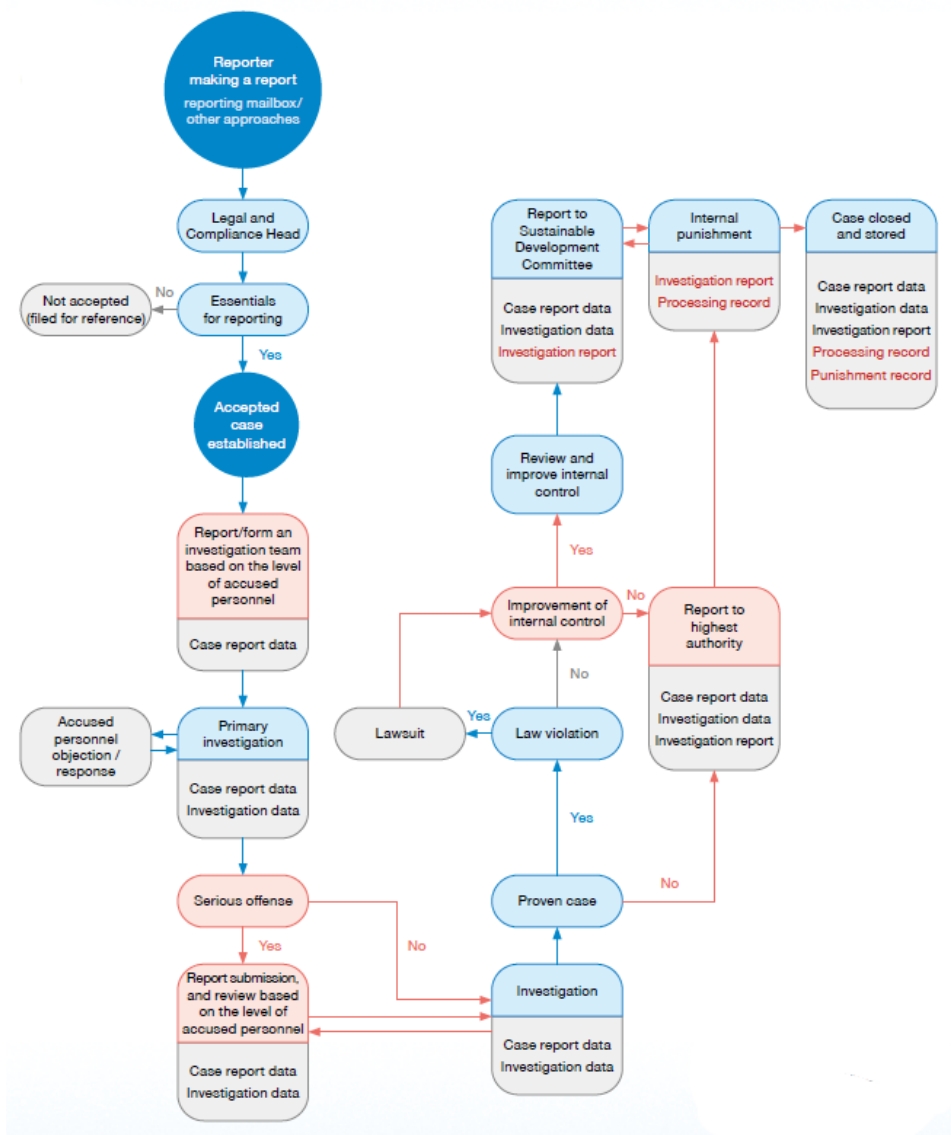
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Complaints and Suggestions Channel

Corporate sustainable operations are based on honesty and responsible business actions. Because of this, we adopt various approaches for reporting cases and suggestions and encourage stakeholders to report, complain, or make suggestions regarding any unethical behavior or dishonest operations that impact the environment, economy, society, and human rights. There is a mailbox for reporting such behavior on TTY's website and the employee intranet: ethical@tty.com.tw, and anyone can report illegal activity through the channel.

All employees engaged to any violations will be punished, and the persons culpable suspended or their employment terminated. The reporter's identity and report content remain confidential to protect personal safety. A report may be made anonymously, and anyone who reveals the reporter's identity or report content will be severely punished. The audit office examines the mailbox each year to ensure no reports have been hidden. No major violations or illegalities led to penalties in year 2024, TTY will continue to promote and monitor any violations to the ethical management within the company.

▼ Procedure for Processing Case Report/ Complaint



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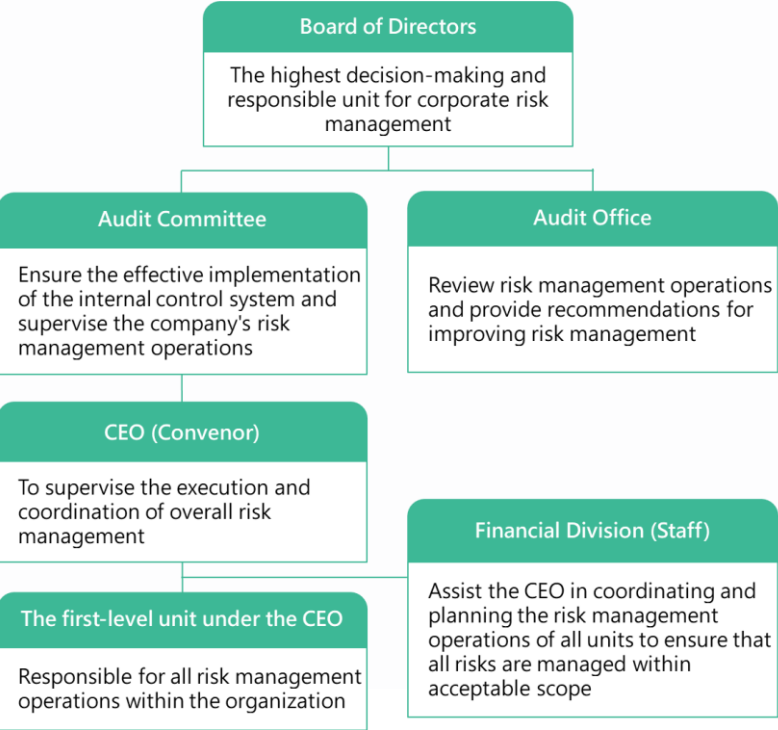
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Risk Management

To conduct risk management of uncertain factors potentially threatening the corporate management of the Company, and to progress towards the goal of achieving corporate sustainable development with stable business operations, the Company passed the Risk Management Policy and Procedure through the Board of Directors on December 28, 2020. It specifies that various risks shall be defined in the Company's "Risk Management Policy", according to the overall operating guidelines and strategies, and a management mechanism intended to identify, assess, and process risks, and implement effective supervision and review, to avoid or decrease the impact of risk incidents on the corporate operation and ensure corporate sustainable development.

▼ Risk Management Organization



▼ TTY' s Risk Management Policy and Procedure

(I) Risk identification	Each risk management unit shall determine risk items according to the organizational business.
(II) Risk assessment	<ol style="list-style-type: none">1. Conduct internal risk analysis, assess risk levels and hazards, establish risk mapping, and screen significant risks.2. Present the occurrence frequency of risks and operational impact with a "Risk Matrix".
(III) Risk treatment	<ol style="list-style-type: none">1. Each risk management unit draws up and executes risk countermeasures, and assesses residual risks.2. Conduct simulated training on major crisis/ response incidents.
(IV) Risk supervision and review	<ol style="list-style-type: none">1. Continuously monitor the change in the risk environment and the generation of new risks, review the handling of identified risks as well as risk control, and inspect the effectiveness and correctness of risk countermeasures to practically implement internal control operations.2. The Risk Management unit shall summarize the implementation effect of risk countermeasures and regularly report to the Audit Committee, and the Board of Directors.
(V) Risk information transmission, communication and consultation	The staff unit is responsible for internal and external communication and negotiation to ensure (I) to (IV) procedures is conducted, and the information related to the risk management is collected, compiled, recorded, reported and disclosed to facilitate the continuous operation of risk management.

TTY's Risk Management Policy and Procedure v.4 (amended on August 8, 2024)

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Identification and Management of Significant Risks

TTY conducts risk assessment per the materiality principle, and regularly reviews the risk changes and identifies and assesses significant risks of the next year at the end of each year. The risk management units should identify the risk items in four categories, strategy, operations, finance, and others, for 2024 at the end of 2023, and produce a risk matrix based on the risk determination criteria established. During the assessment, risks, opportunities, and impacts introduced because of climate change to each aspect have been considered, and a specific chapter has been established to present relevant reported contents. See the chapter of “Responses to Climate Change” for details.

In accordance with the assessment conducted by the risk management units, a total of 2 risk items were categorized as high risk. The responsible units should draw up and execute relevant plans to address these risks, and management should practically supervise and guide the implementation of such plans; as for medium risks, the scope of responsibility should be established for supervision and management; low risks might be tolerated per the current business operation.

▼ Risk Matrix Diagram

Probability of occurrence	High		Degree of impact
	<ul style="list-style-type: none">Information securityFinancial management	<ul style="list-style-type: none">Image and reputation	
		<ul style="list-style-type: none">Development of new products or new marketsProducts and technology developmentOccupational safety and healthPolicies and regulationsProduct safetySupply chainHuman resourcesGeopolitics	
Low	<ul style="list-style-type: none">Credit	<ul style="list-style-type: none">Production efficiencyIntellectual propertyEnergy crisis	<ul style="list-style-type: none">Market competitionDisastersIntegrity and ethics

● Low Risk ● Medium Risk ● High Risk

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Major Risk Items and Countermeasures

▼ 2024 TTY Major Risk Items and Countermeasures

Risk Item	Risks Explanation	Risk Management Strategies	The Authorities
Competition	The newly mechanism-transferred pharmaceuticals launched or the price competition of generic drugs may impact or cause a risk of loss to the corporate operation or investment.	<ul style="list-style-type: none">Pay continual attention to the market development, and seek new pharmaceuticals.Strengthen relationships with clinical experts and customers and discuss opportunities for prescription and therapeutic schedules that may be combined with new pharmaceuticals. At the same time, assist physicians in completing academic trial protocols to increase the academic data regarding the value of product prescriptions.Strengthen communication with customers regarding differences in DMF of manufacturer specifications and ingredients of pharmaceuticals, and propose examples indicating the Company' s support for clinical studies, to lower the risks.	Oncology (TOT)
Image and reputation	Risk that harms the image or reputation of the Company due to factors like litigation and violation of regulations.	<ul style="list-style-type: none">Improve the efficiency of the notification process in the organization, establish a single-issue communication window, and notify within a certain time limit after the occurrence of a relevant incident.Improve the strength of media management, and communicate with the media with a time limit for balanced reporting.	Public Affairs

Note: For detailed risk management information, please refer to the official website.



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Information Security Risks

Information Security Risk Management Framework

To ensure comprehensive information security management across all assets, TTY employs one information officer along with other skilled personnel. Their duties include establishing internal security policies, planning and executing security protocols, and periodically reporting on information governance to the Board of Directors. Oversight of information security falls under the purview of the audit office. Should any discrepancies arise, the audit office prompts audited units to propose improvement plans and actions, monitoring implementation periodically to mitigate the risk of internal breaches. TTY received no complaints regarding infringements on customer privacy or loss of customer information in 2024.

Information Security Risks Assessment and Management

TTY identifies various risks and implements appropriate control measures through due diligence, risk assessment, and steps to reduce potential threats to information security. The Risk Assessment and Handling Procedures were established to keep information assets and network security within the scope of the information security management system. TTY executes system risk evaluations at least once every year to detect potential issues early, implement corresponding actions, and submit an annual information security report to the Board of Directors.

Internal Information Security Audit

To reinforce secret data management, TTY implements internal information security audits periodically:

- A daily information security control audit
- The audit office executes an annual audit covering information security items based on the Regulations Governing the Establishment of Internal Control Systems by Public Companies.



Information Security Protection Measures

Enterprises worldwide face ongoing threats from hackers who employ various intrusion techniques, notably leveraging AI technology for intelligent attacks. In response, organizations must implement targeted preventive measures and tools. TTY has adapted its information security protection strategies to address this evolving threat landscape. We will conduct overall planning in the following key directions, and the implementation thereof is described as follows: :

1. Computer room equipment security	To reinforce access security, we have applied HCI and industrial file server solutions to data centers and file servers to cope with increasing business demand in a more timely and flexible manner, with a comprehensive backup solution.
2. External connection access	To eliminate potential attacks on login information when accessing servers on a VPN, and to increase connection safety, multi-factor authentication is activated.
3. Internal network control	According to a security report of domestic information security institutions, 80% of invasions and threats originate from improper use of the intranet. TTY has introduced its renowned intranet security monitoring product that effectively screens the terminal connected to the intranet to avoid viruses and ensure Company network security.
4. Professional information security checks	In addition to system updates to cover system loophole attacks, we run scans on critical servers to spot and fix weak points, minimizing potential attacks. Additionally, the Company seeks assistance from external information security companies to test its risk exposure, and measure its cybersecurity protection rating against industry peers for effective improvement.
5. Protection drills	TTY runs drills to become familiar with local and remote backup processes every year. The auto-backup and restoration system ensures the system resumes smooth operations post-threat.
6. Information security awareness	The Company executes social engineering drills to improve employees' ability to adopt the correct methods to dispose of letters received from unknown sources. The overall email opening rate was 33.89%, and the opening rate of links and attachments was 5.08% respectively, both better than the average values in the industry. Online information security training courses and after-class tests are provided for colleagues failing to meet the required standards, so that personnel can receive new information on information security and improve their risk awareness.

In addition to the above-mentioned management to ensure information security, we assess the possibility plan to apply ISO 27001. Through this strict system, the operations and procedures can be perfected, and the certification allows our compliance with international regulations.

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IP Management

To protect the Company's IP from infringing others, and further expand the Company's intangible assets, TTY has implemented the TIPS (Taiwan Intellectual Property Management System) to improve the IP management system and confidentiality and minimize risks. We also target continuous improvement, risk control, and response-ability by conducting annual internal audits incident drills. To prevent patent infringement, we work to ensure no such incidents in target markets impact our key products. For development management, we run prior patent searches before developing products and novel technology to ensure minimal infringement and maximum efficiency.

2016: TTY included TIPS 2007 and passed the basic certification in 2016.

2018: TTY earned an independent TIPS audit Grade A certification.

2020:

- TTY received another certification to extend the validity of our Grade A TIPS 2016.
- TTY implemented a trade secret management system and established written procedures to effectively maintain the confidentiality, integrity, and availability of trade secrets.

2022:

- In August, an industrial DMS (document management system) was put in place to minimize the manual effort required to manage trade secrets, reducing human error and disclosure risks and improving the safety and security of trade secrets.
- The 2022 independent TIPS audit reviewed our trade secret management approach and approved our procedure.

2024: Maintain the TIPS internal audit system to ensure effective management of intellectual property.



Environmental Symbiosis

- Management Guidelines
- Environmental Goals

Responses to Climate Change

- The Four Pillars of the TCFD Framework
- Climate Scenario Analysis
- Climate-related Risks, Opportunities, and Financial Impacts

Energy Management

- Energy Consumption Statistics
- Energy Efficiency Policies
- GHG Emission Statistics

Air Pollutant Control

Water Resources Management

- Reinforced Water Consumption Strategies
- Energy Consumption Statistics

Waste Management

Toxic Substance Management



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Key Performance

- ✓ The energy emission intensity of the Lioudu and Chungli factories were 13.2 MJ / Revenue NTD Thousand, that reached the bottom point in the past 5 years.
- ✓ The Lioudu and Chungli factories saved **455,984.79 kWh** of electricity and **225.26 tonCO₂e** via 11 electricity-saving measures.
- ✓ The chemical oxygen demand (COD) emissions and the quantity of suspended solids (SS) discharged in the water of the Lioudu and Chungli factories were lower than sewer connection standards.
- ✓ The concentrations of air pollutants emitted by the Lioudu and Chungli factories meet the standards and are better than the legal requirements.
- ✓ The Chungli and Lioudu factories achieved **100%** in weekly and monthly waste clearance contractor follow-up audits.

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Environmental Symbiosis Management Guidelines

As a pharmaceutical company enhancing the quality of human lives, TTY is aware that people's health greatly relies on a good environment, including clean air, water, and proper handling of waste. Therefore, TTY holds environmental sustainability as the first priority in all operations as the guideline for environmental protection management. All suppliers are requested to follow TTY's supplier management policies and continuously optimize processes to save energy and reduce the impact of operations on climate change.

Greenhouse gases are the main driver of global warming and climate change. TTY introduced the ISO 14064-1 GHG inventory inspection and verification in 2022. We will continue to inspect the corporation's greenhouse gas emissions in accordance with the ISO 14064-1 inventory standard every year, which will form the basis of our management guidelines and regulations for all energy-saving and carbon reduction measures to improve energy efficiency across all operation locations.

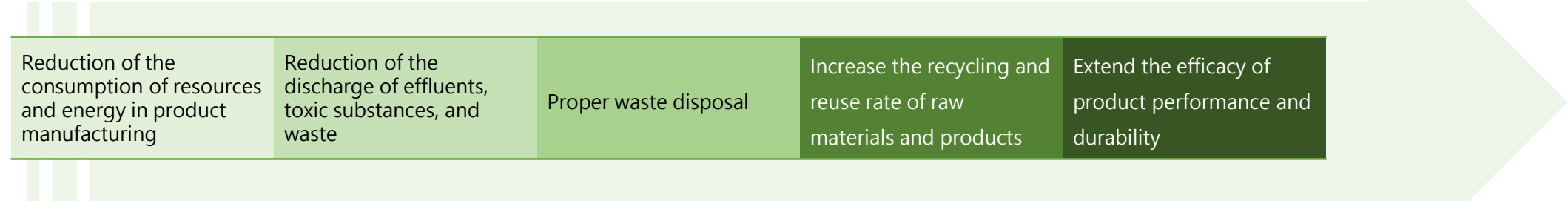
Environmental Goals

In compliance with the relevant environmental law and international guidelines, TTY takes the initiative when it comes to environmental conservation and considers all possibilities to minimize the ecological impact of its manufacturing processes.

All activities, business operations, and internal management of all TTY locations and sites are conducted with sustainable environmental goals in mind. TTY is evaluating whether to establish a dedicated environmental management department and assign dedicated personnel to formulate, promote, and maintain relevant environmental management systems and specific action plans, such as proper water consumption, recycling, and related measures, to enhance water usage efficiency.

Meanwhile, the impact of climate change of operational activities, policies, and strategies are being monitored and promoted to decrease carbon footprint and GHG emissions. Periodical environmental education for all employees focuses on being a sustainable consumer and aims to achieve the 5 goals of building a good corporation that is friendly to the environment.

▼ 5 Major Environmental Goals of TTY



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Responses to Climate Change

TTY has identified the risks and opportunities associated with climate change in response to increasing awareness of global warming, extreme climate change, environmental protection, safety and health, and conservation. Based on the results, the company has planned specific response strategies to address climate-related financial disclosures. The report includes recommendations for the Task Force Climate-related Financial Disclosures (TCFD) and supporting information on climate-related risks.

The material impacts that TTY may face in the future include those related to energy, environment, safety, health issues, and external constraints such as policies and regulations. Issues such as low-carbon energy, low-carbon electricity, and carbon footprint will become important and require urgent attention in company operations. To address these material impacts, TTY plans to make organizational adjustments and formulate response strategies. The company has also strengthened strategic cooperation with domestic and foreign peers, green energy industries, suppliers, and academic research circles to reduce operational risks and create more favorable operating conditions.

In addition to cooperating with national policies and greenhouse gas reduction promotion plans, TTY will take relevant action and establish a team to strengthen the planning and promotion of energy conservation and carbon reduction work. The company will also evaluate the switch to or replacement of low-carbon, high-efficiency equipment to reduce environmental pollution caused by business operations.

The Four Pillars of the TCFD Framework

▼ Pillars of the TCFD framework

Governance	Strategy	Risk Management	Metrics and Targets
<p>The Board of Directors serves as the highest supervisory unit in charge of approving the risk management policy, supervising and managing TTY’ s decision-making processes, and evaluating and monitoring climate change related matters.</p> <p>The risks of climate change was managed by the operation business units, which then reported progress of the climate change response plan to the Audit Committee and the Board of Directors in accordance with the “Climate Governance” material principles annually.</p> <p>In addition, it manages climate change related educational training to enhance awareness at governance level.</p>	<p>TTY is committed to fulfilling low carbon goals and green processes, and promoting the green supply chain. It is expected to lead the environmental transformation in the biotechnological pharmaceutical industry and achieve GHG gas reduction goals.</p>	<p>To identify risks and opportunities related to climate change were conducted by the operation business units, and establishes management plans for major risks/ opportunities to trace progress and results, and achieve environmental goals.</p>	<p>Short-term Goals</p> <ul style="list-style-type: none">• 2% of power conserved as a result of the implementation of an energy-saving plan. The plan was made in 2024 and is focused on improving energy-consuming equipment.• Introduced ISO 14064-1 GHG inventory standards and completed certification in 2025.• Continue to carry out risk management and response measures for potential risks due to climate change, and implement risk identification and assessment operations in 2025. <p>Mid-term Goal</p> <ul style="list-style-type: none">• Gradually increase carbon emission reduction targets. <p>Long-term Goal</p> <ul style="list-style-type: none">• 8% or more carbon reduction by 2030 compared to base year 2022.

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Climate-related Risks, Opportunities, and Financial Impacts

▼ 2024 Identification and Response Measures of Climate-related Financial Risks

Transformation Risk

Risk Category	Risk Impact	Countermeasures and Potential Financial Impact
Policy and Laws	<p>The Greenhouse Gas Reduction and Management Act is becoming stricter. If GHG emission control is launched in the future, carbon prices will increase the operational costs of the Company.</p> <p>Energy transformation increases the power generation costs, and will also generate additional operating expenses.</p>	<p>To improve energy efficiency, TTY will continuously implement its energy-saving and carbon-reduction plan and install energy-saving facilities. TTY will also continually improve and reinforce processes to reduce the environmental impact via source controls and terminal prevention equipment.</p> <p>According to data from PTC, if nuclear power is replaced by renewable energy and coal is replaced by gas in the future, power generation costs per degree will increase by 45.45% in 2025. Taking the average power price of NTD\$2.6 per degree in 2018, power generation costs per degree will increase by NTD\$1.182 by 2025. Based on the 14.85 million kWh of power outsourced over the past 2 years, an annual increase of NTD\$17.55 million in power costs is expected.</p>
Technological Risks	<p>The economic system is gradually turning to supporting low-carbon, high-efficiency technology improvement and innovation, which may affect the competitiveness of the Company and likely increase procurement, production, and distribution costs to meet the demand and depth required by customers.</p>	<p>Evaluate the comprehensive impact of climate change related policies to make short- to mid-term operational plans with the objective to reduce carbon emission during the production process and promote green transformation.</p> <ol style="list-style-type: none">1. The energy-saving measures implemented in 2024 include replacing poor performance air compressor to optimize the process to reduce operation time, replacing traditional lighting to LED, improving A/C system performance, replacing old chiller, installing a cooling tower water quality monitor system. The total expenditure of the above measures was around NTD\$9.13 million in 2024.2. Continue to implement various energy-saving measures in 2025, including replacing air compressor, implementing a cooling water quality monitor system, and replacing traditional T8 lighting with LED lighting. The estimated expenditure of above measures is around NTD\$18.94 million.
Market Risks	<p>To correspond with climate change risk and carbon emission control requirements, new business models have gradually been created and enterprises are required to create carbon assets management capabilities to adapt to this trend. The inventory costs of TTY increased to avoid the risk of supply chain disruption due to the unstable supply of raw materials.</p>	<p>To enhance the ability to assume climate change risk, TTY has created new revenue opportunities and market expansion through the establishment of environmental protection related mechanisms and carbon emission control measures. Meanwhile, inventory costs will increase along with the increase of safe inventory levels. With inventory of about NTD\$1.221 billion in 2024, NTD\$12.21 million in inventory costs are expected; an additional 1%.</p>
Reputation Risks	<p>Climate change may affect the image that customers and social groups have in terms of how committed the Company is to the low-carbon transformation. If the Company produces high carbon emissions or high levels of pollution, it may not win tenders, but instead lose orders, experience a decrease in revenue, or even suffer reputational damage.</p>	<p>To develop more environmentally friendly products and services, TTY is not only continuously improving sewage and waste recycling rates, but managing environmental sustainability activities to build a green enterprise culture from the inside out, and evaluating its investment in green energy and low carbon logistics development to reduce the carbon footprint of Company products, and enhance industrial competitiveness in line with market demand.</p>

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Physical Risk

Risk Category		Risk Impact	Countermeasures and Potential Financial Impact
Acute Risk		Climate change may cause a typhoon, flood, draught, or other extreme climate event, resulting in damage to assets, supply chain disruption, and other events with an acute financial impact.	Reinforce water resources management and ensure the safety of plant equipment to maintain uninterrupted operations. In response to draughts in Taiwan, TTY has a list of water suppliers but costs have increased. With 116,987 degrees of water consumption in 2023, the cost of water outsourcing calculated at the Lioudu Factory is NTD\$160,000/day (25t water tanks for 8 rounds) to cover water shortages. The cost of water outsourcing calculated at the Chungli Factory is NTD\$80,000/day (25t water tanks for 4 rounds) to cover water shortages. Please refer to Chapter 5 Water Resources Management for more information.
			Revenue will also be affected if materials and finished products cannot be delivered on time due to typhoons and floods. To mitigate the risk, warehouse leases in different locations will be evaluated and rent will be increased by about NTD\$20 million.
Chronic Risk		Rising temperatures around the world and the gradual shortage of water, electricity, and fuel resources may disrupt factory operations, resulting in rising operational costs or penalties due to delivery delays.	Evaluate the use of regional energy and resources consumption and arrange off-peak production as needed. Prepare a BCP to actively find new suppliers and create a list of emergency power generators and water suppliers to ensure stable materials and energy resources supplies, and enhance the ability of TTY to respond and adapt to disasters accordingly.

▼ TTY 2024 Climate Change-related Opportunities and Countermeasures

Type of Opportunity	Opportunity Explanation	Countermeasures and Potential Financial Impact
Resource Efficiency	Increase energy efficiency to reduce mid- to long-term operational costs and achieve carbon reduction goals.	The use and upgrade of equipment with lower energy consumption, water, and power reduction goals, aimed at better efficiency, continued in 2023 at an expense of NTD\$8.98 million. Such measures are expected to save NTD\$ 960,000 per year. The renewal of outdated machines in 2024 is allocated a budget of NTD\$12.79 million, contributing to a cost reduction of NTD\$1.41 million per year.
Resilience	Improve the ability to adapt to climate change by managing climate change-related risks and seizing opportunities.	The operation business units to identify climate change-related risks and opportunities and to plan management strategies. The Finance Division establishes “Climate Governance” material principles to trace progress and effects, and to reinforce the risk response ability of the Company.

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▼Matrix of Climate-related Risk and Opportunities

Impact Level	High			② ③ ⑥ ②
		④ ⑤		① ①
	Low			
		Low	Probability of Occurrence	High

▼List of Climate-related Risks and Opportunities

Climate Risks	Climate Opportunities
① Renewable energy and carbon reduction regulations and requirements ② Cost of the low-carbon transformation ③ Rise of operating cost ④ Typhoon ⑤ Extreme climate ⑥ Cost to build corporate resilience	① Better energy efficiency ② Better resource efficiency



▼ TTY's Climate-related Risks' Financial Impact

Letter from the CEO	Climate Risks	Probability of Occurrence	Impact Level	Risks Explanation	Response Strategies and Financial Impact	Department in Charge
About TTY Sustainability Report	① Renewable energy and carbon reduction regulations and requirements	High	Medium	In compliance with the law requirement to implement the GHG emission verification resulting in increase the operating costs	TTY conducted the GHG emission inventory and verified by 3 rd party institution with payment of NTD 483 thousands.	Lioudu Factory Engineering, and Chungli Factory Engineering
Sustainable Management	② Cost of low-carbon transformation	High	High	The additional measures related to the government's net-zero policies led to an increase in additional costs	A total investment of NTD\$14,425,630 had been made in energy-saving plans for the Lioudu and Chungli factories over the past 5 years. The cost of installing a solar energy system at the Chungli factory is estimated to be NTD\$8.9 million (146KW capacity, NTD\$60,700 cost per 1KW, totaling NTD\$8,862,200). For the Lioudu factory solar energy system, the cost is NTD\$19.05 million (313.92KW capacity, NTD\$60,700 cost per 1KW, totaling NTD\$19,054,944).	Lioudu Factory Engineering, and Chungli Factory Engineering
About TTY Biopharm	③ Rise of operating cost	High	High	Natural gas instead of heavy oil	Natural gas replaced heavy oil and change of fuel boilers at the Lioudu and Chungli factories. In Chungli, the cost to change the boiler was NTD\$5,225,187 (saving up to 78,840 KW yearly, or NTD\$236,520 on the power bill), while in Lioudu, the cost to change the boiler was NTD\$6,980,000. (saving up to 65,185 KW yearly, or NTD\$195,555 on the power bill).	Factory Engineering, and Chungli Factory Engineering
Supply Chain Management	④ ⑤ Extreme weather such as typhoon, heavy snow and floods	Medium	Medium	Loss of labor due to the inability to work, loss of daily revenue, and loss of machines and equipment	Daily costs incurred from loss of material and labor due to typhoon-caused power and water outage, as well as a one-day production suspension: 1. Material loss: NTD\$5 million for the Chungli factory and NTD\$7.83 million for the Lioudu factory This includes loss of injection and oral medicine, as well as OEM materials. 2. Labor loss: NTD\$1.23 million in daily labor costs (monthly salary of 523 employees of NTD\$36,923,657 ÷ 30 days = NTD\$1,230,789/day. 3. Cost of water outage: Production during water outage requires NTD\$30,000 for water storage equipment; NTD\$80,000 per day for the Chungli factory and NTD\$160,000 per day for the Lioudu factory in purchased water costs.	Human Resource Division, Production Planning Division
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Climate Risks	Probability of Occurrence	Impact Level	Risks Explanation	Response Strategies and Financial Impact	Department in Charge
④ ⑤ Extreme weather such as typhoon, heavy snow and floods	Medium	Medium	Extreme weather caused delays in the delivery of imported raw materials	The heavy snow in South Korea caused the Metacin API manufacturer to shut-down the factory, and the delivery date is delayed for 40 days in December 2024.	Procurement Division
⑥ Cost to build corporate resilience	High	High	Additional insurance expenses to maintain business continuity	Due to the increasing costs of Business Interruption Insurance and other climate hazard insurance, the total insurance expenses for all 3 factories amount to NTD\$1,460,000. In 2024, the insurance coverage for Chungli, Lioudu, and Neihu factories is NTD\$1,830,490,843, NTD\$436,913,195, and NTD\$65,010,029 respectively, with insurance fees for each being NTD\$1,231,920, NTD\$219,767, and NTD\$8,451.	Administration Division
			Generators and UPS are installed to ensure business continuity	1. Annual maintenance fees for the generators at the Chungli factory and the Lioudu factory are NTD\$51,000 and NTD\$110,000 respectively. 2. Diesel fuel expenses for the generators at the Chungli factory and Lioudu factory are NTD\$58,500 and NTD\$13,500 respectively (calculated with NTD\$30/L).	Lioudu Factory Engineering, and Chungli Factory Engineering

▼ TTY's Climate-related Opportunities' Financial Impact

Letter from the CEO	Climate-related Opportunities	Probability of Occurrence	Impact Level	Opportunity Explanation	Response Strategies and Financial Impact	Department in Charge
About TTY Sustainability Report	① Better energy efficiency	High	Low	Energy efficiency plans	Over the past 5 years, the plans have invested NTD\$20,029,630 at the Lioudu and Chungli factories, resulting in a conservation of 1,231,168 KW and savings of NTD\$4,122,866 on power bills.	Lioudu Factory Engineering, and Chungli Factory Engineering
Sustainable Management	② Better resource efficiency	High	High	Water usage reduction	At the Chungli factory, RO sewage is treated daily, and a cooling tower is utilized. With the RO recycling 2t/hr, and water being charged at NTD\$12 per cubic meter, we save NTD\$210,240 annually by recycling 48t of sewage capacity daily.	Lioudu Factory Engineering, and Chungli Factory Engineering
About TTY Biopharm				Paper, waste recycle and reuse	Income from recycling generates NTD\$720 per month, or NTD\$8,640 per year.	Lioudu Factory Engineering, and Chungli Factory Engineering
Supply Chain Management				Use of ERP	ERP saves up to 178,553 pieces of paper each year, equating to NTD\$39,973. 1. Digital ERP verification instead of printed vouchers helps to save costs. 2. We plan to introduce BarCode and portable devices with ERP, which will digitalize requisition and transfer forms in production and inventory management. Digital verification can reduce paper usage.	Information Technology Division
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Energy Management

TTY is the leading company in the domestic biotechnology industry. To fulfill its commitments to “Sustainable Development” and “Responsible use of resources,” we formulated proactive energy saving and carbon reduction plan in year 2023, and establish short-, medium- and long-term energy-saving goals in October along with implementation on the equipment improvement measures according to the plan. The specific annual electricity conservation rate in 2% as a goal. In the future, TTY will continue to evaluate the purchase or addition of green energy and energy-saving facilities, establish a green supplier management system, and participate in Climate Initiative organizations or alliances. It is hoped that TTY can implement energy management through practical actions such as energy conservation, carbon reduction, and search for alternative energy sources. in line with the company’s environmental protection management policy.

Energy Consumption Statistics

In year 2024, we calculated a total of 9,662,800 kWh of outsourced and 583,216 m³ of natural gas consumption at the Liudu factory; and 5,189,800 kWh and 144,934 m³ at the Chungli factory, which combined 77,853,647 MJ of consumption and a 0.36% reduction of energy use compared with last year.

▼ TTY Energy Consumption for the Recent 5 Years (Unit: MJ)

Site	Energy Type	2020	2021	2022	2023	2024
Liudu Factory	Natural Gas	11,411,672	10,920,001	13,090,459	15,311,685	19,530,737
	Purchased Electricity	31,368,240	29,877,120	32,302,800	36,964,800	34,786,080
Chungli Factory	Natural Gas	5,574,111	5,548,225	5,980,756	6,003,695	4,853,550
	Purchased Electricity	20,604,600	20,145,600	19,590,480	19,859,400	18,683,280
Natural Gas		16,985,783	16,468,226	19,071,215	21,315,380	24,384,287
Purchased Electricity		51,972,840	50,022,720	51,893,280	56,824,200	53,469,360
total		68,958,623	66,490,946	70,964,495	78,139,580	77,853,647

Note:
1. Energy produced by natural gas boilers: 1 m³ = 8000 kcal = 33,488,000 Joule
2. Purchased electricity is calculated as 1 kWh =3,600,000 Joule

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▼TTY Energy Emission Intensity for the Recent 5 Years

Year	2020	2021	2022	2023	2024
Energy Consumption (Unit: MJ)	68,958,623	66,490,946	70,964,495	78,139,580	77,853,647
Revenue (Unit: NTD Thousand)	4,221,836	4,535,610	5,061,606	5,505,542	5,893,847
Energy Emission Intensity (Unit: MJ / Revenue NTD Thousand)	16.3	14.7	14.0	14.2	13.2

Note:
1. The scope of energy consumption statistics includes the Lioudu and Chungli factories.
2. Revenue represents the consolidated sales revenue of the Group.

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Electricity Reduction Results

In year 2024, 2 major manufacturing sites, the Lioudu and Chungli factories, saved 455,984.79 kWh of electricity and 225.26 tonCO₂e via 11 electricity saving measures. We will continue to implement power saving in the future to demonstrate energy saving results and promote carbon reduction effects.

▼ 2024 TTY Electricity Saving Actions and Results at the Lioudu & Chungli Factories

Manufacturing sites	Lioudu Factory	Chungli Factory
Electricity-saving planning	<ul style="list-style-type: none">▶ A total of 6 electricity-saving measures were executed in the Lioudu Factory.▶ Estimated effect of electricity-saving measures in 2024:<ul style="list-style-type: none">• Annual electricity saving of 249,859.13 kWh• Reduction of energy consumption by 899,492.87 MJ• Reduction of greenhouse gas emissions by 123.43 tonCO₂e	<ul style="list-style-type: none">▶ A total of 5 electricity-saving measures were executed in the Chungli Factory.▶ Estimated effect of electricity-saving measures in 2024:<ul style="list-style-type: none">• Annual electricity saving of 206,125.66 kWh• Reduction of energy consumption by 742,052.38 MJ• Reduction of greenhouse gas emissions by 101.83 tonCO₂e
Electricity-saving measures	<ol style="list-style-type: none">50HP two-stage variable frequency air compressor to replace 30HP air compressor<ul style="list-style-type: none">• Electricity saving: 57,158.66 kWh/yearOptimization of injection process to minimize drying time<ul style="list-style-type: none">• Electricity saving: 132,470.80 kWh/yearReplacement of LED energy-saving lamps in the dust-free room<ul style="list-style-type: none">• Electricity saving: 24,557.23 kWh/yearReplacement of air-cooled box-type air conditioners with variable frequency cooling/heating split air conditioners<ul style="list-style-type: none">• Electricity saving: 4,117.25 kWh/yearModification of temperature parameters in C302 raw material warehouse<ul style="list-style-type: none">• Electricity saving: 12,442.21 kWh/yearReplacement of Hitachi water-cooled box-type air conditioners in C301 warehouse<ul style="list-style-type: none">• Electricity saving: 19,112.98 kWh/year	<ol style="list-style-type: none">Replacement of the 120T chiller unit to 150T as the main operating one<ul style="list-style-type: none">• Electricity saving: 177,455.70 kWh/yearReplacement of T5 lamps with LED lamps<ul style="list-style-type: none">• Electricity saving: 1,292.72 kWh/yearWater quality control of the 150T cooling tower in Factory C2<ul style="list-style-type: none">• Electricity saving: 2,172.22 kWh/yearReplacement of T8 lamps with LED lamps in Factory B<ul style="list-style-type: none">• Electricity saving: 5,796.27 kWh/yearWater quality control of the 100T cooling tower in Factory B<ul style="list-style-type: none">• Electricity saving: 19,408.75 kWh/year

Note:
1. Calculation: purchased electricity 1 kWh =3,600,000 Joule
2. The discharge coefficient 2024 was not yet published. Therefore, the 2024 discharge coefficient published by the Bureau of Energy in 2023 of 0.494 kgCO₂e /kWh was adopted in this report.
3. Annual electricity-saving rate = (Electricity consumption with the effect of electricity-saving measures)/(Electricity consumption with the effect of electricity-saving measures + Annual electricity consumption)

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GHG Emission Statistics

The statistics on greenhouse gas emissions from 2018 to 2021 were independently gathered by TTY annually on its two main manufacturing sites, the Lioudu Factory and Chungli Factory, according to emission coefficient data. The greenhouse gas emissions have been developed a more comprehensive and completed inspection plan with scope of Headquarters and Neihu PDC initially since 2022 as per the ISO 14064-1:2018 Greenhouse Gas Verification Standard. The Company obtained the certificate in the next year after the inventory was completed.

▼ TTY Autonomous GHG Inventory in the Year 2022-2024 (unit: tonCO₂e)

Types of GHG Emissions/Year	2022	2023	2024
Scope 1	1,535.3169	1,700.2181	1,910.2571
Scope 2	8,232.4903	8,488.8048	8,116.4468
Scope 1 + Scope 2	9,767.8072	10,189.0229	10,026.7039
Scope 3 (Categories 3, 4, 5)	3,041.9354	2,549.5243	2,512.6352
Total	12,809.7426	12,738.5472	12,539.339
Consolidated Sales Revenue of the Group (Unit: Revenue NTD Million)	5,061.606	5,505.542	5,893.847
GHG Emission Intensity (Unit: tonCO ₂ e/ Revenue NTD Million)	2.53	2.31	2.13

Note:

1. The organizational scope has been established following an operational control approach. The scope included the headquarters, Lioudu Factory, Chungli Factory, and Neihu PDC. The scope of inventory included Scope 1, Scope 2, and Scope 3 (categories 3, 4, 5). Greenhouse gas emission data was verified by a third-party institution. Passing verification and obtaining a verification statement is planned for the second quarter of the coming year.
2. The main emission source in Scope 1 was natural gas boilers. Types of greenhouse gases generated from the combustion of natural gas included CO₂, CH₄, and N₂O, all of which were included in the calculation.
3. The main emission source of Scope 2 was purchased electricity. Since the carbon emission coefficient of electricity was not yet announced, the carbon emission coefficient of the previous year was adopted. Therefore, the carbon emission coefficient of electricity was 0.509 kgCO₂e/kWh in 2022, the same as that in 2021. In 2023, the carbon emission coefficient of electricity was 0.495 kgCO₂e/kWh, the same as that in 2022. In 2024, the carbon emission coefficient of electricity was 0.494 kgCO₂e/kWh, the same as that in 2023.

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Air Pollutant Control

TTY has made every effort to reduce air pollution. The two main manufacturing sites adopted source classification to minimize air pollutants during manufacturing processes. Treatment technology at multiple sections has helped elevate the processing performance of the terminal preventive facility. Annual air pollutant discharge inspections and implementation have resulted in maintenance and training being put in place to ensure that pollutants fall within or are superior to the criteria of the “Standards for Air Pollutant Emission from Stationary Pollution Sources” . In 2024, the two manufacturing sites of Lioudu and Chungli factories discharged particle pollutants totaling 258.205 kg of PM, 12.649 kg of SO₂, and 440.28 kg of NO_x.

▼ 2023~2024 TTY’ s Material Gas Emission

Year	Site	PM	SO ₂	NO _x
2023	Total Emission From the Lioudu Factory(unit: kg)	3.520	6.09	250.08
	Total Emissions From the Chungli Factory (unit: kg)	2.222	4.15	60.00
	Total	5.742	10.24	310.08
2024	Total Emission From the Lioudu Factory(unit: kg)	91.905	7.969	350.28
	Total Emissions From the Chungli Factory (unit: kg)	166.3	4.68	90
	Total	258.205	12.649	440.280

Note: The data from the verification report designated by the factories is utilized to calculate emissions (emissions per hour x operation hours of boilers per day x working days per year).

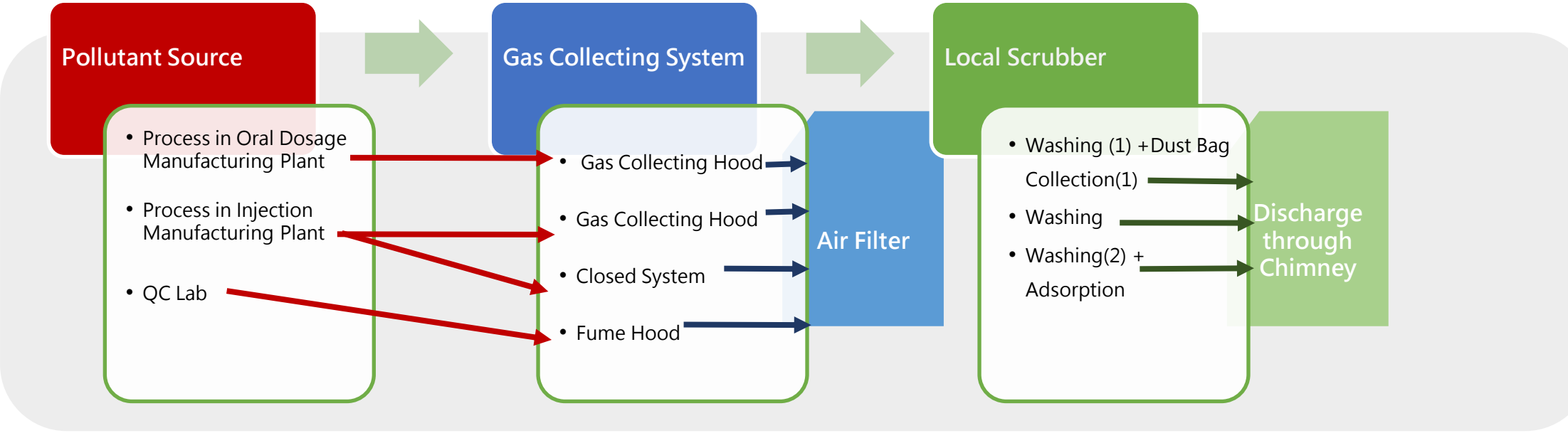
▼ 2024 TTY Stationary Pollution Source Measurements

		PM	SO ₂	NO _x
Standards for Air Pollutant Emission from Stationary Pollution Sources		30 mg/Nm ³	50 ppm	100 ppm
Lioudu Factory	Gas boiler (P001)	1 mg/Nm ³	1 ppm	60 ppm
	Gas boiler (P002)	(ND) mg/Nm ³	1 ppm	63 ppm
	Gas boiler (P003)	1 mg/Nm ³	1 ppm	65 ppm
Chungli Factory	Gas boiler (P001)	1 mg/Nm ³	1 ppm	17 ppm
	Gas boiler (P002)	1 mg/Nm ³	1 ppm	34 ppm

Notes: No Persistent Organic Pollutant (POP), Volatile Organic Pollutant (VOP), or Hazardous Air Pollutant (HAP) are discharged from the Lioudu and Chungli factories.

Best Available Technology (BAT) controls air pollution at the source. TTY divides its prevention strategy into two phases: “effective reduction of emission from sources” and “strengthened management of terminal prevention facilities”. In the first phase of source classification, manufacturing process air pollutants are classified according to their properties. Newly installed high-efficiency local scrubber will treat specific toxic gases, dust, organic solvents, flammable gases, and odors through process such as washing, carbon absorbers or bag-type dust collectors equipment to treat the remaining emissions before they are released into the air. With complete multiphase processing through effective classification and treatment process, TTY has significantly increased the treatment efficiency of air pollution emissions.

▼ Air Pollutant Control Process



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Water Resources Management

Reinforced Water Consumption Strategies

As per the “Aqueduct Water Risk Atlas” of the World Resources Institute, water resource risks in Taiwan are all at a low to medium level (1-2), indicating it is not a water resource pressure area. All water sources for the major operation sites at the Lioudu and Chungli factories, as well as the Neihu Pharmaceutical Development Center of TTY, are 100% obtained from local water plants without the use of underground water, thereby ensuring the preservation of the water source. The quality of water discharged is free of high-density chemicals, and low-concentration wastewater is discharged to a sewage treatment plant in a local industrial zone for final processing after preliminary treatment in the factories. Water is not discharged into natural water bodies unless it complies with national effluent standards.

In 2024, the water intake of TTY’s Lioudu and Chungli factories, as well as the Neihu Pharmaceutical Development Center, was approximately 119.861 million liters, and the sewage discharge was about 95.889 million liters. Sewage discharge slightly decreased by about 2.615 million liters compared to the previous year. No sewage was discharged by TTY as a result of unscheduled leakage or overflow. Furthermore, all sewage discharged complies with the Water Pollution Prevention Act, local governance laws, and the incoming water quality standards of the sewage treatment plants in the industrial zone. The COD and SS in sewage discharged by the Lioudu and Chungli factories are significantly lower than local sewer connection standards, without impacting nature and biological diversity. In the future, our comprehensive water-saving policy will undergo further expansion to encompass systematic water management. This will include optimizing the circulation system, recycling and reusing chilling tower water, upgrading chilling procedures, improving heat recovery rates, and reducing water demand. The importance of saving water is disseminated across all employee levels up to managerial, to ensure fundamental actions are taken.



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Water Consumption Statistics

▼ TTY Water Discharge and Water Quality Monitoring Results From the Recent 5 Years (Unit: Million Liter/Revenue NTD Thousand)

Site	Water Quality	Local Sewer Connection Standards	2020	2021	2022	2023	2024
Lioudu Factory	Water Intake	Million Liter	76.961	91.323	79.936	101.391	101.659
	Water Discharge	Million Liter	61.569	73.058	63.949	81.113	81.327
	COD	mg/L 600	22.68	72.94	26.28	40.24	65.81
	SS	mg/L 600	6.31	3.15	6.10	7.58	9.11
Chungli Factory	Water Intake	Million Liter	23.811	20.086	19.626	19.830	16.242
	Water Discharge	Million Liter	19.049	16.069	15.701	15.864	12.994
	COD	mg/L 480	66.58	13.5	24.24	56.47	69.7
	SS	mg/L 320	4.53	3.55	7.40	12.38	17.00
PDC	Water Intake	Million Liter	2.429	2.248	2.291	1.909	1.960
	Water Discharge	Million Liter	1.943	1.798	1.833	1.527	1.568
Total Water Intake		Million Liter	103.201	113.657	101.853	123.130	119.861
Total Water Discharge		Million Liter	82.561	90.926	81.482	98.504	95.889
Revenue		NTD Thousand	4,221,836	4,535,610	5,061,606	5,505,542	5,893,847
Sewage Discharge Intensity		Million Liter / Revenue NTD Thousand	0.0000196	0.0000200	0.0000161	0.0000179	0.0000163

Note: Information revision: The previously reported discharge data was mistakenly typed as water intake, new water intake data were added from 2020 to 2024. The discharge data was corrected according to Article 31 of the "Keelung City Urban Planning Industrial Area Wastewater Treatment and Sewage Use Autonomous Regulations" according to the formula of 80% of tap water consumption [water intake * 0.8].

▼ Comparison of the COD and SS Levels in the Effluent with the Local Sewer Connection Standards

Lioudu Factory		Chungli Factory	
COD	SS	COD	SS
The actual COD (65.81 mg/L) in sewage discharged in 2024 was 9.12 times below the local sewer connection standards (600 mg/L).	The actual SS content (9.11 mg/L) in sewage discharged in 2024 was 65.86 times below the local sewer connection standards (600 mg/L).	The actual COD (69.7 mg/L) in sewage discharged in 2024 was 6.89 times below the local sewer connection standards (480 mg/L).	The actual SS content (17.00 mg/L) in sewage discharged in 2024 was 18.82 times below the local sewer connection standards (320 mg/L).

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Waste Management

To fully understand the waste flow of factories and reinforce supplier audits, TTY also checks orders every week and tracks disposal vehicle GPS abnormalities. Additionally, the company follows supplier handling conditions every month and conducts on-site audits every year to confirm the output and flow after processing. Moreover, TTY implements irregular vehicle audits to confirm that waste disposal and handling contractors conduct business according to the laws. In 2024, the total waste generated by TTY in the Lioudu, Chungli, and Neihsu factories was about 79.60 tons, among which hazardous waste was 20.97 tons, among which non-hazardous waste accounted for 58.63 tons. All such waste was delivered to qualified disposal contractors for off-site treatment. The Chungli and Lioudu factories achieved a 100% compliance rate in weekly and monthly audits, without violating the Waste Clearance Act or other relevant laws or causing any impact to the local environment.

TTY also actively responded to the resource recycling policy and waste recycle with total amount of 8.95 tones included 5.56 tones from Chungli factory and 3.39 tones from Lioudu factory respectively in 2024. The Lioudu factory implemented flammable emissions can be recycled through resource recovery in 2022. After the flammable components of the waste are completely burned across the emission treatment plant, the steam heat generated is restored in the "steam boiler," and then the "steam turbine" converts the heat energy into electrical energy to achieve waste reduction and resource recovery. Therefore, the overall recoverable energy of TTY is greatly increased, effectively realizing recycling and reuse.

To fulfill the sustainable government goals of environment friendliness, TTY not only arranges professional technology personnel as per Article 28-2 of the Waste Clearance Act but also aggressively trains dedicated personnel. In 2024, TTY employed a total of 5 dedicated waste professional personnel (2 in the Lioudu factory, 2 in the Chungli factory, and 1 in the Neihsu factory). They submitted a waste clearance plan in compliance with the law, which was approved by the designated agency of the municipality, county (city) competent authority, or central competent authority. TTY also enters into contracts with qualified clearance and processing institutions to handle business and daily waste according to the law. In addition, the Management of Waste Clearance and Tracing Regulations is based on Article 14-2 of the "Regulations for Public and Private Waste Clearance" and Disposal Organizations. All clearance machines and devices of waste contractors need to be declared and approved. Meanwhile, all vehicles delivering TTY's business waste must be equipped with GPS, and the vehicle trace return rate must reach 90% to facilitate real-time monitoring by the competent authority and TTY.

▼ 2024 Disposal Contractors Audit Results

Site	Weekly Audit Rate	Monthly Audit Rate	No. of Physical Audit	No. of Unscheduled Follow-ups
Chungli Factory	100%	100%	1	1
Lioudu Factory	100%	100%	4	4
Neihu Factory	100%	100%	1	0

▼ TTY Wastes Categories by Groups in the Recent 5 Years (unit: tones)

Type / Year	2020	2021	2022	2023	2024
Hazardous industrial waste	25.18	25.59	28.55	28.43	20.97
Non-hazardous industrial waste	13.95	19.43	21.18	14.84	58.63
Total wastes	39.13	45.02	49.73	43.27	79.60

Note: In 2024, the total amount of waste increased compared with previous years because Lioudu Plant assisted the client in processing several batches of waste medicines.

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▼ Waste Directly Disposed of by TTY through Disposition Operations in the Recent 5 Years (unit: tons)

Disposal Operations/Year		2020	2021	2022	2023	2024
Hazardous Waste	Incineration (including energy recycling)	-	-	14.82	19.83	12.74
	Incineration (excluding energy recycling)	22.09	22.23	13.73	8.59	6.65
	Landfill	-	-	-	-	1.584
	Other Disposal Operations (physical treatment)	3.09	3.36	-	-	-
	Total	25.18	25.59	28.55	28.43	20.97
Non-Hazardous Waste	Incineration (including energy recycling)	-	-	-	-	12.00
	Incineration (excluding energy recycling)	N	4.27	5.53	2.20	20.86
	Landfill	-	-	-	-	0.45
	Other Disposal Operations (physical treatment)	13.95	15.16	15.65	12.64	25.32
	Total	13.95	19.43	21.18	14.84	58.63

Note: The statistical scope of data was the declared volume of waste generated from Lioudu Factory, Chungli Factory, and Neihsu Factory of TTY. The data was expressed with 2 decimal places after rounding off.

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Toxic Substance Management

As per the “Toxic and Concerned Chemical Substances Control Act,” TTY goes beyond the regulations by educating relevant managerial personnel and assisting them in acquiring certifications such as toxicity professional management personnel. Although toxicity and concerned chemical substance operation volumes in all factories are lower than statutory standards. These professional management personnels in charge of toxicity control for chemicals as per the toxicity management flow of the Company.

▼ TTY Toxicity Management Flow

The requesting department must complete and submit the required form for new chemical substances through the workflow system.	
▼	
The substance's toxicity must be verified by management personnel.	
▼	
Toxicity professional management personnel with certificates (6 in Lioudu and 1 in Chungli) (Neihu factory has established individuals in charge of this duty)	
▼	
YES The verifier must inform the department manager to seek approval of such a substance before making a purchase.	NO As per the Government Chemicals Regulation, the department must update its hazardous materials inventory list and a copy must be forwarded to the Department of Environment, Safety, and Health before any purchase.
▼	
Approved Operation Records are to be made daily, by batch, as per actual operations. These records should be transferred to management personnel monthly for online reporting.	

▼ Toxic and Concerned Chemical Substances Used by TTY

Toxicity Classification	Chungli Factory	Lioudu Factory	Neihu Factory
Category 1~ 3	12	19	14
Category 4	12	16	26
Concerned Chemical Substance	4	6	1

Note: Categories standards are based on the “Toxic and Concerned Chemical Substances Control Act” .

Before using toxic chemical substances, TTY applies for the required documentation and prepares an SDS and Basic Disaster Prevention Data Sheet. The containers for such substances are labeled with cautionary and warning signs. Additionally, TTY has joined the National Disasters Prevention and Protection Commission, an organization that responds to disasters with agreed-upon protocols for incidents occurring during the use or storage of toxic chemical substances. Any incidents should be reported within 30 minutes, and contingency teams must reach the location within 2 hours.

To enhance the response procedure and coordinate with the Ministry of Environment, a system for training management and obtaining qualified licenses for emergency responders of toxic and chemical substances should be established. Relevant personnel in each factory should conduct trial calculations based on risk levels and complete personnel registration as per the “Regulations on the Management of Emergency Responders of the Toxic and Concerned Chemical Substance” . In 2023, 4 professional emergency responders were registered, including one from Neihu Factory at the general level, 1 from Chungli Factory at the general level, 1 from Lioudu Factory at the operational level, and 1 from Lioudu Factory at the technical level respectively.

Workplace Happiness

- Diversity in the Workplace
- Employment Protection Rights
- Employee Benefits
- Remuneration Structure

Talent Cultivation

- Expanding Employee Competence
- Talent Development

Occupational Safety and Health

- Occupational Safety and Health Management
- Health Promotion

Social Participation

- Cultivating the DNA of Goodness, TTY Charity Action
- Promote the Access of Medicine for the Unmet Needs of the Community
- Promoting Medical Education



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Key Performance

- ✓ **114** new employees joined in 2024, providing **523 work opportunities**.
- ✓ **58.06%** of managerial positions are filled by females, demonstrating our commitment to gender equality in the workplace.
- ✓ In 2024, the average salary of entry-level positions was more than 1.39 times higher than the local minimum salary.
- ✓ In 2024, the average training time of each employee was **108.72 hours**.
- ✓ Free flu vaccines were offered to **919 employees and their relatives** in 2024.
- ✓ The Summer Internship Program (SIP) has been held for 17 consecutive years, and we promoted to the international school recently with 2,198 enrolled as of 2024 (2,066 domestically and 132 overseas) with the total number of beneficiaries reaching **417 students**.

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Workplace Happiness

We believe that our employees are one of our most valuable assets. That's why we are committed to providing a friendly work environment that allows everyone to reach their full potential. Our efforts have been recognized by HR Asia, who named us one of the "2020 & 2022 Best Companies to Work for in Asia" in the Taiwan area. We scored excellently in areas such as company culture, organizational leadership, employee recognition and satisfaction, and organizational atmosphere. We are proud to have been recognized for our outstanding performance across many categories, including our encouragement of constant self-enhancement and learning, and our support of cross-departmental collaboration and position rotation.

At the Health 2.0 Conference in 2022, TTY won "Best Company in Healthcare Industry" with excellent performance in industrial reputation and competitive advantage in Asia Pacific section, and marking a significant milestone on its path towards internationalization. TTY was honored with the Best Workplace Award in 2023 and the Best Employer Attraction Award in 2024 by Taiwan's premier online recruitment platforms (1111 and 104 Job Bank) respectively.

Material Topic : Talent Attraction and Retention		
Corresponding GRI Index	GRI 202-1 Ratios of Standard Entry-level Wage by Gender Compared to Local Minimum Wage GRI 401-1 New Employee and Departed Employee GRI 401-2 Benefits Provided to Full-time Employees That are not For Temporary or Part-time Employees GRI 401-3 Parental Leave	
SDGs Principle	<div><div>4 QUALITY EDUCATION </div><div>8 DECENT WORK AND ECONOMIC GROWTH </div></div>	
Impact Assessment	Related Stakeholder Engagement: Investors, Customers, Employees and Suppliers (+) Positive impact: Talent is a crucial asset for any company. Effective talent attraction and retention strategies are necessary to build a diverse and efficient team, which can deliver high-quality products and value-added services. Talented individuals with character, innovation, self-discipline, and professional skills can enhance the competitiveness of the enterprise and make it sustainable. It is a topic of focus and expectation for any organization. (-) Negative impact: "If a company is unable to attract and retain capable and valuable talents, losing key employees can result in high costs of recruiting and training new staff. This not only reduces the overall competitiveness of the company but also affects its sustainable development, which is not favored by all stakeholders."	

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Material Topic : Talent Attraction and Retention

Policies and Commitments	Employees are the core asset of any organization. At TTY, we believe in enhancing organizational performance by fostering a culture of development, cultivation, and management of our workforce. We aim to help each employee understand the strategic direction of the organization, the purpose and content of short-, mid-, and long-term goals, and the connection between their departmental and personal goals with organizational goals. This approach ensures that our employees reach their full potential and add value to the organization. Working and growing with TTY provides our employees with numerous opportunities to explore their professional interests and enrich their lives.
Goals and Targets	<ul style="list-style-type: none">• All sorts of business management classes, online courses, internal and external education trainings, and discussions on scenarios of management topics are in place to provide continuous learning and growth.• To help employees achieve their short-, mid-, and long-term development goals, we offer job rotations, ability-based promotions, as well as selection for interdepartmental rotation and promotion. These opportunities are tailored to individual plans for high-potential employees and future leaders of departments.• Continue to across departments rotation to develop more professional talent, discover potential, and promote key strategies for cross-departmental collaboration, so the employees can develop in different fields and contribute value to the company's future growth.
Responsibilities and Resource	Internal and external training courses, an online management learning platform, themed role-playing concept learning, and group discussions are available to improve the management team and future successors' leadership awareness and effectiveness.
Annual Action Results	<ul style="list-style-type: none">• We value candidates' impressions of TTY and were given a rating of 4.67/5 by job applicants in 2024.• Orientation plan: to assist the new recruits settle in, the Company re-planning the on-board training courses. We scored 92/100 in 2024 among new employees, of which 93.81% continued to collaborate with us.• Overall in the whole year, 78 colleagues were promoted and job rotations, included 18 were promoted to supervisory positions.

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Diversity in the workplace

Diversity and inclusivity are at the core of TTY's continuous innovation. TTY is proud to have a team of employees that represents a wide range of backgrounds, beliefs, values, races, ages, genders, and experiences. Everyone is encouraged to express their talents and contribute to the company's growth. At TTY, we strive to create an inclusive and non-discriminatory workplace that accommodates all employees, regardless of their gender, and the atmosphere enables employees to perform their duties and share their experiences and perspectives. As we operate in the high-tech industry, expertise, and specific knowledge are essential to our work in the pharmaceutical sector.

By the end of 2024, TTY will have 523 full-time employees, 18 fixed-term employees (such as consultants, assistants and research nurses), and 36 dispatched workers to adjust staffing needs. All regular employees are of local nationality, and the proportion of female employees has remained stable at over 50% for the past 5 years. Additionally, to promote equality in the workplace, 4 indigenous people and 4 people with disabilities (including 2 with severe physical and mental disabilities) were employed in 2024. The proportion of vulnerable groups among all employees is 1.53%.

▼ TTY 2024 Employee Structure

		Male		Female		Total	
		Number	%	Number	%	Number	%
Age	≤The 30s	24	4.59%	30	5.73%	54	10.32%
	31s-50s	159	30.40%	205	39.20%	364	69.60%
	≥51s	39	7.46%	66	12.62%	105	20.08%
	Subtotal	222	42.45%	301	57.55%	523	100.00%
Job Category (Note:2)	Management and Administration	22	26.83%	60	73.17%	82	15.68%
	Sales and Marketing	54	36.99%	92	63.01%	146	27.92%
	R&D	22	45.83%	26	54.17%	48	9.18%
	Factory	124	50.20%	123	49.80%	247	47.22%
	Subtotal	222	42.45%	301	57.55%	523	100.00%
Type of Labor and Employment (Note:3)	Permanent Employees	222	41.04%	301	55.64%	523	96.67%
	Full-time Employee	3	0.55%	11	2.03%	14	2.59%
	Temporary Employment-Contracted	4	0.74%	0	0.00%	4	0.74%
	Subtotal	229	42.33%	312	57.67%	541	100.00%

- Note:
1. Temporary workers, whose salaries, labor insurances and health insurances are paid by a work dispatch agency, are categorized as non-employee workers. 38 dispatched workers in 2023, and 36 in 2024, there are no significant changes.
 2. The statistics of age and job category doesn't consist of such as consultants, assistants and research nurses who were part-time and full-time with fixed-term contracts, and those were 18 contract employees.
 3. The types of labor and employee, full-time employees are defined as with irregular contracts, and contract employees are defined as full-time and part-time employees with fixed-term contracts.
 4. Statistics as of 31/12/2024.

Employee recruitment rate for the whole year was 21.80%, and employee turnover rate was 18.74%. An employee satisfaction survey was conducted for new employees who had reached 3 months of tenure. The survey used a scoring method that included five major items: environmental adaptation, interaction, work adaptation, life adjustment, and counselor care (20 points per item). The system sent the questionnaire with a notice to fill it within 6 months. By the end of 2024, 92 recruits had been surveyed with a satisfaction rate of 92%.

▼ TTY 2024 Number and Percentage of New and Departed Employee

	Age	Male		Female		Total	
		Number	%	Number	%	Number	%
New Employees	≤The 30s	15	13.16%	14	12.28%	29	25.44%
	31s-50s	33	28.95%	40	35.09%	73	64.04%
	≥51s	4	3.51%	8	7.02%	12	10.53%
	Subtotal	52	45.61%	62	54.39%	114	100.00%
Departed Employees	≤The 30s	8	8.16%	4	4.08%	12	12.24%
	31s-50s	29	29.59%	38	38.78%	67	68.37%
	≥51s	13	13.27%	6	6.12%	19	19.39%
	Subtotal	50	51.02%	48	48.98%	98	100.00%

- Note:
1. New employee percentage = no. of the same gender in each age category/no. of employees (114) in the category by the end of 2024.
 2. Departed employee percentage = no. of the same gender in each age category/no. of employees (98) in the category by the end of 2024.
 3. Statistics of new employee and departed employee were without contract employees.

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Employment Protection Rights

Protecting Employee Rights

In order to ensure a just and secure workplace, our company adheres to globally recognized human rights standards, such as the "ILO Declaration on Fundamental Principles and Rights at Work," the "Universal Declaration of Human Rights," "UNGC 10 Principles," and "United Nations Guiding Principles on Business and Human Rights, UNGPs." Our human rights policy can be found on our website, and we follow all local labor regulations to treat every stakeholder with equal respect. The company received no employee complaints in 2024. To prevent similar incidents in the future, we will provide training that emphasizes communication and management skills for our management team.

Human Rights Maintenance Commitments	Human Rights Management Plans
<ul style="list-style-type: none">▶ In compliance with international human rights standards and local laws and regulations▶ We ensure equal job opportunities by eliminating discrimination▶ We ensure a safe and healthy working environment▶ Forced labor or child labor is prohibited▶ Implemented supplier sustainability management mechanism to evaluate capability▶ Assist colleagues with their physical and mental health and work-life balance▶ Implement privacy protection and Information safety.	<ul style="list-style-type: none">▶ Assist colleagues with their physical and mental health and work-life balance▶ Education training and promotion▶ Gender equality▶ Occupational health and safety▶ Child labor prohibited▶ Various activities▶ Effective and multi-directional communication channels

Harmonizing Labor-employer Relations

TTY labor meetings are attended by senior executives and colleagues from various departments. These meetings are held every 3 months to discuss topics such as the revision of labor conditions. TTY strictly adheres to the labor laws and regulations set by the Taiwan government. During the reporting period, no significant operational changes that adversely affected employee rights or led to a large number of contract terminations occurred.

In compliance with Article 16 of the Labor Standards Act and the Act for Worker Protection in Mass Redundancies, notice is required before redundancies when upcoming major operational alterations or changes in labor conditions may cause damage to the rights and interests of workers. For each terminated employee, TTY shall submit a report with arrangements for career guidance or vocational training needs. Severance pays will be issued in compliance with Article 11 of the Labor Standards Act.

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Maternity Health Protection

The Gender Equality in Employment Act specifies that employees have the right to apply for unpaid parental leave (UPL). This leave can be requested before any of their children reach the age of 3, but the maximum period of leave allowed is 2 years. While on UPL, employees are entitled to continue participating in their original social insurance program.

▼ TTY 2024 Parental Leave Statistics

	Male	Felame	Total
(a) Number of employees qualified for parental leave application in 2024 ¹	24	36	60
(b) Number of parental leave applications in 2024	4	6	10
(b/a) UPL Reinstatement rate	16.67%	16.67%	16.67%
(c) Expected number of employees reinstated in 2024	3	3	6
(d) Actual number of employees reinstated from parental leave in 2024 ²	3	1	4
(d/c) Retention rate	100.00%	33.33%	66.67%
(e) Actual number of employees reinstated in 2023	1	8	9
(f) Actual number of employees reinstated from parental leave in 2023 and have worked continuously for at least 1 year	1	7	8
(f/e) UPL retention rate	100.00%	87.50%	88.89%

Note:
1. Based on employees who applied for maternity or paternity leave in the past 3 years (2022-2024).
2. Expected and actual reinstatement date in 2024.

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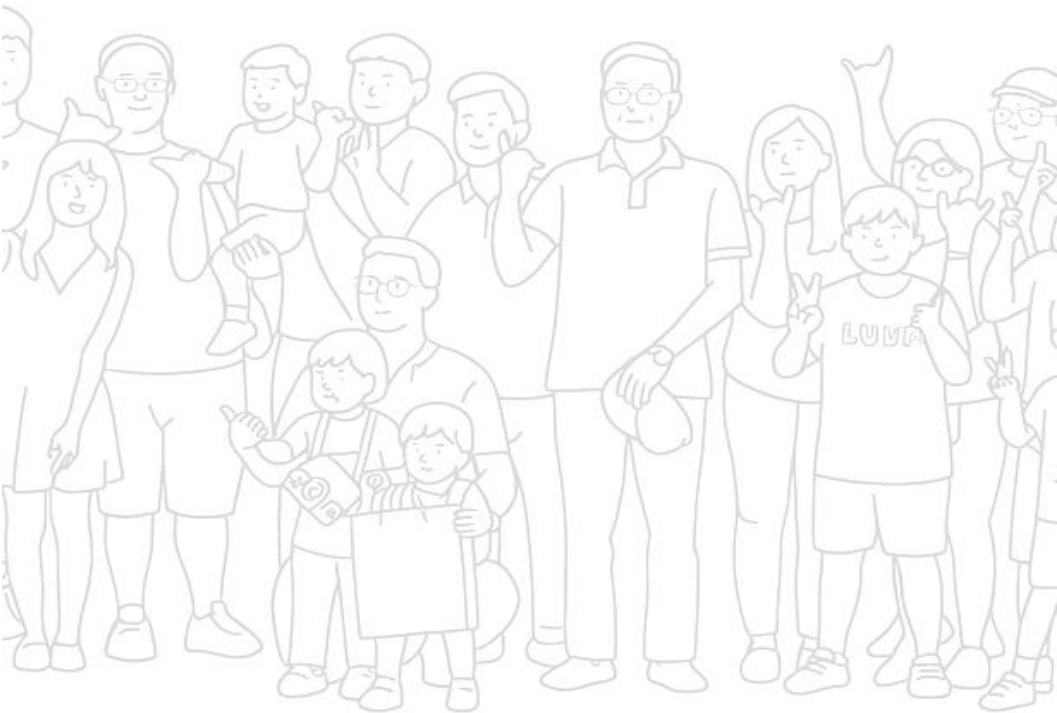
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Employee Benefits

Apart from labor insurance, health insurance, special leave, maternity leave, and parental leave as prescribed in the Labor Act, we also offer group accident insurance, travel leave, paid sick leave, a year-end bonus, and regular health examinations. The Welfare Committee also organizes cash gifts for employees’ birthdays, weddings, maternity, festivals (Dragon Boat Festival/ Mid-autumn Festival), condolences, bereavement, disaster aid, education subsidies (learning aids and scholarships for employees’ children), and travel subsidies. The TTY Retirement Management Guidelines and Regulations specify retirement eligibility and pension for full-time employees, fully in compliance with local labor regulations. More details regarding pension and retirement eligibility are described on the Company Annual Report.

The Welfare Committee adopted the TTY Welfare Subsidy Guidelines and allocated NT\$20,000 to each full-time employee in 2024. A total of 480 employees received the full subsidy, while 25 others who have either worked at TTY for less than 12 months or left TTY after receiving a subsidy, received a pro-rated subsidy based on their tenure.

As winter approaches, flu viruses thrive alongside COVID-19. In 2020, we cooperated with the national epidemic prevention mechanism and again arranged vaccinations for all employees and up to 3 of their immediate family members. Therefore, a total of 919 vaccines were given to employees, their families, and directors in 2024. As a corporation that takes its corporate social responsibility seriously, TTY does not waiver in its efforts to maintain public health and prevent epidemics, helping to build a safe and secure social protection network for employees and their families and create a prosperous society.



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Remuneration Structure

Employees' contributions are closely related to company growth. Therefore, TTY strives to create a competitive salary based on the local basic wage and sets a minimum internal monthly approved salary to meet current basic wage requirements. After taking into account various factors such as job category, education, and experience, the average salary of entry-level personnel at TTY is 1.40 times for female and 1.38 for male higher than the local basic wage.

▼ The Ratio of the Average Salary of Entry-level Employees to the Local Minimum Wage of TTY for the Recent 5 Years (unit: NTD)

Year	Minimum wage in Taiwan/ Month	Average Standard Salary of Entry-level Personnel/Month		Average Standard Salary of Entry-level Personnel/Minimum Local Salary	
		Male	Female	Male	Female
2020	23,800	36,913	35,645	1.55	1.50
2021	24,000	37,807	36,262	1.58	1.51
2022	25,250	38,018	37,284	1.51	1.48
2023	26,400	37,658	37,771	1.43	1.43
2024	27,470	37,867	38,354	1.38	1.40

Note:

1. Entry-level refers to personnel with Grade 3.
2. The difference in the average salary between entry-level male and female personnel is mainly due to the difference in work content and work attributes.

▼ Salary and Compensation Ratios Across Employee Categories

Employee Categories	2023	2024
Management and Administration (Male:Female)	1.24 : 1	1.36 : 1
Sales and Marketing (Male:Female)	1.26 : 1	1.02 : 1
R&D (Male:Female)	1.26 : 1	1.18 : 1
Factory (Male:Female)	1.02 : 1	1.04 : 1
Annual Total Compensation (highest individual: median of other employees)	12.1 : 1	12.83 : 1
Annual Total Compensation Increase Percentage (highest individual: median of other employees)	4.94 : 1	4.54 : 1

Note: Statistics were without contract employees.

▼ Average and Median Annual Salaries of Full-time Employees not Holding Supervisory Positions in TTY for the Recent 5 Years

Full-time Employees not Holding Supervisory Positions		
Year	Median Annual Salary	Average Annual Salary
2020	1,126	936
2021	1,169	992
2022	1,206	1,021
2023	1,244	1,051
2024	1,273	1,072

Note: Supervisory positions include directors, employees in managerial positions, consultants, and some other roles.

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Talent Cultivation

In TTY we promote an environment of continuous learning, and this is what motivates our workforce. In real terms, employees seek to advance their careers through management programs, and internal and cross-subsidiary/affiliate job rotations.

Expanding Employee Competence

New Employee Training

The Company conducts orientation for new employees over several days, both in-person and online, to familiarize them with its regulations quickly and effectively. This helps to mitigate business risk. The new employee training was revised this year. This includes the following training sessions: Healthy Workplace - Information courses, Healthy Workplace - Accounting Expense Reporting Courses, Environmental Safety and Health, Drug Advertising, Legal Compliance related courses, etc. 113 attendees participated in orientation training sessions in 2024.

Employee Training

To raise awareness of business risks and Ethical management, we present various online and in-person courses. The former focuses on Drug Safety Supervision, SDGs Good Life Goals, Information Security, promotion of Corporate Ethical Management, Introduction to GDP Management, Intellectual Property Concept and Protection, and Drug Advertising etc. All employees have attended and completed online training. Internal physical course and offsite training for 2024 calculated an average of 108.72 hours of classes per employee, of which male sales and marketing representatives received the most training, topped by 121.95 hours per person; followed by 121.67 hours of female Sales and Marketing attended.

▼Average Training Hours of Each Employee Based on Gender and Job Category in 2024

Job Category		Male	Female	Subtotal
Management and Administration	(a1) The actual number of people during the reporting period	23	69	92
	(b1) Training hours during the reporting period	2,518	7,215.5	9,733.5
	(b1/a1) The average number of training hours during the reporting period	109.47	104.57	105.79
Sales and Marketing	(a2) The actual number of people during the reporting period	52	82	134
	(b2) Training hours during the reporting period	6,341.5	9,977.5	16,319
	(b2/a2) The average number of training hours during the reporting period	121.95	121.67	121.78
R&D	(a3) The actual number of people during the reporting period	23	27	50
	(b3) Training hours during the reporting period	2,413	2,985.5	5,398.5
	(b3/a3) The average number of training hours during the reporting period	104.91	110.57	107.97
Factory	(a4) The actual number of people during the reporting period	123	124	247
	(b4) Training hours during the reporting period	12,562.5	12,850.5	25,413
	(b4/a4) The average number of training hours during the reporting period	102.13	103.63	102.88
Total	(Q) Hours	23,835	33,029	56,864
Total number of employees at the end of the reporting period	(R) Number	221	302	523
The average number of training hours per employee	((Q/R) Hours	107.85	109.36	108.72

Note: Statistics of training hours were without contract employees.

Talent Development

Performance Evaluations

In 2024, 94.84% of our employees underwent regular performance reviews, and the remaining 5.16% were new employees in their probation period. Before the end of the new hiring period, supervisors provide performance evaluations by filling in the "New Employee Probation Performance form."

▼ TTY 2024 Regular Performance Review Rates

Job Category		Male	Female	Subtotal
Management and Administration	(a1) Total number of employees at the end of the reporting period	22	60	82
	(b1) Number of employees undertaking regular performance and career development reviews	21	55	76
	(b1/a1) Percentage	95.45%	91.67%	92.68%
Sales and Marketing	(a2) Total number of employees at the end of the reporting period	54	92	146
	(b2) Number of employees undertaking regular performance and career development reviews	48	84	132
	(b2/a2) Percentage	88.89%	91.30%	90.41%
R&D	(a3) Total number of employees at the end of the reporting period	22	26	48
	(b3) Number of employees undertaking regular performance and career development reviews	21	26	47
	(b3/a3) Percentage	95.45%	100.00%	97.92%
Factory	(a4) Total number of employees at the end of the reporting period	124	123	247
	(b4) Number of employees undertaking regular performance and career development reviews	121	120	241
	(b4/a4) Percentage	97.58%	97.56%	97.57%
Total	(R) Total number of employees at the end of the reporting period	222	301	523
	(Q) Number of employees undertaking regular performance and career development reviews	211	285	496
	(Q/R) Percentage	95.05%	94.68%	94.84%

Note: Statistics of performance review were without contract employees.

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Job Rotation and Promotion

Apart from various software and hardware training programs and other such resources, further job rotations across departments are the strategies to cultivate more professional talents and develop potential, and to promote cross-departmental collaboration, which allow each colleague to develop in different fields and contribute value to the Company's future growth.

▼ Promotion and Rotation Numbers of Each Employee Based on Job Category in 2024

Job Category		Promotion	Rotation	Subtotal
Management and Administration	Management position	0	0	0
	Non-managerial position	3	2	5
	Total	3	2	5
Sales and Marketing	Management position	2	2	4
	Non-managerial position	19	9	28
	Total	21	11	32
R&D	Management position	2	1	3
	Non-managerial position	2	6	8
	Total	4	7	11
Factory	Management position	4	1	5
	Non-managerial position	18	7	25
	Total	22	8	30
Total	Management position	8	4	12
	Non-managerial position	42	24	66
	Total	50	28	78

Note: Statistics of promotion and rotation were without contract employees.

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Occupational Safety and Health

Material Topic : Occupational Safety and Health

Corresponding GRI Index	GRI 403-1 Occupational Health and Safety Management System GRI 403-2 Hazard Identification, Risk Assessment, and Incident Investigation GRI 403-3 Occupational Health Services GRI 403-4 Worker Participation, Consultation, and Communication on Occupational Health and Safety GRI 403-5 Worker Training on Occupational Health and Safety GRI 403-6 Promotion of Worker Health GRI 403-7 Prevention and Mitigation of Occupational Health and Safety Impacts Directly Linked by Business Relationships GRI 403-8 Workers Covered by an Occupational Health and Safety Management System GRI 403-9 Work-related Injurie GRI 403-10 Work-related Ill Health
SDGs Principle	<div><div>3GOOD HEALTH AND WELL-BEING</div><div>8DECENT WORK AND ECONOMIC GROWTH</div></div>
Impact Assessment	Related Stakeholder Engagement: Employees and Suppliers (+) Positive impact: Improvement of employees’ health and safety, maintain basic personal safety and employment assurance. (-) Negative impact: Invest in promotion activities to prevent risks when unexpected disasters occur and cause damage to workers’ safety and health.

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Material Topic : Occupational Safety and Health

Policies and Commitments	In compliance with the laws and regulations, reduce hazards, education and care, healthy workplace with the goal of promoting "zero" occupational accidents.
Goals and Targets	Continuous Goals Continue to implement the occupational safety and health policy of in compliance with the laws and regulations, reduce hazards, education and care, healthy workplace. Mid- to Long-term Goals "Zero" occupational accidents as the Mid- to Long-term Goal.
Responsibilities and Resources	TTY conducted occupational education training every year, and health checks for all employees annually, included general health checks and special health checks for those colleagues with high occupational health risks.
Annual Action Results	<ul style="list-style-type: none">In the year 2024, TTY held 4 training sessions for dispatched personnel, totaling 51 participants, and 16 sessions for contractors, totaling 102 participants.In the year 2024, a total of 93 employees underwent special physical examinations. No personnel above level 3 management and no abnormalities in physical examinations caused by special operations were detected this year.In the year 2024, TTY did not record any occupational hazards with contractors.

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Occupational Safety and Health Management

An "Occupational Safety and Health Work Code" and "Occupational Safety and Health Management Plan" have been drafted under the "Occupational Safety and Health Act" and relevant laws. TTY then referred to the ISO 45001: 2018 Occupational Safety and Health Management System to establish the management SOP, and conducted the relevant policies and management procedures in all sites. Additionally, each factory shall establish an occupational safety and health unit comprising management staff and first-aid personnel.

▼ Workers Covered by TTY Occupational Safety and Health Management System

	Numbers of Employee	Number of Non-employees
Headquarters	275	3
Chungli Factory	116	17
Lioudu Factory	133	20
Neihu Pharmaceutical Development Center	17	0
Total	541	40
Percentage	93.12%	6.88%

Note: The number of non-employees includes contractors and dispatched workers who work in the factory for a long time.

To ensure the safety of our employees, we provide a range of insurances including labor and health insurance, group insurance, accident insurance, occupational injury insurance, cancer insurance, and travel insurance for business trips. Additionally, we also have public accident liability insurance for each operation site. We have qualified and certified fire protection management personnel stationed in each factory, and a fire protection plan is formulated according to local laws and regulations. Regular public safety equipment inspections of buildings and fire protection facilities are conducted and reported to the competent authority to ensure the safety of all employees.

An Occupational Safety and Health Management Committee has been set up in the Chungli and Lioudu factories by local laws and regulations. Neihu PDC is excluded from the regulatory standards but formed a Safety and Health Management Promotion Team to take charge of relevant affairs. Members call regular meetings and review occupational safety issues, ensuring occupational health and safety supervision, as well as planning suggestions accordingly. At least a third of members are accounted for by labor representatives.

▼ 2024 The Composition of the Occupational Safety and Health Committee

Members of the OSH Committee	Number
OSH specialists	1
Managers, supervisors, and instructors of each unit	3
Engineers	1
Medical staffs	1
Labor representatives	3
Total	9

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Hazard Risk Identification and Incident Investigation

TTY senior supervisors and department heads have conducted hazard identification and risk assessment by the provisions of ISO 45001 Occupational Safety and Health Management System to identify hazards and risks caused by changes in the organization, Occupational Safety and Health Management System or its activities, and proposed management plans or tracked risk opportunities and control measures. When an accident occurs, TTY has standardized the accident notification and accident investigation process by the relevant provisions of the Occupational Safety and Health Act. By investigating accidents, the causes and potential consequences of accidents can be understood, and preventive and improvement measures can be taken in the future. In addition, to effectively manage and track accident investigation reports, the unit in which an accident occurred must provide an accident investigation report and improvement countermeasures. The case will be closed only after approval by the top supervisor of the factory.

Contractor Occupational Safety Management

To ensure the safety and health of employees and contractors, TTY complies with Article 26 of the Occupational Safety and Health Act which states that when all or part of the business is delivered to a contractor, the contractor must be informed in advance about the working environment, and all known hazardous factors. Safety and health regulation measures are to be adhered to per TTY's Contractor Safety, Health, and Environmental Management Standards. Before outsourcing certain work, the two parties must sign a joint contract. During the contract period, in addition to observing the provisions of the contract, both parties should also abide by relevant laws and regulations, such as the government's occupational safety and health regulations, environmental protection, and fire hazard-related regulations. In addition to providing complete occupational safety and health education and training for TTY employees, the Company also conducts occupational safety and health education and training for dispatched employees and contractors. In the year 2024, TTY held 4 training sessions for dispatched personnel, totaling 51 participants, and 16 sessions for contractors, totaling 102 participants. In addition, the Company also provides health consultation services for dispatched personnel. If dispatched or contracted personnel encounter an emergency, the Company will provide basic emergency medical assistance and assist in sending them to the nearest hospital for a consultation.

For major engineering contracts or construction work, TTY also requires contractors to designate a person in-charge of the contracted project during the design stage and before the start of each project phase as the commander, supervisor, and coordinator of large-scale construction. Reports covering hazard identification, risk assessment, and measures to control such risk according to the assessment results should be presented based on the design, construction, and execution methods. The contractor should receive confirmation and approval from TTY before any formal construction work begins. In the year 2024, TTY did not record any occupational hazards with contractors.

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Personal Protective Equipment

We value and protect the safety of each product we make. Personal protective equipment (PPE) is used to keep our operators safe from certain occupational hazards. By relevant occupational safety and health laws and regulations, TTY conducts environmental harmful component inspections for different processes and production lines to assess the necessity and effectiveness of protective equipment and determine the working environment.

For example, glove boxes effectively allow factory workers to avoid contact with chemicals, and spill kits are provided for an immediate response to chemical spillages or leakages. This ensures that injuries can be contained, and the disaster mitigated.

In addition, PPE is updated depending on the process requirements and use conditions so that production line employees receive maximum protection. For example, masks and protective clothing are all disposable, and respiratory protective equipment is replaced according to the degree of dust adsorption.

▼ Different Occupational Safety and Health Protection Equipment for Different Processes

Unit	Process	Hazard Identification	Corresponding Protective Equipment
Oral Section	Weighing process	Organic solvents and dust	Powered Air-Purifying Respirators (PAPR)
	Crushing Process	Noisy workplace	Hearing protection
	Ingot shaping process	Noisy workplace	Hearing protection
	Coating process	Organic solvent	Respiratory protective equipment
Injection Section	Weighing process	Organic solvent	Glove boxes, chemical-resistant gloves
Physical and Chemical Section	Chemical experiment	Organic solvent	Respiratory protective equipment, chemical-resistant gloves, chemical fume hood
Microbiology Section	Microbiological experiment	Microbial contamination	Biosafety cabinet

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Occupational Injury Statistics

In year 2024, there were 4 injury incidents with type of Pinch, roll, fall, fall down, roll down. When an accident occurs, TTY has standardized the accident notification and accident investigation process by the relevant provisions. By investigating accidents, the causes and potential consequences of accidents can be understood, and preventive and improvement measures can be taken in the future.

▼Occupational Injury Statistics of TTY Employees for the Recent 5 Years

Year	Working Hours	Number of Recordable Occupational Injuries	Frequency Rate of Recordable Occupational Injuries	Number of Severe Occupational Injuries	Frequency Rate of Severe Occupational Injuries
2020	1,183,759	2	1.68	0	0.00
2021	1,147,336	2	1.74	0	0.00
2022	966,168	0	0.00	0	0.00
2023	1,078,336	1	0.92	0	0.00
2024	1,100,008	4	3.63	0	0.00

- Note:
1. The statistical range includes the Chungli Factory, Lioudu Factory, Neihsu Factory, and PDC.
 2. The statistical standard of occupational injury does not include commuting accidents.
 3. Recordable occupational injuries: workers who cannot continue their normal work due to an occupational injury must leave the workplace for more than 1 day, including deaths caused by occupational injury.
 4. Total recordable injury frequency rate (TRIFR) = number of recordable occupational injuries × 1,000,000 / total working hours (calculated to two decimal places, and not rounded).
 5. Severe occupational injury: an occupational injury that results in death or from which the worker is unable to recover within 6 months.
 6. Severe occupational injury frequency rate = number of severe occupational injuries × 1,000,000/total working hours (calculated to two decimal places, and not rounded).
 7. No occupational disease has occurred to a TTY contractor in the recent 5 years.
 8. Information revision: The previous report calculated the occupational injury rate based on 200,000 working hours. Considering that TTY has exceeded 500 employees, the occupational injury rate changed to 1,000,000 working hours for information disclosure.

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▼ Disability Frequency and Severity Rate Statistics of TTY Employees over the Recent 5 Years

Year	Number of Working Days Lost Due to Disability	Disabling Frequency Rate (FR)	Disabling Severity Rate (SR)	Frequency Severity Indicator (FSI)	Injury Type
2020	24	1.68	20.27	0.18	Object collapse, crumble, fall
2021	6	1.74	5.23	0.09	Cut, slash, and abrasion
2022	0	0.00	0.00	0.00	-
2023	2	0.92	1.85	0.04	Collide
2024	10	3.63	9.09	0.18	Pinch, roll,fall, fall down, roll down

Note:

1. Number of lost working days: number of days unable to work (rest days). The calculation basis includes occupational accident injury leave, excluding sick leave and menstrual leave.
2. Disabling frequency rate (FR) = times of disabling injury × 1,000,000 / total working hours (calculated to two decimal places, and not rounded).
3. Disabling severity rate (SR) = (days of disability damage loss × 1,000,000) / total experienced working hours (calculated to two decimal places, and not rounded).
4. Frequency-Severity Indicator (FSI) = $\sqrt{[(FR \times SR) \div 1,000]}$ (calculated to two decimal places, and not rounded).
5. Information revision: keep consistency to calculate to two decimal places, and not rounded for the data presentation, so the data for previous 4 years are also updated.



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Health Promotion

Health Services

Our employees receive orientation training, health services, medical assistance, and occupational illness prevention talks. We have arranged for onsite nurses to be available 3 times a month and professional doctors to provide consultations 3 times a year. This ensures easy access to professional medical help. The consultations cover a range of topics such as workload assessment and management, prevention of human-factored hazards, maternal health, and workplace violence prevention.

Health Examinations

TTY conducts regular health examinations for all employees every year, including general health examinations and special examinations for colleagues with a higher risk of occupational health problems. In the year 2024, a total of 93 employees underwent special physical examinations, some of them took more than 2 items, and their health management classification was implemented according to the regulations. If the health examination results are about personnel above level 2 management, nurses and professional medical specialists will perform health education and health follow-up examinations, and, if necessary, on-site assessments of suspected work-related injuries may be conducted.

No personnel above level 3 management and no abnormalities in physical examinations caused by special operations were detected this year. Except 4 colleagues in Chungli factory in category of specific chemical substance item resulted in 3rd level management, and completed re-examination separately during February to March, 2025, and redefined as 1st and 2nd level after confirmed by the hospital. The company cares about the health of all employees by continue to follow up, and actively prevent the occurrence of occupational diseases.

▼Classification Results of Special Health Examinations for Each Factory in TTY in the year 2023 & 2024

Year	1 st Level			2 nd Level			3 rd Level			4 th Level		
	Specific chemical substance	Dust	Physical	Specific chemical substance	Dust	Physical	Specific chemical substance	Dust	Physical	Specific chemical substance	Dust	Physical
2023	33	36	28	19	8	8	0	0	0	0	0	0
2024	37	30	25	28	4	16	0	0	0	0	0	0

- Note:
1. 1st Level Management: the results are deemed as normal.
 2. 2nd Level Management: the results are deemed as abnormal but not work related.
 3. 3rd Level Management: the results are deemed as abnormal but cannot determined to be work-related. An occupational medicine specialist needs to assess the patient.
 4. 4th Level Management: the results are deemed as abnormal and work related.
 5. Statistics as of 31/12/2024, and no occupational illness cases in 2023-2024.

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Promoting Health Information

In 2024, TTY promoted 6 health topics through email, including " Drink these 4 drinks before bed to burn fat and help you sleep ", "8 warning symptoms of diabetes", "Jump 8 seconds to fight aging and lower blood pressure", "Broccoli- the anti-cancer vegetable", "Body' s warning signs tells from urine color", and "Abdominal zipper exercise to cut visceral fat and show a slim waist ", to maintain the physical and mental health of our colleagues.

▼ TTY Health Information Promotion in the year 2024



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Social Participation

In the year 2024, these actions centered on the SDG themes of no poverty, good health and well-being, and quality education. TTY initiated a charity group purchase, financial aid to children of cancer patients, eco-friendly farming, hospice care, provided adjuvanted flu vaccines and advocated to increase the vaccination rate for elderly, donated toxic-free rice, and 2 volunteering days annually for each colleagues, and many more actions with welfare organizations to seek more inclusive ways of taking care of our communities.

Cultivating the DNA of Goodness, TTY Charity Actions

Planting the Seeds of Hope: Providing Scholarships and Financial Aid to Children of Cancer Patients



According to statistics from the Ministry of Health and Welfare, patients suffering from certain cancers tend to be younger. The younger cancer population in Taiwan also means that most cancer patients are the economic pillar of their families, so treatment expenses are a particularly heavy burden on families and have an impact on children's lives and studies. To reduce the economic burden on families impacted by cancer, TTY has sponsored the Hope Foundation for Cancer Care since year 2010. Accumulated 14 years since the year 2011, learning subsidies have been given each year to a total of 540 children affected by cancer to help alleviate the financial burden so children can give their undivided attention to their learning. Every year we fund NTD\$1 million to support events that help cancer-affected college students learn under an equal, quality education system.

"Seeing the smiling faces of children is a great encouragement to us." In addition to providing scholarships to enable the children of patients with cancer to get some support in their studies and to reduce the economic burden of patients, TTY also supported the Hope Foundation for Cancer Care in launching the Planting a Seed of Hope project through practical action. Since the year 2016, we have hosted 27 sessions of Planting a Seed of Hope projects for 9 years – 663 people have joined to raise awareness – and provided care and companionship to children of cancer patients to help them through difficult times. Students exploring who they are can still find their position in life and develop their skills. Through listening and sharing, we can assist students who participate in the project to express their emotions, learn how to adjust, and provide substantive support to children of cancer patients.

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“TTY Rice Project” Building a Healthy and Sustainable Super-aged Society

The 3rd year of the “TTY Rice Project” happens to be the year before Taiwan is enter into a super-aged society. By continuing to support friendly agriculture and donating the charity rice to social welfare groups, we also expanded the energy to serve the elderly. In 2024, TTY not only take care of the lonely and elderly through charity activities such as elderly services and parent-child education, but also share the charity rice with organizations and groups in need, and work together to build a healthy and sustainable vision for a super-aged society.

1. TTY Food and Agriculture Day: Health Starts With Eating

CEO Sara Hou believes that, as a pharmaceutical company, TTY should take on CSR from the point of health. TTY has been launching the “TTY Rice Project” since 2022. In the Daxi Rice Planting Area near the Chungli factory, small household farmers who agree with friendly farming methods were consulted to invest in pollution-free rice cultivation and support friendly agriculture through cooperative subscriptions.

“Health starts with eating.” CEO Sara Hou believes that food and health are closely related, so she encourages the volunteer team to actively share this concept. Through “TTY Rice Project” charity series, we can also convey our “healthy” philosophy and work with partners who share the same philosophy towards a sustainable and healthy society.



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2. Joining Hands to Care for the Elderly and Pay Attention to Health Issues in a Super-aged Society

Taiwan will officially become a super-aged society in 2025, with 1 in 5 people being over 65 years old. Elderly health care is an important public health issue. Therefore, the ESG action has expanded from supporting social welfare groups to supporting social organizations for the elders, hoping to infuse positive influence in the super-aged society through volunteer power.

CEO Sara Hou encouraged the team that always listen to the other party's needs and then provide appropriate services. "Life is meaningful only when you are needed by others." She hopes that the team will continue to demonstrate their passion and professionalism, and open their arms to cooperate with different organizations to work together for the goals of corporate sustainability and "Healthy Taiwan."



3. Integrating Ceramic Creation and Community Health Education for the Elderly

The volunteer team and the volunteer promotion center arranged a cultural tour, medical health education lectures and pottery handicrafts, so that the grandparents who participated in the event not only listened with great interest but also interacted happily with the corporate volunteers. What is special is that the pottery creation combines the image of the rice field with personal creative style.

TTY hopes to narrow the gap between generations through innovative activities and show the company's commitment and dedication to local development. Meanwhile, we also hope to promote the public's attention to the health issues of the elderly and work together to create a warm and friendly super-aged society.



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4. Enjoy Rice Harvesting · Healthy and Energetic GO

Listening to the needs of the other parties and proposing service solutions has always been the core idea of TTY's" ESG action. Therefore, the volunteers introduced the grandparents to farming and participated the rice harvesting. This activity not only allowed the elderly to go outdoors and step into the fields, encouraging them to continue to exercise to maintain their health, but also created an unforgettable parent-child interaction time for corporate volunteers and their families. TTY hopes to remind employees and social partners of different dimensions to pay more attention to "healthy" life. At the same time, it also hopes to share beauty through actions and continue more positive forces for a sustainable society.



5. Donating Public Welfare Pollution-free Rice to Carry Health and Share Love

Charitable deeds are not impacted by their small scale or few people participating, as long as we put our strength together, we can always move forward! TTY has invested in the "TTY Rice Project". Although it is based on the intention of supporting a sustainable environment, it has expanded its positive influence through connections with employees and public welfare organizations. It can not only deliver goods to families in need but also deepen the DNA of the company's ESG culture in the process of service.

In addition to donating to social welfare institutions, TTY also further collaborates with the public sector to contribute to the public welfare to fulfill its local corporate social responsibility. Besides in Taoyuan but also in response to the call for love from Taiwan Power Company in Keelung District, providing public welfare pollution-free rice and encouraging the public to donate blood and contribute love.



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Promote the Access of Medicine for the Unmet Needs of the Community

Material Topic : Access to Medicine

Corresponding GRI Index	Self-established Topic
SDGs Principle	
Impact Assessment	<p>Related Stakeholder Engagement: Government, Local Communities, NPOs/NGOs, and Media</p> <p>(+) Positive impact: Understand stakeholder relations' expectations for pharmaceutical policy, industry, community medical care, and product demand, thereby improving the quality of interaction between stakeholders and TTY and the overall sustainable image.</p> <p>(-) Negative impact: Reducing the channels for interaction and understanding with stakeholders not only affects the accumulation of positive and sustainable images but also fails to provide corresponding public health services such as pharmaceuticals to stakeholders.</p>
Policies and Commitments	<p>We are dedicated to unmet medical needs, and our solutions target patients and doctors around the world. The pricing method for medication adheres to regulations; and our products, licensed-in or self-developed, best meet local needs. Extensive collaboration with NPOs and social groups facilitates public benefit and awareness of human being's health.</p>
Goals and Targets	<p>Short-term Goals:</p> <ul style="list-style-type: none">• Introducing medication with active ingredients with a shorter authorization process to benefit more people sooner.• Improve knowledge of illnesses through health education.• Introduce vaccines for greater protection against infectious diseases.• Reduce the number of deaths from non-infectious illnesses. <p>Mid- to Long-term Goals</p> <ul style="list-style-type: none">• Collaborate with supply chain partners to provide safer, more effective, and reasonable products.• Promoting access to medicine.• All-encompassing product combination for access to treatment options.

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Material Topic : Access to Medicine

Responsibilities
and Resources

Our experts assist as a team with license applications and follow up on each step of the process to ensure all is ready before a new drug and its authorization are introduced to the market.
Before licensed-in or authorized drugs, we review the top 10 advanced countries' prices and medical technology reports to simulate the financial impact when bringing the new drug under NHI coverage, locating a reasonable and affordable NHI price.
Continuously on brand activities and management optimal localization throughout each of the targeted market.

Annual Action Results

- Currently has 140 valid drug licenses.
- More than 36 drugs are included in Taiwan's National Health Insurance drug coverage program.
- Domestical self-produce second-line antibiotics, Bobimixyn, received drug license approval and listed in NHI price.
- Cooperate with The Infectious Diseases Society of Taiwan on the "375 Health Education Project" and jointly advocate to increase the influenza vaccination rate of the elderly population to reach 75% of the WHO target.
- Cooperate with Department of Public Health, Taoyuan, Health Bureau of Taichung City Government and Department of Health, Kaohsiung City Government to donate 1,500 adjuvanted vaccines for volunteers and elders of local communities.

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Donating Adjuvanted Influenza Vaccines to Response The "375 Health Education Project "



While Taiwan is entered into a super-aged society, increasing influenza vaccination rate for elderly, lowering infectious risks has been the core mission for TTY to conducts corporate social responsibilities. By cooperate with The Infectious Diseases Society of Taiwan on the "375 Health Education Project", we hope through the 3-year health education initiatives to remind the importance of the immune aging issue of the elders, and encouraged to receive flu vaccines, jointly advocate to increase the influenza vaccination rate of the elderly of over 65-years old population to reach 75% of the WHO target.

Elderly people are at a higher risk of developing severe flu complications, so they are the target of public flu vaccines in various countries. However, 1 in every 2 people in Taiwan does not get vaccinated. Even with additional incentives, the vaccination rate is still low. Obviously, public education needs to be strengthened, and vaccination needs to be urged through family members, neighbors, and community groups. It was happy to see the TTY and The Infectious Diseases Society of Taiwan work together to strengthen influenza health education and welcomes people to join and build a healthy Taiwan together.



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With You Until the End: TTY and Hospice Care



The spiritual support of patients and their caregivers plays a key role in health care. Although Taiwan has been promoting hospice care for many years, there are still many misunderstandings among the public about it. To help promote hospice care in Taiwan and give full play to its advantages, TTY has taken the initiative to launch hospice care services and has cooperated with the China Medical University Hospital to plan the daytime hospice care program, to provide hospice care and palliative medical services for the patients after returning home, and the hospice specialist and nurse will visit the patients at home and implement the palliative care, helping solve the problems related to family care and reduce the caregiver's stress.

Over the past 4 years since 2021-2024, we have served a total of 1,027 patients and covered the costs that would normally be the responsibility of the families receiving hospice services. Our goal is to provide comprehensive services to patients and their families, including symptom relief, emotional support, and financial assistance. We aim to ensure that patients and their families can approach the end of life with peace of mind and a sense of calm, allowing us to further demonstrate the positive impact that our organization can have on the world.



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Promoting Medical Education

Industry-university Cooperation: Committed to Training Domestic Medical Talents

In response to industrial development and the transformation of human resource structure, TTY has long-term committed to cultivate the biotechnology and pharmaceutical professionals, and has established a complete internship and employment system. Since 2023, TTY has officially introduced a systematic "Strength Plan" through a three-stage training framework - Summer Internship (SIP) → TTY Campus Brand Ambassador (TBA) → Freshman Program, to discover and support young talents with high potential and ambitions in the biotechnology industry, and further shape the cornerstone of the sustainable development talents.

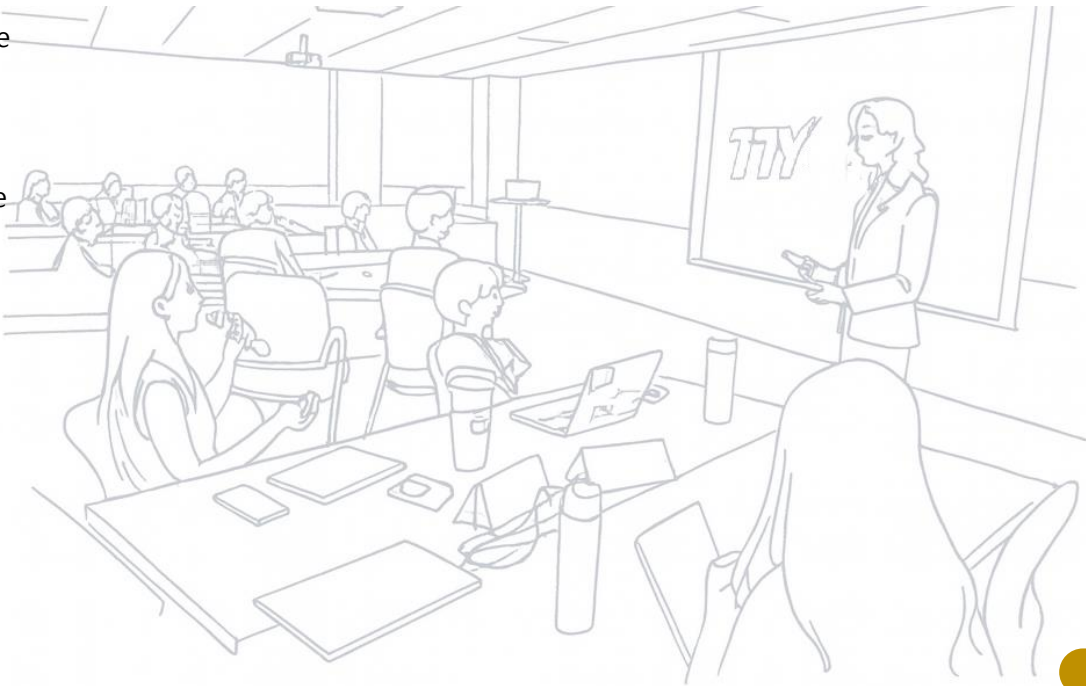
In this three-stage training framework, the Summer Internship (SIP) program is the core starting point, which aims to identify students with professional foundation and learning potential as the starting point for the company's future talent reserve. The 2024 TTY Campus Brand Ambassador (TBA) program is the second stage of the SIP program. The two programs have a high degree of continuity and strategic integration.

Since its launch in 2008, SIP has been held for 17 consecutive years. To date, the program has trained 417 students, providing new professionals with practical experience for the biotechnology and pharmaceutical industries.



2024 SIP implementation process:

- Recruitment targets and school background
- Course design and training content
 1. Training courses with complete value chain
 2. Senior manager career Interview
 3. Unique mentor system
- Employment-leading results: Advanced talent selection and transformation



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Sustainable Development and Forward-looking Outlook

The "Strength Project" aims to cultivate high-potential biotech professionals, echo to the United Nations Sustainable Development Goals (SDGs) No. 4: Quality Education and No. 8: Decent Work and Economic Growth. In the future, TTY will continue to improve in the following directions:

- Strengthen on the integration and transformation of SIP and TBA, and conducts post-practice assessment.
- Expand international academic exchanges and overseas internship opportunities to promote cross-cultural career experiences.
- Establish the SIP community to create a platform for grow together.
- Continue to optimize digital content marketing strategies to deepen youth engagement through short videos, career documentaries and interactive platforms.

Through continuous and systematic training paths, TTY will continue to promote the sustainable development of talent in the domestic pharmaceutical industry.

▼ Overview of TTY's SIP in the Recent 5 Years

Year	Participant	Internship Unit	Internship Content	Results
2020	26			<ul style="list-style-type: none">• 1 served as the 1st session campus ambassador
2021	24	Sales Marketing	Course learning Unit Internship	<ul style="list-style-type: none">• 3 served as the 2nd session campus ambassadors• 1 served as a short-term intern after the SIP
2022	28	R&D Manufacturing Clinical	Team Entrepreneurship Competition	<ul style="list-style-type: none">• 3 served as the 3rd session campus ambassadors• 1 SIP learner of the year 2022 working in TTY• 1 SIP learner of the year 2017 working in TTY
2023	26	Regulatory Affairs Intellectual Property	Demonstration of learning result	<ul style="list-style-type: none">• 3 served as the 4th session campus ambassadors• 1 SIP learner of the year 2017 + (winter vacation work-study) on duty
2024	18			<ul style="list-style-type: none">• 3 served as the 5th session campus ambassadors• 1 SIP learner of the year 2022 working in TTY

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TTY Campus Ambassador

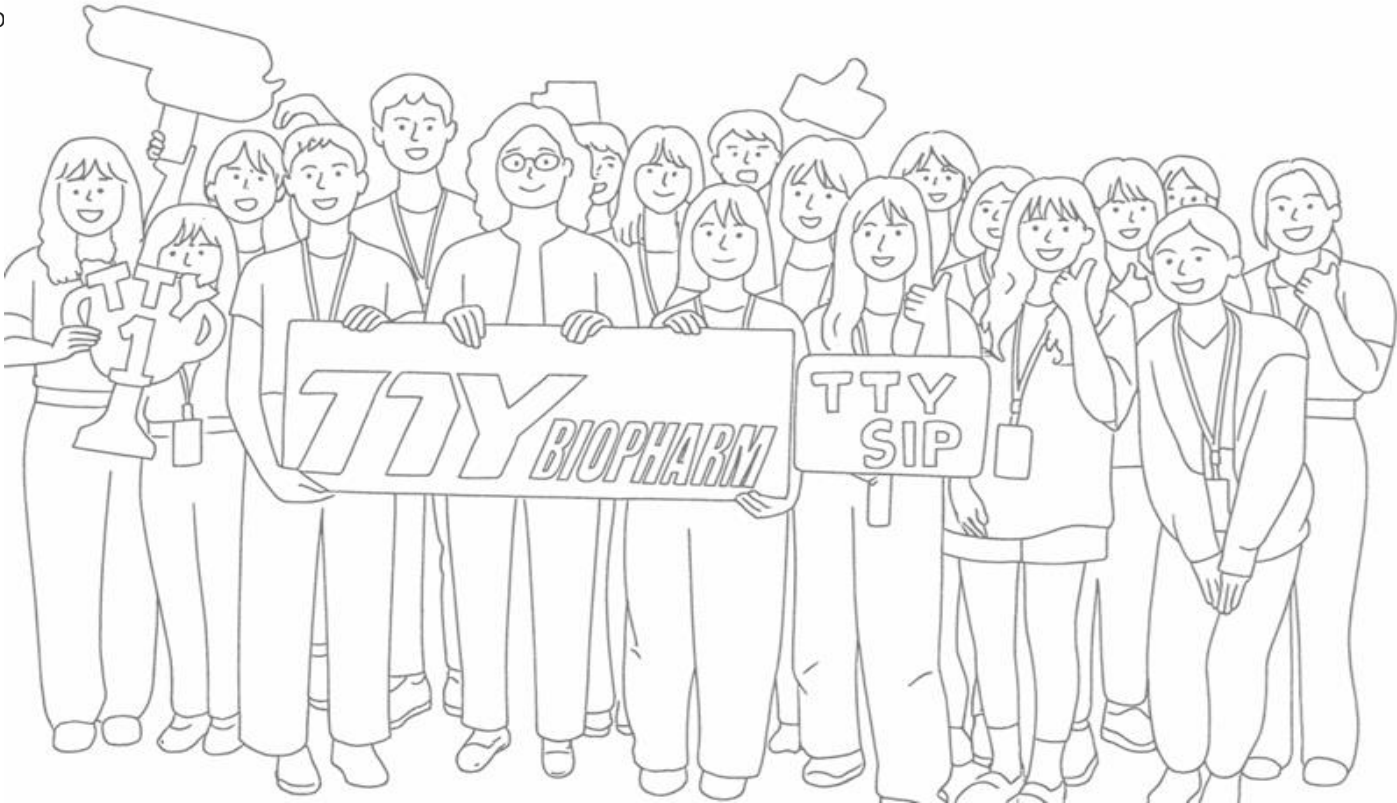


With the increase in online communities and digital media, TTY responses the communication and learning patterns with new generation actively. The TTY Brand Ambassador, TBA program has been initiative since year 2021, and TTY held the 4th Campus Ambassador program in the year 2024.

TBA program is the 2nd stage of "strength program", which aims to select the potential interns as corporate brand promoter and future workplace practitioners. Through campus project program, digital content production and social marketing practices, TBA can further deepen the recognition of corporate culture and values, and transform the initial career experience into influence power, becoming a bridge for communication between the Company and the younger generation.

2024 achievement highlights:

- Campus brand ambassador selection
- Digital content marketing and effectiveness
- Social media growth and increase brand adhesio



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Connection Between Talent Cultivation and Sustainable Development

"TTY Campus Brand Ambassador Program" is not just a brand marketing event but a systematic talent cultivate strategy. This plan implements the corporate' s commitment of sustainable talent development, and aligns to SDGs' No. 4: Quality Education and No. 8: Decent Work and Economic Growth. It has impact through the following three aspects:

- 1. Practice-oriented learning: The students get used to the scenario of workplace situations and cross-departmental collaboration, and strengthen their skills in problem solving, project management, and communication.
- 2. Establishment of brand talent pool: Through observation and cooperation to discover young talents with long-term potential, and further recruitment to enter the 3rd stage - Freshman Program.
- 3. Cross-domain connections and international perspectives: Including students from overseas countries make TTY' s talent network with more global perspective.

Future Outlook and Improvement Directions

Looking ahead to 2025, TTY will continue to deepen the scale and depth of TBA plan and expects :

- Establish a TBA network platform to form long-term relationships and resource cycles.
- Establish industry-university cooperation with more schools (including overseas) to expand and reach the talent sources.

Investing in youth potential and training systems, TTY hopes to create a talent ecosystem with future competitiveness and sustainable development, and become a benchmark company for promoting youth participation and social responsibility.

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Cancer Prevention Education



TTY, a major cancer pharmaceuticals manufacturer in Taiwan, has been actively involved in cancer prevention education for several years. Their objective is to help people in Taiwan gain better knowledge about cancer and related illnesses. TTY conducts cancer education programs in 2 key areas, namely "Regional care for the cancer-affected" and "Health education". These sessions benefit people across Taiwan, including the general public, cancer patients, and their families. By attending these sessions, they can learn more about cancer, overcome their fear, and demonstrate more empathy and understanding towards cancer patients.

Regional Care for the Cancer-affected

Since 2005, TTY's TOT has cooperated with cancer-related non-profit organizations to hold a series of cancer prevention health education and publicity activities in rural areas, and has invited medical staff from major medical centers as lecturers to promote cancer prevention and publicity on campus and contribute to cancer prevention initiatives. Cancer awareness continues in towns and villages. In year 2024, we worked with 20 junior high schools in Yunlin-Chiayi-Tainan, Miaoli, Hualien-Taitung, and off-shore islands, and empowered young students with preventive thinking, so that family members can learn more about cancer, and how to lead as healthy life as possible.

Health Education

TTY organizes lectures on disease treatment trends and nutrition education campaigns for cancer patients and their families in collaboration with non-profit organizations that work toward cancer awareness. These lectures help patients to alleviate the discomfort caused by cancer treatment and disease, and also educate their families with the correct knowledge so that they can support the patients in fighting against cancer. In 2024, 2 physical lectures were held, with a total of 82 participants. Since 2009, a total of 6,953 cancer patients and their families have participated in the lectures. Additionally, TTY also held health education lectures on osteoporosis and bone health. These lectures provided public testing to prevent the causes of calcium and vitamin D deficiency. In 2024, 15 sessions were held, with 24 physicians serving as the main speakers of health education activities (including those from hospital and community health education, patient associations, etc.). These physicians guided and advised attendees on how to achieve sufficient calcium intake from diet and daily life, with a total of 866 participants.



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的話

關於本
報告書

永續管理

關於台灣東洋
藥品

供應鏈
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附錄

TTY Sustainability Report Received the TCSA Gold Award

Since 2018, TTY has been at the forefront of responding to the trend of Sustainability Reports in Europe and the United States with its corporate social responsibility report. The report has been prepared with the three ESG main axes of environmental protection, social care, and corporate governance, and has been in line with international norms over the years. TTY has continuously adjusted and improved the report to ensure that stakeholders can further understand the organization's sustainable business strategy and establish good and effective communication channels.

TTY has participated in multiple times of the TCSA, and 2 consecutive years of 2020 and 2021 Sustainability Report of TTY won the highest honor, the platinum award, in the second category of healthcare enterprises; In 2022, due to the growth of the organization with an annual revenue of over NTD\$5 billion, we applied for the first time to participate in the first category of healthcare enterprises. Despite fierce competition, we still won the gold award in the report of the 16th and 17th TCSA in 2023 and 2024 respectively. We will continue to improve based on this experience and hope to achieve even complete and transparent ESG information disclosure.

The ESG values at TTY are not just a catchy phrase but a set of principles that guide our actions daily. We expect all TTY employees to adhere to these values and work towards achieving our vision of improving the quality of human life through scientific innovation. We believe that by being civilized and collaborative, we can make a meaningful difference in the world.

▼The 2023 TTY sustainability report received by the 17th TCSA Gold Award



- Statement of Independent Assurance Opinion
- Index Table of GRI Sustainability Report Standards
- SASB Chart
- UNGC Chart
- Climate-related Information of TWSE/ TPEx Listed Company

A close-up photograph of a hand with light-colored nail polish holding a stack of white papers. The papers are held together by several colorful binder clips in shades of teal, pink, and grey. The background is dark and out of focus, showing a person in a white shirt. A diagonal white line separates the list on the left from the image on the right.

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Statement of Independent Assurance Opinion

▼ TTY 2024 Sustainability Report Receives Independent Assurance
Statement from Afnor Asia

▼ The Greenhouse Gas Inventory Result for TTY 2024 Has
Been Verified by ISO 14064-1



獨立保證意見聲明書

台灣東洋藥品工業股份有限公司 2024 年永續報告書

「法國標準協會」於1926年
當任理事國代表，是全球知名
國際認證股份有限公司」執行，
ISO 9001、ISO 14001、ISO 140
全與社會責任等國際標準的訓
(以下簡稱法標)與台灣東洋藥
了本獨立保證聲明書所述內容
責任

台灣東洋負責按所宣告之
括海外據點)、環境與社會面向
法標負責按所描述的範圍
本聲明書僅供台灣東洋使用，
範圍與標準

台灣東洋與法標協議的保證
1. 保證作業範圍與「台灣東洋
2. 法標依據AA1000保證標準
AA1000當責性原則(2018)的
3. 保證作業包括審查與評估台
導準則運作的情况：
● GRI永續報導準則

方法

- 報告書採用依循 GRI 永續
主題揭露進行審查。
- 查證團隊與相關人員進行
而，並不直接接觸外部利害
與報告書編制相關的所有
● 基於抽樣計畫，審查組織
● 藉由訪談各組負責人員，
與證據來源合理。

結論

- AA1000當責性原則
包容性

台灣東洋已建立多元且廣



並廣泛納入各方意見，展現該組織在包容性的具體實踐。

重大性

台灣東洋已建立流程來收集、分析與鑑別與其永續發展相關的議題。該報告書中已展現所規劃與實施的重大性分析與決策結果，並藉以排序與回應各項重大主題。未來可持續改進決策流程，以合理與均衡地決策出重大主題來進行管理。

回應性

台灣東洋已在報告書中揭露經濟、治理、環境與社會的資訊，使利害關係人得以對該公司的治理與管理績效進行了解。未來可持續按各相關報導要求，配合組織運作情形與管理績效來予以回應。

衝擊性

台灣東洋已對其營運過程中對整體環境產生之衝擊，提供必要的資源進行監控與量測。在報告書中已揭露所辨識的各項衝擊與管理措施。未來可持續提供資源對相關資訊進行量測、收集與揭露，以展現其永續與改進衝擊的積極作為。

- ◆ GRI永續報導準則

基於審查的結果，確認報告書中一般揭露與特定主題揭露及重大主題管理揭露等，已遵循GRI永續報導準則之要求。未來可結合其他國際報導要求，持續彙整與揭露各營運據點運作績效，提供充分完整的資訊給利害關係人使用。

意見聲明

法標依據AA1000保證標準(v3)的查證指引及GRI永續報導準則，已發展完整的水權性報告保證準則。我們認為就台灣東洋所提供的足夠證據及現場查證的所見事實，秉持公允的原則，對該組織遵循的全球永續性報導準則的情況出具聲明。我們總結「台灣東洋藥品工業股份有限公司2024年永續報告書」內容，對於台灣東洋的相關運作與特定績效提供了一個公平的觀點。我們相信有關台灣東洋在2024年的經濟、社會及環境等特定績效指標是誠正確地呈現。

保證等級

依據AA1000保證標準(v3)，我們僅依據本聲明書中所描述的範圍與方法，審定本聲明書為中度保證等級。

以上，謹代表「法國標準協會」

Dr. August Tsai 認證與評鑑部門 理事
2025年06月26日

查證團隊：廖正豪(主導查證員)、鄭文義(查證員)、陳中本(查證員)

法標國際認證股份有限公司 臺灣分公司 臺灣總公司 地址：臺南市安平區永寧路102號20樓之2
電話：+886-6-220-0066 / 傳真：+886-6-220-7838
網址：https://international.afnor.com.tw/



AA1000
Licensed Report
000-84/V3-LNNK8



查驗意見書編號：25TAFGHGA11796-1/1

溫室氣體查驗意見書

2024 年溫室氣體排放資訊

台灣東洋藥品工業股份有限公司

台北市南港區園區街3-1號3樓

本公司依據 ISO 14064-3：2019 完成查驗，並符合下列標準要求

ISO 14064-1：2018

➢ 合理保證等級：

- 類別 1：直接溫室氣體排放量：1,910.2571 公噸二氧化碳當量
- 類別 2：輸入能源之間接溫室氣體排放量：8,116.4468 公噸二氧化碳當量

➢ 有限保證等級：

- 類別 3：運輸造成之間接溫室氣體排放量：397.7832 公噸二氧化碳當量
- 類別 4：組織使用產品造成之間接溫室氣體排放量：2,034.9648 公噸二氧化碳當量
- 類別 5：與使用產品造成之間接溫室氣體排放量：79.8872 公噸二氧化碳當量
- 類別 6：其他來源之間接溫室氣體排放量：N/A 公噸二氧化碳當量

➢ 總排放量：12,539.339 公噸二氧化碳當量

簽署人
執行長
蕭修真

蕭修真

審修真

簽署日期：2025 年 04 月 15 日



環球國際認證股份有限公司
UNIVERSAL CERTIFICATION SERVICE CO., LTD.



Validation and Verification
VIR180

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Index Table of the GRI Sustainability Report Standards

General Disclosure

GRI 1: Foundation 2021		
Use Statement: The content of the report period of 1/1/2024 to 31/12/2024 followed the GRI Standards.		
GRI No.	Disclosure Item	Chapter & Page
GRI 2 : 2021 General Disclosure		
GRI 2-1	Organizational details	P.005 About TTY Sustainability Report P.030 About TTY Biopharm
GRI 2-2	Entities included in the organization's sustainability reporting	P.005 About TTY Sustainability Report
GRI 2-3	Reporting period, frequency and contact	P.005 About TTY Sustainability Report
GRI 2-4	Restatements of information	P.111 Water Consumption Statistics P.133 Occupational Injury Statistics
GRI 2-5	External guarantee / Confirmation	P.005 About TTY Sustainability Report
GRI 2-6	Activities, value chain and other business relationships	P.045 Pharmaceutical Industry Value Chain
GRI 2-7	Employee	P.119 Diversity in the Workplace
GRI 2-8	Non-employees workers	P.119 Diversity in the Workplace
GRI 2-9	Governance structure and composition	P.070 Diversity and Professionalism of the Board of Directors
GRI 2-10	Nomination and selection of the highest governance unit	P.072 Nomination and Selection of Board Members
GRI 2-11	Chair of the highest governance unit	P.072 Nomination and Selection of Board Members
GRI 2-12	Role of the highest governance unit in overseeing the management of impacts	P.081 Functional Committees P.088 Risk Management

Letter from the CEO	GRI 2-130	Delegation of responsibility for managing impact	P.081 Functional Committees P.083 Promote Corporate Sustainability Development P.088 Risk Management
	GRI 2-14	Role of the highest governance unit in sustainability reporting	P.005 About TTY Sustainability Report
About TTY Sustainability Report	GRI 2-15	Conflicts of interest	P.073 Interest Avoidance
	GRI 2-16	Communication of material concerns	P.072 Board Meeting Resolution
Sustainable Management	GRI 2-17	Collective knowledge of the highest governance unit	P.074 Enhancing Directors' Knowledge
	GRI 2-18	Evaluation of the performance of the highest governance unit	P.073 Board Performance Evaluation
About TTY Biopharm	GRI 2-19	Remuneration policies	P.081 Functional Committees
	GRI 2-20	Process to determine remuneration	P.081 Functional Committees
	GRI 2-21	Annual total compensation ratio	P.124 Remuneration Structure
Supply Chain Management	GRI 2-22	Statement on the sustainable development strategy	P.003 Letter from the CEO P.011 Sustainable Development Strategies & Performance P.083 Promote Corporate Sustainability Development
	GRI 2-23	Policy commitments	P.083 Governance Principles P.121 Protecting Employee Rights
Governance	GRI 2-24	Embedding policy commitments	P.083 Promote Corporate Sustainability Development
	GRI 2-25	Processes to remediate negative impacts	P.087 Complaints and Suggestions Channel
Environmental	GRI 2-26	Mechanisms for seeking advice and raising concerns	P.087 Complaints and Suggestions Channel
	GRI 2-27	Regulatory compliance	P.086 Regulatory Compliance
Social	GRI 2-28	Membership to associations	P.035 External Engagement
	GRI 2-29	guidelines to stakeholder engagement	P.021 Stakeholder Engagement
Appendix	GRI 2-30	Group agreements	P.121 Harmonizing Labor-employer Relations

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Material Topic Disclosure

GRI No.	Disclosure Item	Chapter & Page
GRI 3 : 2021 Material Topic		
GRI 3-1	Procedure to determine material topics	P.019 Sustainability Topics of Concern Analyzed
GRI 3-3	Material topic list	P.026 Material Topics Identification
GRI No.	Disclosure Item	Chapter & Page
1. Economic Performance		
GRI 3-3	Material topic management	P.032 TTY Basic Introduction
GRI 201-1	Direct economic value generated and distributed by the organization	P.033 Operation Result
GRI 201-2	Financial implications and other risks and opportunities due to climate change	P.098 Climate-related Risks, Opportunities, and Financial Impacts
GRI 201-3	Defined benefit plan obligations and other retirement plans	P.123 Employee Benefits (Please refer to Annual Report)
2. Talent Attraction and Retention		
GRI 3-3	Material topic management	P.117 Workplace Happiness
GRI 202-1	Ratios of standard entry level wage by gender compared to local minimum wage	P.124 Remuneration Structure
GRI 401-1	New and departed employees	P.119 Diversity in the workplace
GRI 401-2	Benefits provided to full-time employees (excluding temporary or part-time employees)	P.123 Employee Benefits
GRI 401-3	Parental leave	P.122 Maternity Health Protection
3. Access to Medicine		
GRI 3-3	Material topic management	P.141 Promote the Access of Medicine for the Unmet Needs of the Community

Letter from the CEO	4. Sustainable Development Strategy		
	GRI 3-3	Material topic management	P.011 Sustainable Development Strategies & Performance
About TTY Sustainability Report	5. Counterfeit Drugs		
	GRI 3-3	Material topic management	P.057 Supply Chain Traceability
Sustainable Management	6. Ethical Management		
	GRI 3-3	Material topic management	P.084 Ethical Management
About TTY Biopharm	GRI 205-2	Communication and training on anti-corruption policies and procedures	P.085 Ethical Management Education and Training
	GRI 205-3	Confirmed incidents of corruption and actions taken	P.084 Ethical Management
Supply Chain Management	7. Drug Safety		
	GRI 3-3	Material topic management	P.053 Drug Safety
Governance	GRI 416-1	Assessing the health and safety of product and service categories	P.053 Drug Safety
	GRI 416-2	Violation of health and safety regulations related to products and services	P.053 Drug Safety
Environmental	8. Subject Safety		
	GRI 3-3	Material topic management	P.060 Subject Safety
Social	9. Reasonable Pricing		
	GRI 3-3	Material topic management	P.066 Reasonable Pricing

Letter from the CEO	10. Supplier Management		
About TTY Sustainability Report	GRI 3-3	Material topic management	P.047 Supplier Screening and Management
	GRI 308-1	New suppliers that were screened using environmental criteria	P.047 Supplier Screening and Management
	GRI 308-2	Negative environmental impacts in the supply chain and actions taken	P.047 Supplier Screening and Management (No related matters)
Sustainable Management	GRI 414-1	New suppliers that were screened using social criteria	P.047 Supplier Screening and Management
	GRI 414-2	Negative social impacts in the supply chain and actions taken	P.047 Supplier Screening and Management (No related matters)
About TTY Biopharm	11. Marketing Ethics		
	GRI 3-3	Material topic management	P.063 Marketing Regulations
	GRI 417-1	Requirements for information and labeling of product and service	P.063 Marketing Regulations
	GRI 417-2	Failure to comply with laws and regulations regarding information and labeling of products and services	P.063 Marketing Regulations (No related matters)
	GRI 417-3	Failure to comply with marketing communications regulations	P.063 Marketing Regulations (No related matters)
Supply Chain Management			
Governance	12. Occupational Safety and Health		
	GRI 3-3	Material topic management	P.128 Occupational Safety and Health
Environmental	GRI 403-1	Occupational health and safety management system	P.130 Occupational Safety and Health Management
	GRI 403-2	Hazard identification, risk assessment, and incident investigation	P.131 Hazard Risk Identification and Incident Investigation
	GRI 403-3	Occupational health services	P.135 Health Promotion
Social	GRI 403-4	Worker participation, consultation, and communication on occupational health and safety	P.135 Health Promotion
	GRI 403-5	Worker training on occupational health and safety	P.131 Contractor Occupational Safety Management
Appendix	GRI 403-6	Promotion of worker health	P.135 Health Promotion

Letter from the CEO	12. Occupational Safety and Health		
About TTY Sustainability Report	GRI 403-7	Prevention and mitigation of occupational health and safety impacts directly linked by business relationships	P.131 Contractor Occupational Safety Management P.132 Personal Protective Equipment
	GRI 403-8	Occupational health and safety management system	P.130 Occupational Safety and Health Management
	GRI 403-9	Work-related injurie	P.133 Occupational Injury Statistics
	GRI 403-10	Work-related ill health	P.135 Health Examinations
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Sustainability Accounting Standards Board

SASB Biotechnology and Pharmaceutical Industry Disclosure Guidelines				
No.	Accounting Standards	Category	Disclosure Item	Relevant Chapters
Topic: Safety of participants in clinical trials				
HC-BP-210a.1	To study the management process to ensure the quality of care and patient safety according to different regions of the world	Discussion and Analysis	TTY adopts the highest standards of management for ensuring medical quality and patient safety, and each business unit conducts clinical trials in accordance with domestic regulations such as the Good Clinical Trial Practice Guidelines for Pharmaceuticals. In human research and clinical trials of cancer drugs, in addition to complying with relevant domestic and foreign laws and regulations (such as ICH E6, human research law, etc.), they must be approved by the ethics committee of the testing institution and the local health authority, and implemented in accordance with the standard operating procedures of the medical academic division.	Chapter 3 Supply Chain Management > Subject Safety
HC-BP-210a.2	For clinical trial management and drug active surveillance- related FDA audit items and quantities, the following approaches can be taken: (1) Voluntary Active Initiative (VAI) (2) Official Active Initiative (OAI)	Quantitative	In 2024, 0 clinical trial sponsored by TTY was audited by the competent authority, the TFDA GCP; there is 0 case of drug safety monitoring and verification.	-
HC-BP-210a.3	Total financial losses from legal proceedings related to clinical trials of drugs in developing countries	Quantitative	NTD 0; there was no relevant loss to report in TTY in year 2024.	-
Topic: Access to medicine				
HC-BP-240a.1	The measures and initiatives to promote the use of healthcare products for diseases requiring priority prevention and treatment and countries with relatively underdeveloped medical and health conditions (as defined in the drug licensing index) is described in detail	Discussion and Analysis	TTY introduced trivalent and tetravalent influenza vaccines, also tetravalent adjuvant influenza vaccines and chickenpox vaccines and obtained relevant certificates issued by the competent authority. ※ Note: The drug license was obtained on 6/4/2017 and 20/3/2020 and 7/2/2023 and 8/8/2024.	Chapter 6 Promote the Access of Medicine for the Unmet Needs of the Community
HC-BP-240a.2	As a product on the PQP list of pre-qualified medicines	Discussion and Analysis	Taiwan is not a member of the World Health Organization (WHO), and TTY does not hold products related to the WHO PQP.	-

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Topic: Reasonable pricing for the masses				
HC-BP-240b.2	Percentage change in (1) sum of average pricing and (2) sum of average net price of the drug portfolio compared to the same period last year	Quantitative	Average pricing change ratio: -2.97%~0% Average net price change ratio: -4.09%~2.2% Please refer to the corresponding chapter for detailed explanations of drug combinations and price changes.	Chapter 3 Supply Chain Management > Reasonable Pricing
HC-BP-240b.3	Percentage changes in (1) list price and (2) net price for products with the largest increases compared to the same period last year	Quantitative	Product list price with the largest increase ratio: 69% Product net price with the largest increase ratio: 17.7%	Chapter 3 Supply Chain Management > Reasonable Pricing
Topic: Drug safety				
HC-BP-250a.1	List of products listed in the U.S. Food and Drug Administration's (FDA) MedWatch Notification System's Human Medical Product Safety Alert Database	Discussion and Analysis	There are no relevant circumstances with the scope required by the FDA. Adverse drug reactions of TTY are reported by the drug safety window of each BU. In 2024, cases reported to the adverse drug reaction notification system of the Taiwan Food and Drug Administration (TFDA) included Asadin, Leavdo, Lipo-Dox, Minjuvi, Oxalip, Pemazyre, Pexeda, Thado, TS-1 and Yondelis of the Oncology BU; Brosym, Colimycin, Cubicin, Fludad Tetra and Flucelvax Quad of the Intensive Care BU; and Flucelvax Quad of the Key Account Management Division. ※ Note: All the cases reported above do not involve any change in product safety information, and were reported in accordance with TFDA regulations.	Chapter 3 Supply Chain Management > Drug Safety
HC-BP-250a.2	Number of deaths related to products in the FDA adverse drug reaction notification system	Quantitative	None. ※ Note: There are no relevant circumstances for the parts required by the FDA. In the TFDA adverse drug reaction reporting system, the number of deaths related to our products in the Oncology BU, the Intensive Care BU and the Key Account Management Division are zero.	-
HC-BP-250a.3	(1) The number of frequency and (2) the total number of units recalled issued in accordance with FDA regulations	Quantitative	0 time, 0 unit. ※ Note: There are no relevant matters regarding the requirements of the FDA and TFDA.	-
HC-BP-250a.4	The total amount of products accepted for recycling, reuse, or disposal	Quantitative	The total number of products recovered due to expiration in 2024 is 271 vials and 1,108 capsules. The recovery of defective products is 254 vials and 1,610 tablets. The recycling and treatment methods are all for disposal; there is no possibility of reuse. ※ Note: Due to different recycling specifications, it is difficult to calculate weight, and registration is based on quantity statistics.	-
HC-BP-250a.5	The number of cases by type to which FDA-enforced measures apply for violations of current Good Manufacturing Practices (cGMP)	Quantitative	None. ※ Note: There are no relevant matters regarding the requirements of the FDA and TFDA.	-

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Topic: Counterfeit drugs				
HC-BP-260a.1	Detail of the methods and techniques to maintain product traceability and prevent counterfeiting throughout the supply chain	Discussion and Analysis	<p>TTY purchases raw materials from qualified suppliers on the list of raw material suppliers and has transportation and sales records so customers in the drug supply chain can be consulted and traced.</p> <p>To maintain product traceability and prevent counterfeiting, the logistics providers of the Company are all qualified manufacturers with GDP, which are regularly evaluated by TTY and implemented in accordance with the contents of the quality contract signed by both parties to ensure that after the drugs leave the factory, product quality and packaging integrity is maintained during storage and transportation, and drugs are correctly delivered to customers within a reasonable time to prevent counterfeit drugs from entering the drug supply chain.</p> <p>In addition, to strengthen internal control management of logistics companies, the vehicles of logistics companies are also equipped with GPS, and logistics companies follow the instructions of the company to deliver the drugs to designated medical institutions. The medical institutions report to the Company if they do not receive the stock.</p>	Chapter 3 Supply Chain Management > Supply Chain Traceability
HC-BP-260a.2	Explore procedures to remind customers and business partners of potential or known risks associated with counterfeit generic drugs	Discussion and Analysis	There is no counterfeit drug related information on the market for TTY's drugs. TTY also avoids direct contact between manufacturers and customers, and follows the contract terms and regulations of medical institutions, prohibiting the provision of counterfeit and inferior drugs.	-
HC-BP-260a.3	The number of searches, seizures, arrests, or criminal proceedings related to counterfeit drugs	Quantitative	None, no related matters.	-
Topic: Marketing ethics				
HC-BP-270a.1	Total financial loss due to legal proceedings related to forged sales statements	Quantitative	None, no related matters.	-
HC-BP-270a.2	Ethical guidelines for off-label use of pharmaceutical products	Discussion and Analysis	The products sold by each BU of TTY follow the indications approved by the Taiwan Food and Drug Administration, and use advertising content approved by the health authorities for public communication. When so requested, TTY provides further clinical literature for doctors to decide whether to use the product.	Chapter 3 Supply Chain Management > Responsibility of Sales

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Topic: Employee recruitment, development and retention				
HC-BP-330a.1	Explore the recruitment and retention of scientists and R&D personnel	Discussion and Analysis	<p>In talent recruitment through the SIP program or industry university cooperation R&D projects, TTY enables students in chemistry-related departments to further understand and experience specialties and the future development of pharmaceutical R&D to attract talent. In addition, TTY contacts and interacts with R&D personnel of overseas pharmaceutical companies through LinkedIn and other related platforms, and provides job vacancy information to motivate exceptional talent to return to Taiwan to work in the industry.</p> <p>TTY provides a friendly and flexible working environment to meet the needs of R&D projects so R&D personnel can focus on their work and help retain talent. In addition, TTY gives colleagues with integration and leadership abilities the opportunity to serve as project leaders in R&D projects so they can engage in continuous professional development.</p>	<p>Chapter 6 Social > Diversity in the Workplace</p> <p>Industry-university Cooperation: Committed to Training Domestic Medical Talents</p>
HC-BP-330a.2	(1) Voluntary departure rate (2) involuntary departure rate: (a) senior managers, (b) middle-level managers, (c) professionals (d) others	Quantitative	<p>By the end of year 2024, the total number of employees was 523; 98 employees resigned accounting for 18.74% of all employees. Senior managers: 8 voluntary resignation (1.5%); 0 involuntary resignation (0.0%) Middle-level managers: 14 voluntary resignation (2.7%); 2 involuntary resignation (0.4%) Professionals: 66 voluntary resignation (12.6%); 8 involuntary resignation (1.5%)</p> <p>Note: Resignation = Resigned number by category/ total number of regular employees</p>	<p>Chapter 6 Social > Diversity in the Workplace</p>
Topic: Supplier management				
HC-BP-430a.1	Confirm the (1) physical facilities and (2) percentage of primary supplier facilities for those participating in the Rx-360 international pharmaceutical supply chain alliance review plan or equivalent third-party review plan to ensure supply chain quality and drug ingredient integrity	Quantitative	<p>TTY does not participate in the Rx-360 but will conduct a written or on-site supplier review plan every year or every 3 years according to the in-plant SOP. The factory has established an appropriate continuous monitoring and assessment system for qualified raw material suppliers to ensure the integrity of supply chain quality and pharmaceutical ingredients.</p>	<p>Chapter 3 Supply Chain Management > Supplier Screening and Management</p>

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Topic: Business ethics				
HC-BP-510a.1	Total financial losses caused by legal proceedings related to corruption and bribery	Quantitative	In 2023, a drug price difference case occurred due to the former CEO's personal behavior. TTY is cooperating with the open investigation. By the end of year 2024, no financial losses have occurred yet.	Chapter 4 Governance > Regulatory Compliance
HC-BP-510a.2	Detail ethics when interacting with healthcare professionals	Discussion and Analysis	TTY has established Principles of Procedures for Ethical Management, Procedures for Ethical Management and Guidelines for Conduct, and Major Internal Information Processing and Prevention of Insider Trading Management Procedures, and regularly holds anti-corruption training to strengthen the ethical principles of interactions between colleagues and professionals. A reporting mailbox has also been set up, and any incidents of violating honest and trustworthy business operations are handled properly according to the reporting process.	Chapter 4 Governance > Ethical Management
Topic: Activity indicators				
HC-BP-000.A	The number of patients treated	Quantitative	The Oncology BU provides drugs for about 500,000 patients. About 300,000 patients are in the Intensive Care BU's GNB empirical treatment market, about 50,000 patients in the MRSA and VRE (BSI, IE, BJI) treatment market, about 100,000 patients in the MDR-GNB treatment market, and about 100,000 patients in the high-risk anesthesia population, and about 500,000 patients receive influenza vaccine products. About 63,000 patients use stomach medicine products, about 32,000 patients take calcium tablets, and about 2,500 patients take gout drugs in the Key Account Management Division.	-
HC-BP-000.B	(1) The number of drugs in the product portfolio (2) the number of drugs in research and development (stages 1-3)	Quantitative	<p>The Oncology BU currently has 28 drugs in its product portfolio, including 19 solid tumors and 9 blood tumor products. We have 2 products under process for a permit.</p> <p>There are 12 kinds of drugs in the product portfolio of the Intensive Care BU, including 7 antibiotic products, 2 antimycotic products, 2 influenza vaccines, and 1 anesthesia product.</p> <p>The Key Account Management Division has a total of 5 products, including: 2 gastrointestinal health products, 2 osteoporosis prevention products, and 1 medication to alleviate the symptoms of gout.</p> <p>The quantity of drugs in R&D is confidential information within the company and will not be disclosed in the report.</p>	-

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UNGC Chart

Principles		TTY Practice	Relevant Chapter
Human Right	Principle 1: Enterprises should support and respect internationally recognized human rights	TTY adheres to internationally recognized human rights standards, such as the International Labor Organization's Declaration of Fundamental Principles and Rights at Work, the Universal Declaration of Human Rights, the 10 Principles of the United Nations Global Compact, and the United Nations Guiding Principles on Business and Human Rights, and also complies with local government labor laws and regulations to establish corporate human rights policies to protect the rights of employees.	Protecting Employment Rights
	Principle 2: Enterprises should ensure that they are not involved in human rights violations	The company has not received any employee appeal cases. We will continue to strengthen the communication and management abilities of our supervisors to avoid such situations from occurring.	Protecting Employment Rights
Labor	Principle 3: Enterprises should support the freedom of labor association and recognize the right to collective bargaining	The representatives of the TTY labor and employer conference are composed of senior executives and colleagues from various departments. Meetings are held every 3 months to discuss issues such as the revision of labor conditions.	Harmonizing Labor-employer Relations
	Principle 4: Elimination of all forms of compulsory labor	TTY prohibits all forced labor practices, and there are no cases of forced labor at the Company.	Protecting Employment Rights
	Principle 5: The definitive abolition of child labor	TTY prohibits child labor that does not meet the legal minimum age and does not use child labor within the Company.	Protecting Employment Rights
	Principle 6: Elimination of discrimination in employment and occupation	TTY actively strives for workplace diversity. In the recent 5 years, the proportion of female employees has remained stable at more than 50%, and 58.06% of women hold key leadership positions above manager level, ensuring that employees are not discriminated against or treated unfairly due to gender, race, age, marital status, religion, political position, etc.	Diversity in the Workplace
Environment	Principle 7: Enterprises should support the adoption of preventive measures to cope with environmental challenges	To mitigate the impact of climate change and cope with increasingly stringent temperature management regulations, TTY currently participates in the TCFD specification, preliminarily completing the identification of climate change related risks and opportunities, is planning specific response strategies according to the risk identification results, and strengthening information disclosure of climate-related risks and opportunities. To improve disaster response capabilities, TTY has actively developed new suppliers to ensure a second or even third source of raw materials, and has implemented a supplier sustainability management mechanism.	Responses to Climate Change

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Principles		TTY Practice	Relevant Chapter
Environment	Principle 8: Take initiative to promote and strengthen corporate environmental responsibility	TTY is committed to improving the utilization efficiency of water resources, creating a water resources circulation system, recycling water resources of the cooling tower, improving the cooling process, and increasing the heat recovery rate to reduce demand for water resources and subsequent impact on the environment.	Water Management
	Principle 9: Encourage the development and promotion of environmentally friendly technologies	TTY adopts source classification and multi-sections effective treatment technology in the 2 manufacturing sites of Lioudu and Chungli factories to reduce air pollution caused by operating processes. The pollutant content discharged by the Company into the atmosphere is far lower than local regulation requirements.	Air Pollution Control
Anti-corruption	Principle 10: Enterprises should strive against all forms of corruption, including extortion and bribery	<p>To establish a corporate culture of ethical management, TTY applies the “Principles of Procedures for Ethical Management” and “Procedures for Ethical Management and Guidelines for Conduct” , specifically regulates matters that employees should pay attention to when performing their roles, and clearly prescribes preventive measures to various dishonest behavior. It is strictly prohibited for directors, managers, and employees to engage in any bribery or illegal behavior, and TTY is committed to minimizing the risk of violating honest practices.</p> <p>The Legal & Compliance Division under the SDC publicizes the ethical management policy through internal announcements, regularly provides relevant education and training for all colleagues, and at least once a year publicizes relevant laws and regulations on preventing insider trading for directors, managers, and employees.</p> <p>To eliminate insider trading, the Internal Material Information Process Procedure was reviewed and renamed on 24/12/2021 by the board to the Internal Material Information Process and Insider Trading Management Procedure to strictly and explicitly regulate insider trading. In 2024, a total of 1 online course on corporate ethical management was held to educate colleagues on the interests and types of dishonest behavior, emphasizing the reporting system and reward and punishment regulations. In addition, 1 physical course on preventing insider trading was held to share major event cases that may be considered insider trading.</p>	Ethical Management

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Climate-related Information of TWSE/ TPEx Listed Company

Disclosure of contents in accordance with Schedule 2 of the “Operational Rules for the Preparation and Submission of Sustainability Reports by Listed Companies” .

No.	Items	Chapter or Implementation
1	Describe the Board of Directors' and management's oversight and governance of climate-related risks and opportunities.	Chapter 5 > Responses to Climate Change > The Four Pillars of the TCFD Framework
2	Describe how the identified climate risks and opportunities affect the business, strategy, and finances of the business (short, medium, and long term).	Chapter 5 > Responses to Climate Change > Climate-related Risks, Opportunities, and Financial Impacts
3	Describe the financial impact of extreme weather events and transformative actions.	Chapter 5 > Responses to Climate Change > Climate-related Risks, Opportunities, and Financial Impacts
4	Describe how climate risk identification, assessment, and management processes are integrated into the overall risk management system.	Chapter 4 > Risk management > Identification and Management of Significant Risks Chapter 5 > Responses to Climate Change > The Four Pillars of the TCFD Framework
5	If scenario analysis is used to assess resilience to climate change risks, the scenarios, parameters, assumptions, analysis factors and major financial impacts used should be described.	Chapter 5 > Responses to Climate Change > Climate Scenario Analysis
6	If there is a transition plan for managing climate-related risks, describe the content of the plan, and the metric and target used to identify and manage physical risks and transformation risks.	Chapter 5 > Responses to Climate Change > The Four Pillars of the TCFD Framework
7	If internal carbon pricing is used as a planning tool, the basis for setting the price should be stated.	Internal carbon pricing is not currently used in planning.
8	If climate-related targets have been set, the activities covered, the scope of greenhouse gas emissions, the planning schedule, and the progress achieved each year should be specified. If carbon credits or renewable energy certificates (RECs) are used to achieve relevant targets, the source and quantity of carbon credits or RECs to be offset should be specified.	Chapter 5 > Responses to Climate Change > The Four Pillars of the TCFD Framework Chapter 5 > Energy management There is currently no use of carbon credits or renewable energy certificates (RECs) to achieve relevant goals.
9	Greenhouse gas inventory and assurance status, and reduction targets, strategies and action plans.	The scope of greenhouse gas inventory includes the first, second and third categories of greenhouse gases in the Lioudu, Chungli factories, Neihu PDC and headquarters. The inventory situation for year 2024 is detailed in Chapter 5 Energy Management > GHG Emission Statistics. The reduction targets, strategies and action plans of TTY is detailed in Chapter 5 Energy Management.



2024

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