PharmaEngine
智 擎 生 技 製 藥

2017 Corporate Social Responsibility Report

Notice to readers

This English-version report is a summary translation of the Chinese version. If there is any discrepancy between the English and Chinese versions, the Chinese version shall prevail.

The website address where the Company disclosed its corporate social responsibility report: http://www.pharmaengine.com

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✧ Preface

PharmaEngine, Inc. was established in 2002, and its policy of corporate social responsibility is to "accelerate the listing of new drugs to prolong the lives of patients and make society better."

While engaging in corporate operations, the Company also actively practices corporate social responsibility to meet the international trend of balancing environmental, social and corporate governance development. In the meantime, through corporate citizenship, it enhances national economic contributions, improves the quality of life of employees, communities and society, and also promotes the competitive advantage based on corporate responsibility. The Company's practice of corporate social responsibility includes the implementation of corporate governance, development of a sustainable environment, safeguarding public welfare, and strengthening the disclosure of corporate social responsibility information.

The Company considers that the firm's operations may have an impact on ecological benefits, and engages in operational activities such as research and development and services in accordance with the principle of environmental protection to reduce the impact of the Company's operations on the natural environment, such as reducing consumption of resources on products and services, and energy, reducing emissions of pollutants and waste, proper disposal of waste, increasing recyclability and reuse of resources, maximizing sustainable use of renewable resources, and increasing the effectiveness of products and services.

In June 2016, the new cancer drug ONIVYDE® developed by the Company was officially launched on Taiwan market. This was the first one in the history of Taiwan's new cancer drug development to be approved by Taiwan TFDA and the US FDA. The drug allows patients with pancreatic cancer in Taiwan to receive the latest medical treatment at the fastest speed, and lets the biotechnology industry in Asia, Europe and the United States witness the R&D energy of Taiwan's biotech pharmaceutical industry connecting with the world.

Since the establishment of the Company, in addition to the development of new drugs for the benefit of cancer patients, it has also actively engaged in social welfare. We participated in "2012 Clean Up The World: Clean the Earth and Protect Taiwan's Environment" in September 2012; joined the mission of Sea Passengers hosted by the Taiwan Environmental Information Association in October 2013 for cleaning up Jinshan Guoshengpu Beach; participated in "Working Holidays: Farmland Consolidation and Habitat Maintenance, by Sankeng Friendly Farming" organized by The Society of Wilderness in October 2014; engaged in coastal cleanup activity "North Coast and Guanyinshan National Scenic Area - Linshanbi" in October 2015; initiated invoice raising activity for Sunshine Social Welfare Foundation to help physical and psychological reconstruction and prevention services for burns and facial injuries with concrete actions in 2016; and participated in the collection and organization of supplies for China Andrew Charity Association in 2017.

Looking ahead, the Company has built a more active and long-term goal for sustainable development. To achieve this operational goal, we will actively introduce new cancer drug research and development projects and continue to invest in the research and development of new cancer drugs. We will also be more active in social welfare activities, upholding corporate social responsibility of “take from society, give back to society", devoting our efforts to the promotion of care for cancer patients and continually demonstrating our commitment to society.

Statement from the General Manger & CEO of the Organization

The main business of the Company is development of new drugs. We use NRDO (No Research, Development Only) in combination with "Networked Pharma" model to develop new drugs.

• NRDO (commonly known as natto that pronunciation like "納豆" in Chinese, focusing on new drug development, not early research): The development of new drugs can be roughly divided into three parts, i.e. drug research, drug development, as well as marketing and sales. For NRDO, we only engage in drug development in the middle phase, that is, we start with a new drug that has the potential to enter the first phase of the clinic. Following the authorization of introducing the project, we begin from animal tests and toxicological pathology tests, and then enter into human clinical trials. Until the stage that we consider as more mature and valuable, we authorize international companies for future development.

• Networked Pharma (Integration of New Drug R&D Industry): In addition to establishing a complete new drug R&D team, we have combined CRO (contract research organization), CMO (contract manufacture organization), and international renowned experts and scholars to work together to develop new drugs, so that PharmaEngine does not need to invest a lot of funds to build laboratories and factories in the drug development phase, and thus maintains a relatively streamlined manpower. As a result, over the past ten years, we have established international cooperation networks with global renowned institutions, experts and scholars in the field of cancer treatment.

Integrity management is very important for the development of new drugs. As new drug development starts from drug research and pre-clinical trials, followed by formally entering into the stage of clinical trials, and finally reaches new drug review and listing at the end. The entire process is very long and must have a high degree of integrity management mode to build a sense of safety and credibility for general public. Clinical trials must comply with a very large number of regulations and ethics. As clinical trials involve the safety of patients, PharmaEngine is very cautious in carrying out each step. We take into account the ethicality and rationality of clinical trials without sacrificing the rights and interests of patients in order to make new drugs enter into clinical trials.

In terms of practice and vision of corporate social responsibility, as we are engaged in new drug development work, we constantly think about how we can give feedback to the community. We invest in the field of new drug development and fully apply domestic and international research and development resources in drug development to accelerate new drugs entry in the market. It is hoped that the new drug can be used to extend the life of the patient to practice social responsibility. Taking the development experience of the new anti-cancer drug, ONIVYDE®, as an example, PharmaEngine has completed many human clinical trials so far. More than 700 cancer patients worldwide have participated in the drug-related clinical trials, including four first-phase, three second-phase (gastric cancer, pancreatic cancer, and colorectal cancer), and one third-phase (pancreatic cancer) clinical trials. We also protect participants in clinical trials and follow the GCP (Good Clinical Practice). We uphold the ethical principles of the Declaration of Helsinki whether we conduct human trials in Taiwan or abroad, we are covered by clinical trial-related insurance because we believe that everyone's life is very precious.

PharmaEngine's ONIVYDE® has been marketed in the United States, Europe and Taiwan, and it has successively received new drug marketing licenses for Korea and Singapore in 2017. From 2011 to the end of 2017, PharmaEngine has obtained about US$ 100 million revenue from the authorization of ONIVYDE®, setting a new benchmark for Taiwan's new drug R&D companies. In addition, PharmaEngine’s another R&D project PEP503 has been conducting a transnational pivotal trial with Nanobiotix since October 2014 for patients suffering from soft tissue sarcoma. The trial completed the goal of collecting patient cases in November 2017.

We have reviewed our goals of plans and actual performance in 2017. We achieved the Company’s annual budget target, began to redesign the Company’s website, obtained marketing licenses for new drugs ONIVYDE® in Asia, completed the application for Taiwan health insurance payment for drug price, reached the goals of drug purchase and revenue of Taiwan Medical Center, completed the goal of collecting patient cases for PEP503 global pivotal trial on patients suffering from soft tissue sarcoma, screened new projects and conducted accurate audits, etc. All of these goals have been achieved or exceeded . With respect to the increase of the shareholding ratio of foreign legal person shareholders and the progress of phase I/II clinical trials on colorectal cancer of PEP503, these projects fall slightly behind the schedule.

The main objective of the Company in 2018 is to screen and negotiate with the development partners of PEP503 in the Asia-Pacific region, to seek out external authorization opportunities, and to introduce and launch new projects. While looking forward to the next three to five years, the objective is to build new drug product lines with competitiveness and diversity. We will establish different strategic business units to maximize global advancing layout, and increase capital in accordance with the needs of new drug development projects or seek out plans for listing in other capital markets.

After being on marketing, ONIVYDE® has helped many cancer patients and their families, provided a new treatment option for patients with metastatic pancreatic cancer, and gave them the opportunity to prolong their survivals. In the future, it is also expected to provide significant curative effects on patients with other types of cancer for the benefit of the vast majority of cancer patients worldwide. We sincerely thank all the patients, clinicians and research teams who participated in the clinical trials for their great contribution and the friends who have silently supported PharmaEngine for the past 10 years. We promise that we will continue enhancing new drug R&D technology, practice the spirit of corporate social responsibility, and become Asia's most professional and innovative new drug development company with focus on the treatment of cancer diseases.

1. Company Organization and Operation

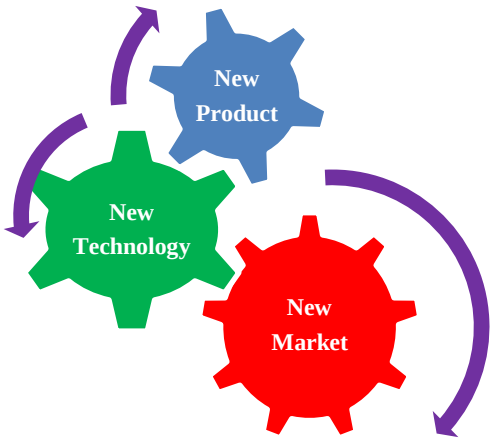
PharmaEngine Inc. was established in 2002 and developed new drugs in the form of an international strategic alliance. It operates under the business model of "No Research, Development Only (NRDO)" and "Networked Pharma (out-sourcing)". The development includes evaluation of new drugs and introduction of licensing, ranging from pre-clinical testing to human clinical trials.

The core competencies of the company are new drug evaluation capabilities, negotiation of licensing introduction, formulation of new drug development strategy and execution plans, and external licensing negotiations. Through international cooperation, the R&D resources have been maximized. It has now developed into a full range of new drug R&D company. The goal is to become a world-class biotech and new drug development pharmaceutical company.

1.1 Company Profile

- **Primary brands, products, and services.**

The company is mainly engaged in the development of new drugs. At present, there are three new drug projects in progress. The first new drug project ONIVYDE® has been approved for sale by Taiwan TFDA, US FDA, Europe EMA, South Korea MFDS and Singapore HSA. In addition, there are two new drug projects: PEP503 and PEP06. PEP503 (NBTXR3) is a radioenhancer developed by crystalline nano-hafnium oxides. It has been used in trans-regional pivotal clinical trials of soft tissue sarcomas in several countries in the Asia Pacific region. The clinical trial was conducted simultaneously on the first and second phase of rectal cancer and head and neck cancer in Taiwan. PEP06 is a new chemical entity (NCE) developed for cancer therapy and currently completes candidate nomination and commences patent application.



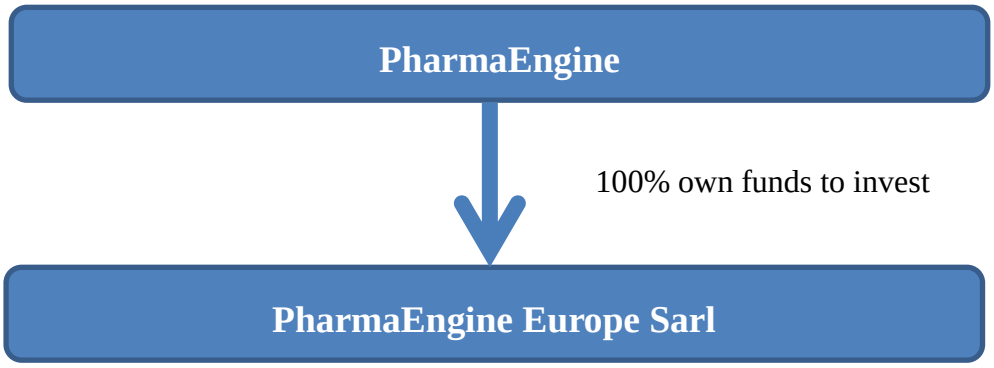
Location of organization's headquarters

- Head Office

  11F, 10 Minsheng E. Road, Sec. 3, Taipei 104, Taiwan

- Subsidiary

  The Company invested in the establishment of PharmaEngine Europe Sarl in France in November 2015. Its main business are primarily based on new drug development.



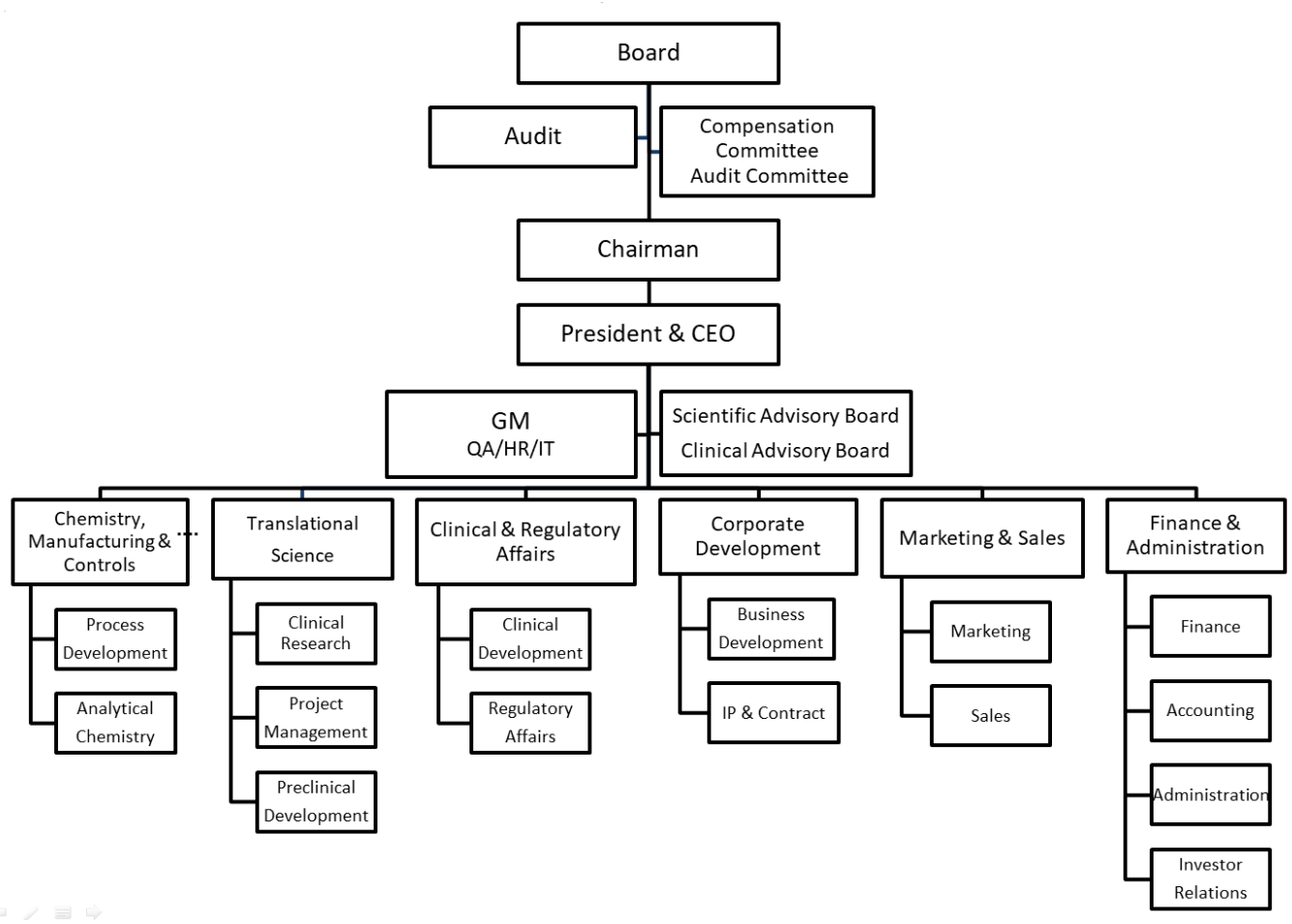
Scale of the reporting organization

- Scale of reporting Organization

Dec. 31, 2017

Name	PharmaEngine, Inc (Stock Code: 4162)
Employees	26
No. of operational locations	2
Net sales (2017)	853,677 (Thousand NTD)
Paid-in capital	1,471,288 (Thousand NTD)
Product	ONIVYDE®

- Organization Chart
- **Nature of ownership and legal form.**



The company is established under the laws of the Republic of China and it complies with the laws and regulations of the Republic of China on corporate governance, environmental protection, labor, human rights, products, and accounting.

The main operating activities are concentrated in Taiwan, but have been extended to Europe, the Americas, and Asia through preclinical or clinical trials of new drug development

The Company has established a wholly owned subsidiary PharmaEngine Europe Sarl in France. Its main operating activities are primarily based on new drug development.

Markets served

The company is mainly engaged in the development of new drugs. The industries it serves are the global medical market.

The geographical locations of customers and the types of beneficiaries of the company's products and services are summarized as follows:

New drug development project	Market for product or service supply	Customer and beneficiary type
(ONIVYDE®	The company authorizes the development, sales, and other rights of ONIVYDE® products in Asia (excluding Taiwan) and the European region to the French company Ipsen, which in turn delegates the license to the British company Shire for execution.	ONIVYDE® is a novel, stable nanotherapeutic encapsulation of the marketed chemotherapy drug irinotecan for the treatment of patients with metastatic adenocarcinoma of the pancreas who have been previously treated with gemcitabine-based therapy
PEP503	Nanobiotix authorized the company to have exclusive rights to develop and commercialize PEP503 (NBTXR3) in Asia and Oceania.	PEP503 is a kind of crystalline hafnium oxide (HfO2), which is used for the purpose of local treatment and has the effect of improving cancer radiation therapy.
PEP06	The company has the exclusive right to develop and commercialize the drug worldwide (except mainland China).	New chemical entity (NCE) developed for cancer therapy

Nowadays, the company do not happen that the compay’s products and services had been prohibited on their specifitic maketing. Also none events presented and related to the main issues of stakeholds questions or public disscussions.

Awards received in the reporting period

- In the "Third Corporate Governance Appraisal" holding by the Taiwan Stock Exchange in 2017, PharmaEngine ranked Top 5%
- 2017 “Deloitte, The Technology Fast 500 Asia Pacific”, PharmaEngine ranked No.136

500 | Technology Fast 500 2017 APAC WINNER

1.2. Corporate Culture, Vision and Strategy

- **Corporate culture (PISTI)**

The Company`s core value are People, Innovation, Speed, Team work and Integrity.

People	•Attitude, professionalism, continuous improvement
Innovation	•Process, product, organization
Speed	•Efficiency, effectiveness, time-to-market
Team work	•Communication, sharing, respect
Integrity	•Ethical, honesty, trustworthy

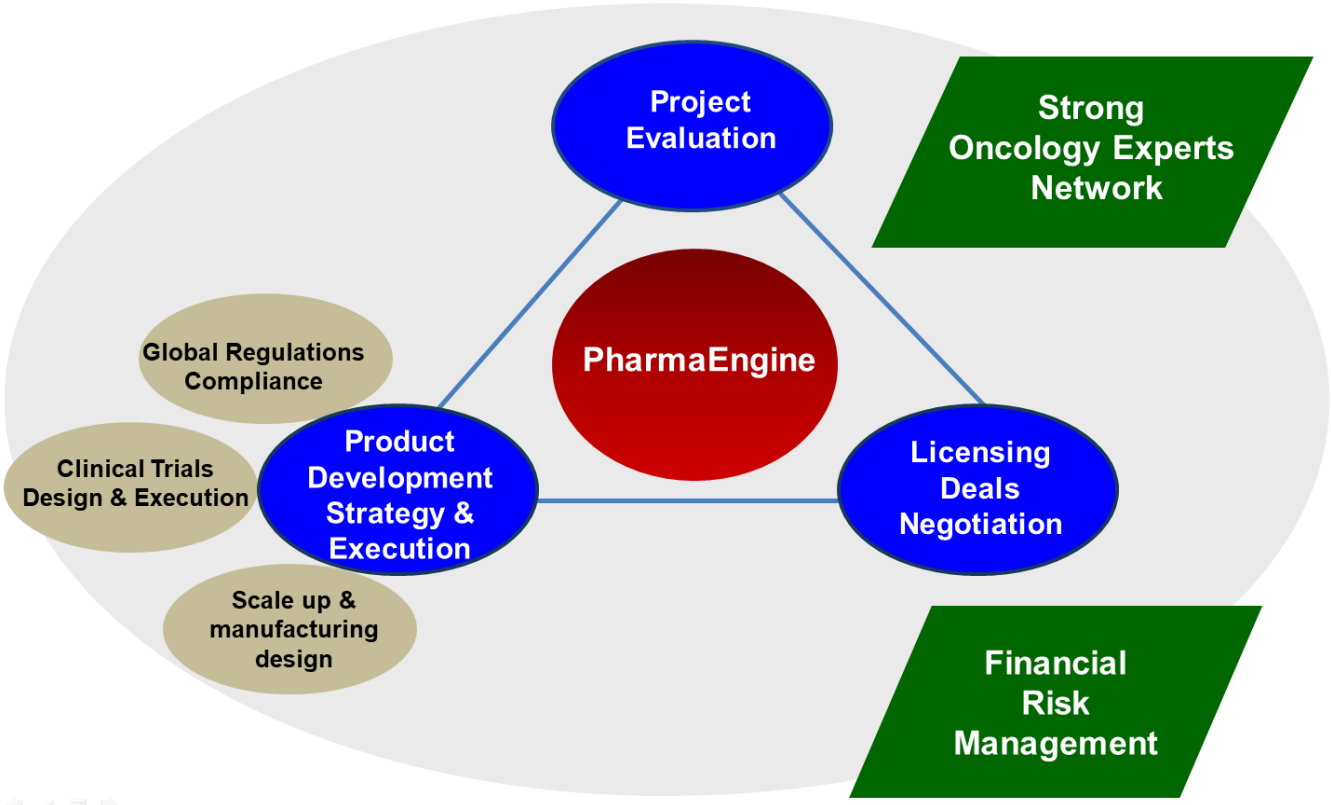
- **Vision**

- To be one of the most innovative and successful new drug development biopharmaceutical companies
- Specializing for developing the new drugs for treatment of cancer diseases

Strategies

- Focus in the late stage of new drug development
- Building a strong R &D team for new drug development
- Strengthen international cooperation in the use of global new drug development resources
- Accelerate the completion of new drug development and marketing

Core Competence



Business plan

- **Short-term business plan**
  - ONIVYDE® / Marketing & Development
    - A. Continuing to push ONIVYDE® into countries where it has not been launched yet and gain
    - B. Obtaining reimbursement from Taiwan National Health Insurance Asministration and receiving purchase orders from medical centers to increase sales in Taiwan
  - Projects
    - A. ONIVYDE®
      - a. Initiating investigator sponsored trials
      - b. Participating in phase Ib/III front line pancreatic cancer study
      - c. Participating in phase Ib/III small cell lung cancer study
    - B. PEP503
      - a. Completion of the global pivotal trial in soft tissue sarcoma
      - b. Actively seeking strategic partners in Asia-Pacific region to advance the development of PEP503
      - c. Continuing the phase I/II rectal cancer study in Taiwan
      - d. Continuing the phase I/II head and neck cancer study in Taiwan
    - C. New Projects

      Speeding up in-licensing of new projects and initiating new development projects to expand the product portfolio
- **Long-term business plan**
  - Completing network construction for the internationalization of the company and launching various anti-cancer drugs to the market for sale
  - Continuing the business model of “No Research, Development Only (NRDO)”, reinforcing the collaboration with international partners, expanding international sales channel and promoting the international image of the company.
  - Actively training R&D personnel of Company, promoting the techniques in new drug development and implementing the sustainable growth of Company

1.3 Company Operation

Financial performance

Unit: Thousand NTD

Year / Item	2016	2017
Operating revenue	1,134,782	853,677
Operating cost (Service cost & Operating expenses)	326,659	240,706
Operating income	808,123	612,971
Total non-operating income and expenses	29,784	(115,984)
Profit before income tax	837,907	496,987
Profit for the year	689,625	387,063
Basic earnings per share (EPS; NTD)	5.65	2.63

Direct economic value generated and distributed

Unit: Thousand NTD

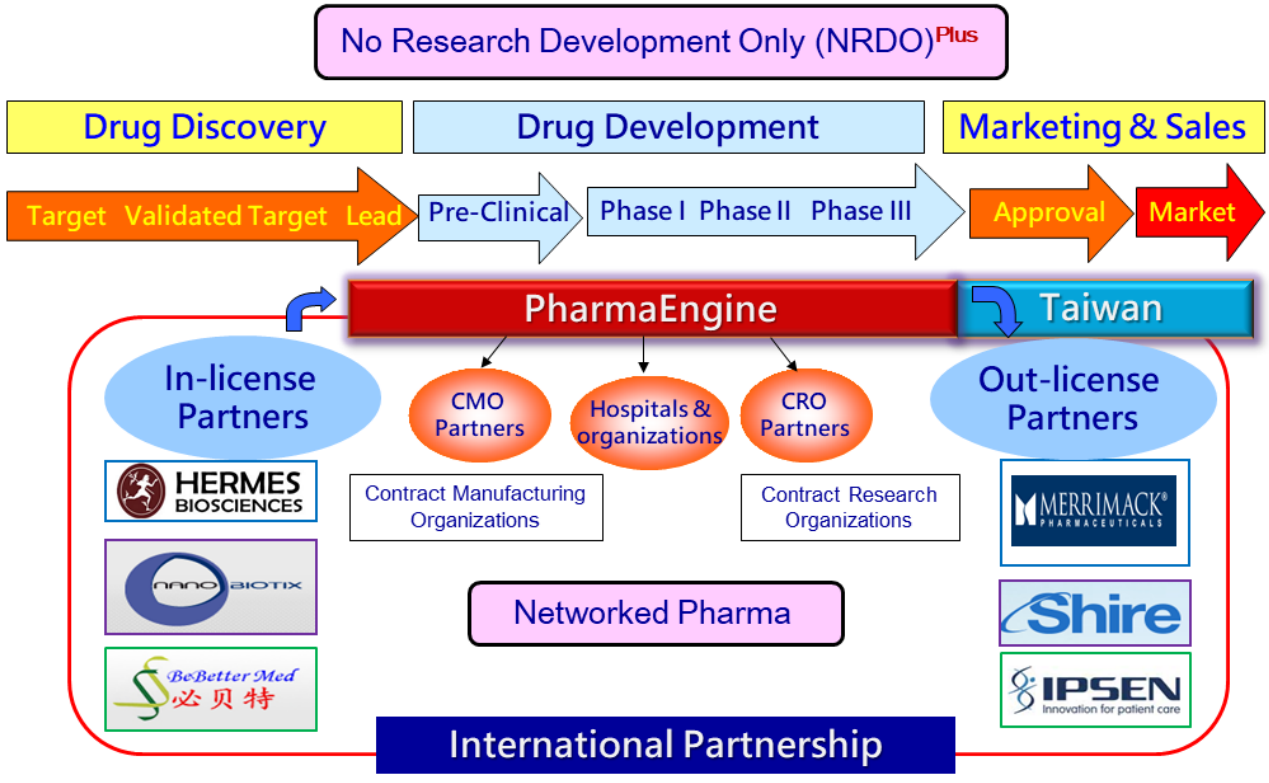
Stakeholders	Calculation of economic value	2016	2017
Shareholders	Cash Divident	203,122	306,458
Employees	Payroll, employee stock options, labor and health insurance, pension and other employment costs	184,456	118,914
Government	Corporate income tax	54,628	88,275
Licensors and Contract Research Organization	Drug development cost	76,629	37,845
Communities	Community participation activities and donation	2,829	4,669

The above figures relating to the 2017 of the Company have not been audited by the accountants, and the actual figures are based on the financial statements of the Company's announcement that have been audited by the accountants.

The new drug development supply chain

In the course of the whole drug development, may stages include the search for gene function, therapeutic target, protein syntheses, combined chemistry of small molecule synthesis, new pharmaceutical formulations and process development, preclinical animal pharmacology and toxicity test, clinical trials etc., are an indispensable part of the development process of biotech pharmaceuticals. The development of new drugs is like a relay race, each link can produce capital value, upstream and downstream cooperation also created a complete bio-pharmaceutical industry value chain, value chain collaboration and strategic alliance between enterprises to create better competitiveness.

New drug development business of PharmaEngine Inc. is concentrated on new drugs development that has market projections, by using NRDO model on new drugs development, conducting preclinical trials, phase I, phase II and phase III of human clinical trials, lowering the cost of early period R&D and shorten the development timing, to connect the exploration stage of drug development till the completion of the product inspection and registration. Through numerous preclinical trials to explore the value of the new drugs and followed strictly to US FDA/ EMA / ICH standards throughout clinical trials from phase I to phase III, acquired certification of each countries and carry out product manufacturing, marketing and out-licensing. New drugs development relevant chart of PharmaEngine INC. as following:



Supplier relations

At present, the company's general procurement suppliers are provided by the suppliers where they operate, and depending on the needs of different stages of research and development of new drugs, domestic and foreign CRO (Contract Research Organization) companies are commissioned to carry out relevant tests. We have long maintained a good interaction with suppliers and CRO companies. In addition to the annual evaluation of major suppliers' quality, process, and service attitudes, the company's procurement unit also strengthens the management of delivery suppliers for key manufacturers. It also requires that procurement units and suppliers to maintain sound communication.

When the company conducts supplier evaluations, it will work together with suppliers to learn and develop based on mutual benefits and principal of reciprocity so as to achieve a win-win partnership with each other. When we cooperate with suppliers, we adopt fair and rigorous principles to check the services and quality provided by suppliers and require suppliers to comply with domestic environmental protection laws and labor safety and health regulations.

We are in accordance with internationally recognized guidelines to safeguard labor human rights and cooperate with suppliers that also comply with this principle. At the same time, in order to respond to and mitigate global warming, we expect to work with suppliers to reduce the energy consumption of related products or services. In the process of using and disposing of wastes, we will reduce energy consumption and carbon emissions to reduce environmental impacts, and work together to enhance corporate image and fulfill corporate social responsibility.

- **Significant financial assistance received from government**

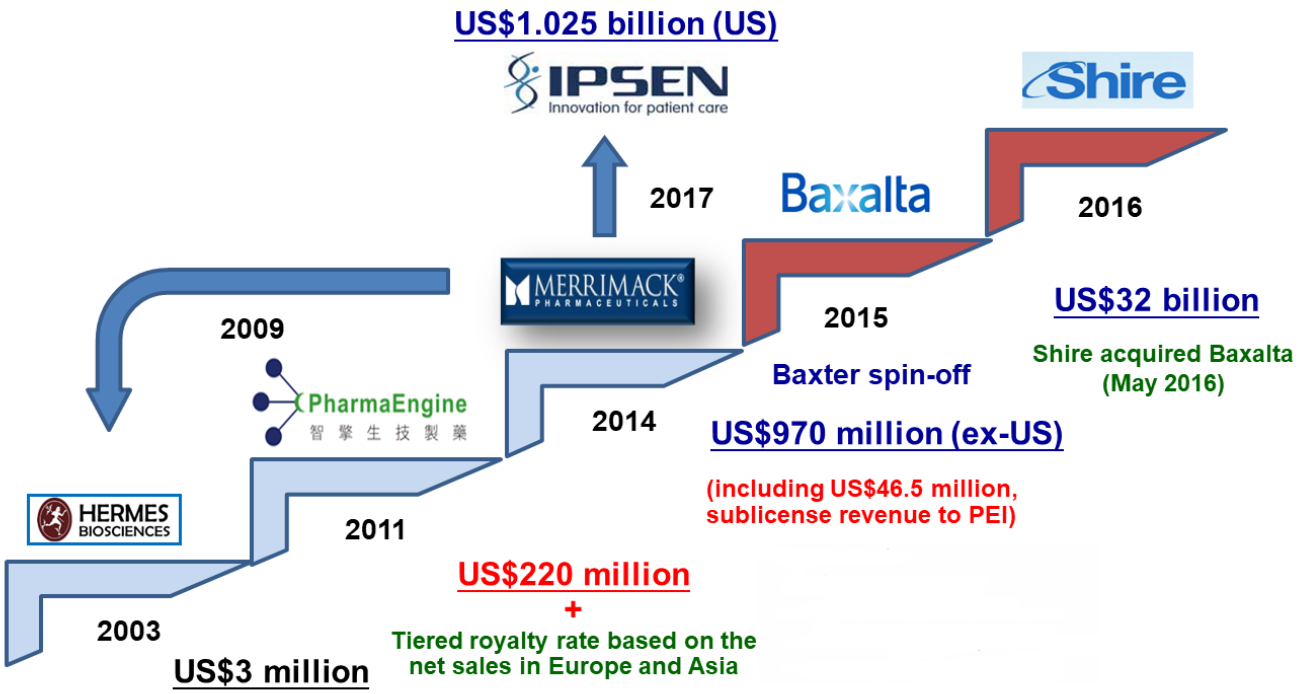
In 2017, the PEP503 project received government grant of NT$1,786,000.

- **Renting or outsourcing business and entities that have a significant impact on the organization**

- Renting: The company currently rents offices in Taipei and the leases are in line with the general market conditions.
- Outsourcing business: The company manufactures and partially conducts pre-clinical trials and clinical trials outsourcing, depending on the required test schedule, and these will have no significant impact on the company's organization.

Major changes to the organization and its supply chain

From 2003 to 2005, PharmaEngine introduced the development rights of ONIVYDE® in Asia and Europe from the Hermes Biosciences, Inc. (merged by Merrimack Pharmaceutical, Inc. in 2009). With its own preclinical and clinical trial design and execution capabilities, it achieved a breakthrough in Phase II clinical trials for pancreatic cancer and licensed to Merrimack in 2011. Merrimack authorized the relevant rights to Baxalta, Inc. for US$ 970 million in 2014. Baxalta was acquired by Shire Pharmaceutical, Inc.in 2016 with a value of US$ 32 billion. Merrimack in 2017 sold some of its assets, including ONIVYDE® related rights, to Ipsen in France for US$ 1.025 billion. According to the contract, the company has the right to charge Ipsen for up to US$ 266.5 million licensing fee, and it can receive a different percentage of sales royalities based on the combined net sales in Europe and Asia (excluding Taiwan).



2. Corporate Governance, Behavior and Ethical Code

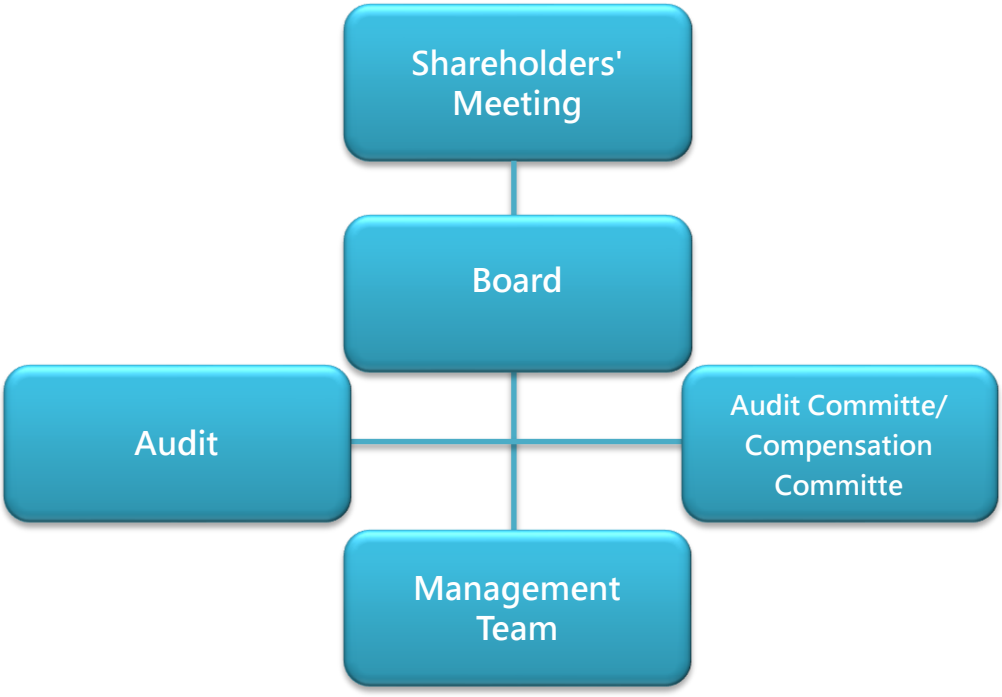
The Company shall abide by the operational philosophies of honesty, transparency and responsibility, base policies on the principle of good faith, establish good corporate governance, risk control and management mechanism, so as to create an operational environment for sustainable development.

2.1 Corporate Governance

In addition to establishing a code of good faith management, the company builds a corporate culture and sound development for integrity management and provides a reference framework for good business operations. It also handles regular businesses in accordance with the principles of the listed companies' corporate governance practices and will maintain good corporate governance concept in its daily operations. In addition to reducing the possibility of corporate financial crisis, it also protects the rights of investors and creditors and fosters long-term quality and competitiveness of good companies.

- **Organization's governance structure**

The implementation of corporate governance can effectively supervise the organization's activities, as well as improve the organization's operations, prevent the malpractices of law-breaking behaviors, and realize the high goals of corporate social responsibility.



- **Maintain shareholders' equity**

In order to protect shareholders' equity, ensure the proceedings and increase information transparency and timeliness of disclosure, the company follows the spirit of corporate governance, including: implementation of electronic balloting system, shareholders voting on case-by-case, uploading relevant documents to Market Observation Post System within a specified time, providing shareholders with diversified voting channels to fully exercise their rights and specifically improve the effectiveness of corporate governance.

- **Implementation by the Board of Directors**

In order to implement corporate governance and improve the efficiency of the board of directors, and promote the actual participation of directors in the company's business decisions, the company has established relevant regulations in accordance with the "Measures of the Board of Directors of the Public Offering Company". According to regulations, the board of directors convenes at least once a quarter, and arranges audit supervisors and invites certified accountants to regularly participate in communication to understand and supervise the implementation of the operation plan, important financial and business reports, internal audit business reports and followup issues, as well as whether the company's overall operating conditions are in compliance with the relevant laws and regulations. In 2017, the Board of Directors held six meetings in total.

At present, the company's board of directors has set up nine directors (including three independent directors), among which there are three female members and six male members. All members have working experience required for environmental protection, economic, social or corporate business, and are in line with the policy of diversification of board members. The board of directors has set up three independent directors who are not employed by the company or related companies and who are not operational personnel.

- **Abiding by Guidelines for Ethical Behaviors**

In order to align the conduct of the company's directors and managers with ethical standards and make the company's stakeholders more aware of the company's ethical standards, according to the " Guidelines for the Adoption of Codes of Ethical Conduct for TWSE/ GTSM Listed Companies ", relevant guidelines are set to regulate directors and managers to prevent conflicts of interests, avoid opportunities for personal interests, maintain confidentiality, fair trade, protect and properly deploy company assets, and comply with decrees etc.

Strengthen sound supervision function of the Board and enhance corporate governance so that the company can achieve sustainable operation.

- **Avoidance of conflict of interest by board member**

The directors of the company adhere to a high degree of self-discipline. For conference matters that they have an interest in their own or the legal entities they represent, and are detrimental to the interest of the company, they may state their opinions and answer to the questions, and must not join the discussion and voting. They should avoid participating in the discussion and voting.At the same time, they should not act on the other directors to exercise their voting rights.

There were two motions that incurred avoidance of interest of board member in 2017,and there were two directors who avoided the interests.

- **Director Training Arrangement**

In order to enhance the professional knowledge of the directors and implement corporate governance, the company proactively provides information on the related professional curriculum to the directors, encourages them to participate in various professional courses, and follows the requirements of "Directions for the Implementation of Continuing Education for Directors and Supervisors of TWSE Listed and TPEx Listed Companies", the further educations are arranged based on the regulated hours. In 2017, total number of training hours for all directors was 66 hours.

- **The operation of audit committee**

In order to promote corporate governance, improve the function of audit supervision, and strengthen the management function, the company established the "Audit Committee" in June 2016. The members of the committee are served by three independent directors, and all members select an independent director to serve as the convener and chairman of the meeting. According to regulations, the meeting is held at least once a quarter. In 2017, the Audit Committee held five meetings in total.

The main purpose of the operation of the audit committee is to supervise the following:

A. Expression of the company's financial statements

B. Appointment or dismissal of the certified CPAs and evaluation of their independence and performance.

C. The effective implementation of the company's internal control

D. The company complies with relevant laws and regulations

E. Management of existing or potential risks.

Independent director communication

The company's financial supervisor, internal auditor and certified accountant actually participate in the board of directors. Independent directors can contact the company's financial supervisor, audit supervisor and certified accountant at any time, and provide advice through the board of directors and record it in the minutes of the meeting.

The internal audit supervisor attends the Audit Committee and reports auditing business as required. If the auditor has any questions or instructions after reviewing the audit report, he will contact the audit supervisor by e-mail or make an inquiry by phone or inform him for handling the matter. Certified accountants report on quarterly meetings of audit committee on the results of the quarterly audit or review of financial statements, as well as other communications required by relevant laws and regulations.

The members of the Audit Committee of the Company communicated well with the certified accountants. The communication channels between the internal audit supervisors and the certified accountants and the Audit Committee were smooth. The independent directors can understand the company's operating status and auditing situation through the audit reports regularly provided by the Board of Directors and the Audit Committee and auditing units. Independent directors can communicate well with certified accountants through various reports and various channels (phone, fax, and email etc.).

The Operation of Compensation Committee

In order to implement corporate governance and improve the salary and remuneration system for directors and managers, the company has established Organizational Procedures of Salary and Compensation Committee in accordance with Article 14(6) of the Securities Exchange Act and Regulations Governing the Appointment and Exercise of Powers by the Remuneration Committee of a Company Whose Stock is Listed on the TWSE or TPEx. And on December 29, 2011, the board of directors decided to establish a Compensation Committee. In 2017, we held three meetings in total.

Main Responsibilities of Compensation Committee:

The Compensation Committee shall exercise the care of a good administrator, faithfully fulfill the following functional authority and submit the suggestion to the Board of Directors for discussion:

1. Formulate and regularly review the policy, system, standards and structure of the performance appraisal, salary and remuneration of directors and managerial officers.
2. Regularly review and stimulate salary and remuneration of directors and managerial officers.

Remuneration policy

The company is a new drug development company that integrates the industrial chain. Therefore, how to attract and retain employees who are excellent and in line with the company' strategic values is the most important issue for PharmaEngine's future growth. The main purpose of the company's strategic salary design is to support the company's long-term and short-term strategic objectives, effectively recruit, motivate, and retain talented people to form the core value of PharmaEngine. Internally, it should meet the principles of fairness and consistency, and reflect the performance-oriented culture, and also meet the overall salary structure of the company's current and future organizational structure; externally, it should maintain the competitiveness of the company's overall salary level and reward system in the biotechnology industry.

- **Directors' Compensation Policy**

➢ Payment policy for directors' compensation

When the directors of the company perform the duties for the company, the company has to pay the remuneration regardless of the company's operating results.

The board of directors is delegated with the authorization to decide on the remuneration based on the extent of their participation in and contribution to the company's operations, with reference to the level of industry peers. The level of compensation is comparable to that of most companies in the same industry. In accordance with the provisions of Article 25 of the Articles of Incorporation, if the company is profitable for the year, it shall be subject to a resolution of the board of directors and set aside of 2% to 8% for the compensation of employees and no more than 2% for the compensation of directors.

➢ Directors compensation payment procedures

The compensation for executing the business is reviewed by the Compensation Committee and submitted to the board of directors for approval. Annual earning distribution by compensation committee based on the value of each director's participation in and contribution to the company, a proposal for earning distribution will be proposed and submitted to the board of directors for approval.

- **Managers and employees compensation policy**

The company creates a good working environment atmosphere, attracts talents, encourages employees to serve the company on long term basis, and stimulates employee benefits regulation, implement various welfare measures. It also establishes the salary scale table for every job according to the market level, salary status in the same industry and the status of the company's employees, and from time to time makes reasonable adjustments based on non-scheduled industry salary survey. The salary structure of the company mainly consists of fixed salary, variable salary, various allowances and overtime pay.

The annual salary adjustment is based on the achievement of the company's annual operating goals and the performance of the individual's annual appraisal.

The annual salary adjustment list is submitted by the general manager and approved by the chairman of the board of directors, and then submitted to the compensation committee for review, followed by submitting to the board of directors for approval and distribution.

In addition, for the employees who have been promoted for their excellent performance and those who are transferred to other jobs, the procedure of salary adjustments is the same as the annual salary increase.

The total amount of performance bonus is decided by the General Manager based on the achievement of annual operation goal, approved by the Chairman, submitted to the Compensation Committee for review, and then submitted Board of Directors for approval and distribution.

The salary of employees at level 11 (inclusive) or above includes fixed salary, variable salary (such as performance bonus, temporary bonus, and project bonus), other allowances and employee stock options, employee stock options at cash capital increase, employee compensation, treasury stocks and so on, based on which the general manager drafts distribution proposals, related amount of remuneration and the total number of stocks. These are submitted to the Chairman for approval, to the Remuneration Committee for review on reasonableness and subsequently to the board of directors for approval and distribution.

- **The mechanism for employees participation in providing suggestions to the highest management**

The day-to-day operation and management of the company attaches great importance to teamwork. All members of the organization have any opinions at any time can use the company's e-mail, conference or face-to-face meeting for coordination and communication. In case of important issues, employees can also provide advice to the highest management through formal labor-management meetings, company routine conferences, attending the board of directors for reporting, and performance appraisal interviews.

Corporate governance results

- On September 30, 2014, the company passed the certification of the corporate governance system evaluation of the CG6009 Universal Edition of the Taiwan Corporate Governance Association.
- According to the results of the corporate governance evaluation for TPEx-listed companies by the Securities and Futures Institute of the Republic of China, the finding was as follows:

Year	Evaluation results
The first year (2014)	Top 6% to Top 20%
The second year (2015)	Top 6% to Top 20%
The third year (2016)	Top 5%

- For each year, the company uses its resources and reference benchmarking corporate practices as the basis for improvement in the next year. The main improvements in 2017 include:
  - ✓ More than one third of the directors (including at least one independent director) attended the regular shareholders' meeting and disclosed their names in the minutes.
  - ✓ The company uploaded the English version of the annual report 7 days before the shareholders' meeting.
  - ✓ The company provided details in the annual report to disclose the opinions of independent directors on the major proposals of the board of directors and the company’s handling of the opinions of independent directors.
  - ✓ For every board of directors' meeting, the company has at least one independent director attend in person.

2.2 Ethical Corporate Management and Ethical Code

The company is governed by the Ethical Corporate Management Best Practice Principles: The directors, supervisors, managers, employees or persons with substantial control of the company shall not in the process of engaging in business activities directly, indirectly, promise, require or receive any improper interests or engage in other dishonest behaviors that violate integrity, involve illegality, or breach of fiduciary duties in order to obtain or maintain benefits. Parties referred to in the preceding paragraph include civil servants, political candidates, political parties or members of political parties, state-run or private-owned businesses or institutions, and their directors, managerial officers, employees or substantial controllers or other stakeholders.

The Company regulates that all employees are subject to the code of conduct and are committed to upholding corporate assets, interests and imaging according to laws and ethical principles. The Company analyzed business activities with high risk of dishonesty in the business scope, and strengthens the relevant preventive precautions. The precautionary measures cover the followings:

- Bribe and bribery
- Provide illegal political contributions
- Inappropriate charitable donations or sponsorships
- Provide or accept unreasonable gifts, hospitality or other improper benefits

The Company shall specify the precautions regulations for actual controller when conducting business, which covers the following matters:

- Provide or accept the criteria for determination of improper benefits
- Provide processing procedures of legal political contributions
- Provide processing procedures, amount donated standards of appropriate charitable donations or sponsorships
- Regulations for avoiding the conflict between benefits and duties related, and its declaration and processing procedures
- Regulations for confidential and sensitive information obtained through business.
- Regulations and processing procedures for suppliers, customers and business transactions involving misconduct actions
- Processing procedures for identifying the violation of the ethical corporate management policies
- Disciplinary punishment against violators

The company complies with all statutes and regulations, and does not commit any bribery, does not make political donations and political lobbying, does not do unfair competition, acts of antitrust and monopoly to avoid illegal activities. In 2017, the company did not have been fined for violating the laws and any punishment record.

2.3 Anti-Corruption Policy

The Company understands that the risk of greed exists to some extent, and it may also affect the company's business integrity. Therefore, any greed, bribery and extortion are strictly prohibited. The Company also arranges for all serving and newcomers to participate in the anti-corruption education and training, and uses the comprehensive analysis of corruption and bribery risk assessment as an effective anti-corruption and anti-bribery policy.

- **Bribery risk analysis**

In 2017, the company has 8 first-level units, and analyzes the corruption and bribery risk of its first-level units. The self-assessed risk analysis is as follows:

Bribery risk analysis / Department	High risk	Medium risk	Low risk
General Manager's Office		✓	
Audit			✓
Chemistry, Manufacturing & Controls			✓
Translational Science			✓
Clinical & Regulatory Affairs			✓
Corporate Development		✓	
Marketing & Sales	✓		
Finance & Administration		✓	

Actions taken for corruption and bribery

In order to prevent the risk of corruption and bribery, the company has established a “Code of Ethical Conduct” as a code of conduct for directors, senior managers and all practitioners.

When the company's auditors perform internal audit works, they will perform professional duties to prevent frauds with thorough investigation. They maintain a vigilant attitude towards possible frauds, errors, omissions, waste, and conflict of interests. Any serious illegality or violation of regulations is considered and precautions are taken. If there is any suspected or detected fraudulent situation, it will promptly notify the appropriate supervisor to investigate and deal with it; for related corporate governance systems, internal control systems and management practices that are more likely to have risks of corruption and bribery, they are included in annual audits. The project will focus on auditing items, and based on the annual audit plan formulated by the risk assessment management operation, the focus and frequency of audits for routine checks will be improved with reference to the past findings of various units.

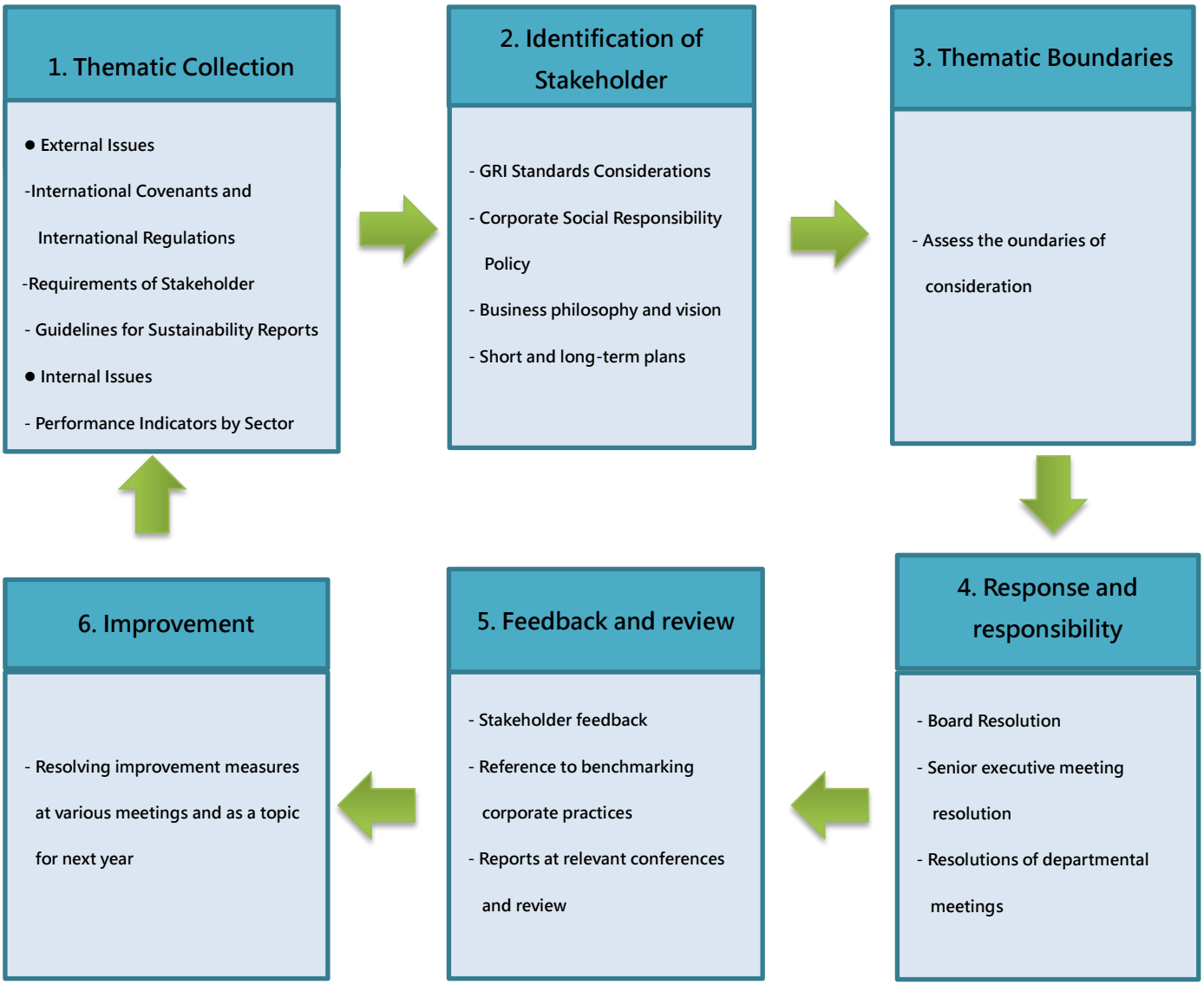
If there are any unlawful cases where complaints are filed, the auditors will, after careful review, report to the appropriate supervisors and the board of directors and have done a good job of preventing the relevant fraud or corruption risk.

Since the establishment of the company, there have been no incidents of corruption or bribery. If any unlawful incident occurs, the facts will be immediately ascertained, and the relevant employees involved in the investigation will be dealt with according to law.

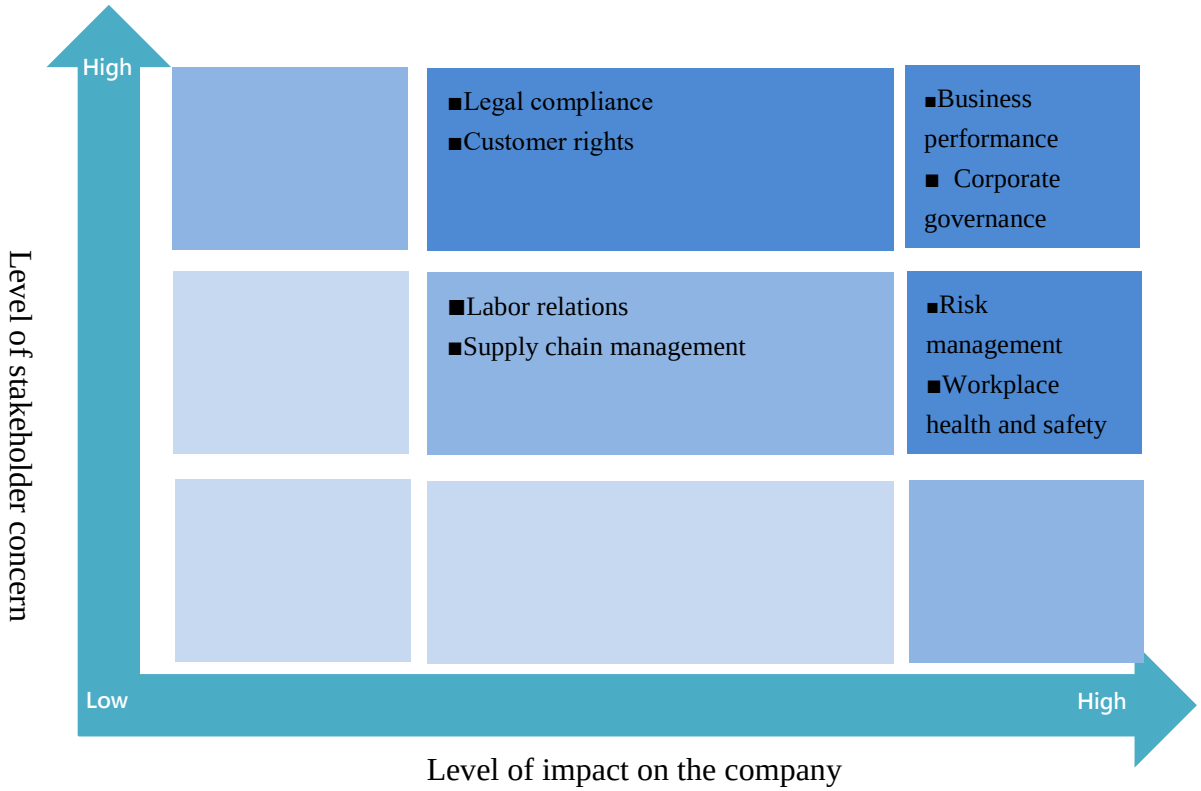
2.4 Important Topics and Stakeholder Communication

The procedure for the negotiation of major themes

In order to pursue sustainable development and to recognize the importance of stakeholders and to continuously demonstrate our commitment to society, PharmaEngine Inc. expects to establish a transparent and effective communication channel for all interested parties. The procedures for the negotiation of major issues of interested parties include the following six procedures:



The company analyzes the performance indicators of each department within the organization and external international covenants and international norms, requirements of stakeholders, and guides for sustainable reports, etc. to identify major issues of concern to stakeholders.



- Major topics and border line

  PharmaEngine defines the internal and external border line of the Company in consideration of substantive topics as follows:

Major topics	**The related GRI Standards topics**	**Management policy**	**Border line**	
			internal	**external**
Corporate governance	General disclosures: Governance Structure /Values, Principles, Standards and Code of Conduct	Code of governance	PharmaEngine	Investors
Risk management	General disclosures: Critical Impact, Risk, and Effectiveness of Opportunity/Risk Management Processes	Risk policy	PharmaEngine、Employees	Investors、Communities Customers、Suppliers

Business performance	Management policy: Management policy assessment	Business Plans	PharmaEngine	Investors
Legal compliance	Social and Economic Regulations	Regulations	PharmaEngine、Employees	Investors、Communities Customers、Suppliers
Labour relations	Labor Relations	Welfare program	PharmaEngine、Employees	
Workplace health and safety	Occupational Safety and Health	Welfare program	PharmaEngine、Employees	
Customer rights	Customer health and safety /customer privacy	Regulations of Sale and marketing	PharmaEngine	Customers
Supply chain management	General disclosure: supply chain	Supplier assessment	PharmaEngine	Suppliers

- **Identification and communication of stakeholders**

The Company's Stakeholders include Shareholders (Investors), Employees, In-license or Out-license partners, Customers, Suppliers & CRO, Charity groups, Communities, Government agencies and Media. The company maintains good relationships with stakeholders, implements internal and external communication for each matter, according to the projects concerned by the stakeholders, the responsibilities and work plans of the relevant units are separately included. The environment tends to evolve, and amendments to the decree can also be handled through the cooperation of various units. In order to meet the expectations of stakeholders, the company ensures that relevant work is achieved through various communication methods, while in the meantime, it maintains the unimpeded communication channels. The operating team regularly returns relevant information as a reference for future improvement or planning.

- Channels for communication open to PharmaEngine stakeholders

Stakeholder	Main issues	Channels for communication and frequency
• **Shareholders and Investors**	• Operating and financial status • Business performance • Corporate governance • Risk management	• Shareholders'Meeting • Investor Conference • MOPS • Information disclosed online • To answer the investors by telephone or E-mail
Employees	• Welfare policy • Labour relations • Labor right • Training • Workplace health and safety	• Labor conference • Internal website • Welfare Committee • Employee feedback line and mailbox
In-license or Out-license partners	• Operating and financial status • Business performance • Risk management • Legal compliance	• By E-mail • Regular visits • Occasional meetings
Customers	• Product quality and safety • Service quality • Marketing communications • Customer rights & interests and privacy	• By Telephone or E-mail • Hold patient meetings regularly • Regular participation in medical associations • Information disclosed online
Suppliers and CRO	• Procurement Practice • Perpetual purchasing • Communication Policy	• Unscheduled supplier visits and audits • By Telephone or E-mail • Unscheduled manufacturer meeting
Charity groups	• Charities and fundraising • Community work	• Regular charity events • Regularly donate invoices • Massage regularly for the visually impaired
Communities	• Environmental Management • Legal compliance	• Building Management Center

Government agencies	• Legal compliance • Labour relations • Participation in public policies	• Advocacy of decrees and the promotion of related systems • Official letter to and from • Assist in the formulation of related specifications • Competent authority meetings and seminars
Media	• Business performance • Operating and financial status • Legal compliance	• Press release • Spokesman system • Information disclosed online • Public relations department

- Feedback and review of stakeholders

  In the sustainable management of a company, it is necessary to continuously communicate with stakeholders and understand the needs of stakeholders, as a reference for the formulation of company policies and plans. During the implementation of policies and plans, it is also necessary to listen to feedback and opinions from stakeholders as subjects for subsequent improvement.

Stakeholder Contact Informations

- Shareholders and Investors

  Contact person：Chi-Hsing, Chang (Spokesperson) , Vice President, Finance & Administration

  Tel：886-2-2515-8228

  E-mail：chihsing.chang@pharmaengine.com

- Customers / News media / Government agencies

  Contact person：Chi-Hsing, Chang (Spokesperson) , Vice President, Finance & Administration

  Tel：886-2-2515-8228

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- Employees / Communities

  Contact person：Melody Lin, Director, Human Resources

  Tel：886-2-2515-8228

  E-mail：melody.lin@pharmaengine.com

- Authorized partners

  Contact person：Roger Hsieh, Associate Director, Business Development

  Tel：886-2-2515-8228

  E-mail：roger.hsieh@pharmaengine.com

- Suppliers and CRO/CMO

  Contact person: Tony Hsieh, Director, Chemistry, Manufacturing & Controls

  Tel：886-2-2515-8228

  E-mail：tony.hsieh@pharmaengine.com

Report line

- Contact person：Tony Hong, Associate Director, Audit

  Tel：886-2-2515-8228 #106

  E-mail：tony.hong@pharmaengine.com

- Contact person：Frank, Li-Sheng Chu, Independent Director

  (Full lecturer-Department of business Administration at Asia University)

  Tel：886-4-2332-3456 #20043

  E-mail：chulisan@gmail.com

2.5 Customer Relations

- **Protecting subjects in clinical trials to ensure their rights, safety and well-being**

The company conducts clinical trials in accordance with the "Guidelines for Good Clinical Practice (GCP)" and upholds the ethical principles of medical research in the Declaration of Helsinki to ensure the rights, safety and well-being of subjects. For each participant who participates in human clinical trials, they will be fully informed and protected. In addition, the company provides relevant insurance for the clinical trials. If there is any physical harm due to participation in the trial, there will be clinical trial insurance to compensate the subject for damage.

- **Quality policy**

The company upholds the spirit of innovation, manages new drug research and development projects, adheres to quality and focuses on total quality management. The company also complies with Good Manufacturing Practices (GMP), Good Laboratory Management Practices (GLP), Good Clinical Practices (GCP) and international regulations, and achieves new drug development research that meets the goals of safety, effectiveness, and consistent quality to enhance The development level of new drugs, promote the development of medicine and continuously improve the quality of medicines.

- **Notification for Adverse Drug Reaction on Clinical Trial**

For the company's pharmaceutical clinical trials, if there is any serious adverse reactions caused to the subjects due to the drugs, regardless of the location in Taiwan or other regions, the company will notify Ministry of Health and Welfare or Taiwan National Adverse Drug Reaction Reporting System of Taiwan Drug Relief Foundation in accordance with the regulations.

- **Safeguard the interests of consumers and medical institutions**

The company joined the drug relief system. In 2017, it provided 0.05% of estimated turnover as drug relief fund, and also covered product liability insurance to protect the rights and interests of consumers and medical institutions.

- **Product liability related laws and regulations**

ONIVYDE® is currently the main product of the company. It has obtained the drug license issued by Taiwan TFDA and was officially launched in Taiwan in June 2016.

In 2017, the company had not been fined for violating the health and safety of products and services. There was no fine imposed for information and labeling of product and service, or for regulations related to marketing communication. And there was no complaint for infringement of customer privacy and loss of customer information.

2.6 Investor Relations

Shareholders' equities are valued by the company. The company has a full-time service team including spokespersons and stock agency to ensure smooth communication with investors and quarterly views of investors to be consolidated into reports for the board of directors. The Company regularly reports to shareholders through annual shareholders' meeting on the business results, annual business plans, future development strategies and impact on industrial environment, and actively responds to shareholders' suggestions. Up to now, the relationship with shareholders is good and there is no dispute.

From time to time, the company participates in road shows conducted by domestic and foreign securities dealers and securities regulatory authorities, reports the latest company operations, financial business status, and R&D progress to domestic and foreign institutional investors, so that the company information can be delivered more transparently, promptly and correctly to the public investors.

The disclosure of information is also an important part of investor services. In recent years, the company has invested a large amount of resources to meet the principles of completeness, promptness, fairness and transparency of information disclosure. In addition to the timely disclosure of relevant information at the “Market Observation Post System", we also set up an "Investor Zone" on the company's website to provide relevant information and material information about the company's governance to ensure transparency of information, thereby enhancing corporate image and safeguarding shareholders' equities.

2.7 Risk Assessment and Crisis Management

The company combines corporate operation management and risk management, and follows the regulations of the competent authority and the company's operating strategy to formulate risk management measures.

- **New drug development risk management**

The research and development of new drugs involves with large investment, long cycle and high risk. According to the research, an innovative new drug will require more than 10 years of development and research from the initial screening of compounds to the final market. Considering the cost of failed R&D projects, the research and development of a successful new drug will cost about US$ 1 billion. Because of the high risk of R&D of new drugs, it is very important to conduct proper risk assessment and control to increase the success rate of R&D of new drugs.

The company's R&D risk management projects include evaluation and introduction of new projects, implementation of project management, quality management, process development control, pharmacology and toxicology research management, clinical research management, regulatory inspection and registration management, project results management, new product development and document maintenance and preservation operations.

Risk Identification

The company classifies potential risks of its business operations into 9 categories of risks, such as “new drug R&D”, “accidents and disasters” etc., and based on the “probability of occurrence” and “degree of impact” of each type of risk, it selects the new drug development risk as the major risk for the year. Then the relevant business department develops a corresponding plan, with specially assigned staff regularly tracking the results of R&D corresponding plans for timely correction and improvement.

Risk Item	Potential risks	Likelihood	influence level
New drug research	The timeliness, stringency and innovation of the R&D process do not meet the requirements for drug approval in various countries.	Medium	High
Accidents/disasters	Earthquake/ Fire	Low	High
Information Security	System Error	Low	Medium
	Leakage of confidential information	Low	High
Legal Compliance	Infringement of the intellectual property rights of others, doubts about the safety of listed drugs	Medium	High
Tax/Finance	Huge changes in interest rates and exchange rates	Medium	Medium
Personnel Section	Poor health of employees / occupational disasters	Low	Medium
Business management	Poor corporate image	Low	High
Political society	Great changes in government regulations and economic crisis	Low	High
Others	No other major risks	Low	Low

- Risk management responsibility

The risk management responsibilities of the major departments of the company (2017) are as follows:

Department	Risk management responsibility
General Manager's Office	Responsible for leading company's operating and business directions, through internal control and budget system planning with business performance audit, while participate in R&D planning and consultation. Its risk management responsibilities are mainly business decision-making risk, product quality risk, risk assessment of network information security, and operational risk management.
Audit	In charge of internal auditing process of the group Its risk management responsibilities are mainly internal control and internal audit related risk management.
Chemistry, Manufacturing & Controls	Responsible for new drug development, manufacturing and analysis. Its risk management responsibilities are mainly risk management of new drug R&D, manufacturing, and analysis.
Clinical & Regulatory Affairs	• Clinical Development: Responsible for planning and implementing of clinical trials, includes trial proposal preparation and submission, the selection of test center and the host, the selection of CRO, trials followed by ICH-GCP guidance, progress reports, test drug adverse reaction reports, statistical analysis reports and test reports, etc. • Regulatory Affairs: Assist new project assessment and submission in regards to regulation requirements, responsible for product inspection and registration, and establish a good relationship with pharmacological organizations. Its risk management responsibilities are mainly the clinical trials and product inspection and registration risk management of R&D projects.
Corporate Development	Responsible for the planning and recommendation of the Company's operation and development, the evaluation and introduction of the project, the planning and implementation of the external and foreign investment cases, the assessment and management of intellectual property rights and regulations, and the development and management of the contract.
Finance & Administration	Responsible for the company's financial, accounting, administrative, general procurement and maintain relationship among investors. Its risk management responsibilities are mainly related to the management of financial risk assessment and the implementation of coping strategies.

Translational Science	Responsible for the relevancy of preclinical animal pharmacology, toxicology, pharmacokinetics and clinical trials, also project's overall planning and execution controlling plus development and management of external R&D resources. Its risk management responsibilities are mainly for preclinical animal pharmacology, toxicology and pharmacokinetics and clinical test related research, external R&D resources management, project planning and execution, and related risk management.
Marketing & Sales	Responsible for company's products marketing strategy and rollout. Its risk management responsibilities are mainly product-related marketing or sales and account-related risk assessment management.

Opportunity

Taiwan's current experience in clinical trials of new drugs remains an advantage in Asian countries. In addition to the extensive experience of clinicians participating in clinical trials of new drugs, the number of patients suffering from many diseases in Taiwan is also sufficient, so there is great opportunity for attracting international cooperation. If Taiwan companies want to invest in the development of new drugs in a short period of time and step into the international market, the easiest and less risky way is to cooperate with international biotech pharmaceutical companies.

The operating model of NRDO has so far been a very viable strategy. In addition to developing new drugs with international biotech companies, allocating resources and risks to accelerate the launch of new drugs and step outside of Taiwan market, companies could work together and combine the best product lines to make risk management easier, and companies can stop lower performance projects. In addition, in order to operate with NRDO model, the company must have a managerial flexibility to maximize the flexibility to add or withdraw projects, so investing in a technology or products should be outsourcing, that is to minimize the investment in equipment, because different technology or new drugs development or production equipment varies, if over investment in hardware equipment, the flexibility of withdrawing will be very low, thus by outsourcing the development and managing the progress of the new drug development as a project will leave the company a better flexibility and also lower the risk, this is so-called Networked Pharma operating model.

The company is conducting new drug development in the form of an international strategic alliance. It aims to reduce the risk of new drug development and hopes to achieve a win-win relationship with its partners by adopting “No Research, Development Only (NRDO)” and “Networked Pharma” (Out-sourcing) model. This enables the company to become an "integrated new drug development company", and it is expected to establish a value chain for Taiwan's new drug development industry and a successful case.

The company's ONIVYDE®, a new anticancer drug, has been approved by Taiwan TFDA, US FDA, Europe EMA, South Korea MFDS and Singapore HSA for new drug marketing licenses, which fully demonstrates that the company's commitment to new drug development efforts have gained the recognition of domestic and foreign medical institutions, professionals in new drug development field, as well as competent authorities .

The company implements improving the company's internal system and capital structure, which has a positive impact on corporate reputation and corporate debt.

3. Employees and Workplace

The company seeks sustainable development and growth of the company. Since its establishment, it has adopted humane management and has given full respect and attention to its colleagues. It has provided group insurance, regular health checks for employees, employees' on-the-job training, employees' study abroad, and rewarded senior employees and well-performed employees, etc. It also formulated a complete welfare practices, implements various welfare measures, and strengthens the overall care of employees and provides a happy, high-quality work environment.

3.1. Composition of Employees

Item		Male		Female	
		2016	2017	2016	2017
Total Number of Employees (person)	Director or above personnel	4	4	1	1
	R&D	5	4	4	6
	Other employees	5	5	4	6
	Total	14	13	9	13
Number of employees at the beginning of the period (person)		12	14	7	9
Number of new employees in this period (person)		2	1	3	5
Number of staff departures (person)		0	2	1	1
Number of employees at the end of the period (person)		14	13	9	13
Average age (years)		46.94	47.25	43.70	42.50
Average length of service (years)		8.79	10.05	5.27	5.35
Education level(%)	PhD	1	1	1	2
	Master	8	6	4	6
	College or equivalent	4	5	4	5
	Senior high School	0	0	0	0
	High school and less	1	1	0	0

Note 1: All employees are full-time and work places are in Taiwan.

Note 2: All employees are employees of this nationality.

Note 3: The company has not yet established a labor union organization, so the group agreement is not applicable.

- **Employee retention rate after the completion of fertility/parental leave**

In 2017, no employee of the company applied for maternity leave or parental leave.

3.2. Employee Career Development

Talent is an important asset of the company and a key factor in determining the company's competitive advantage. In PharmaEngine, a full range of learning is not an empty slogan but a deep-rooted culture for the organization. The company has established "educational training operation procedures". Under a well-developed education and training system, it plans out the whole series of education and training courses for the company's organizational strategy and work needs in order to enhance the employees' ability of work.

According to the Company's education and training procedures, each department sets a budget every year, carries out education and training during the year, strengthens the professional qualities of colleagues, and improves work efficiency and quality. Its training includes related training courses such as expatriate training, internal training and on-the-job training, and organizing the " Reading Club" to give timely feedback on sharing experiences.

- Corporate education and training system

- Expatriate training:
  - Domestic training: Each department or employee prepares an annual budget for education and training. Employees can choose to participate in training courses held by domestic institutions. Those who exceed the budget limit may be subsidized by the company after the approval by the general manager on project basis.
  - Foreign training: In order to absorb foreign advanced professional knowledge, skills and training talents, the company will, depending on practical needs, assign personnel to participate in education and training courses organized by foreign institutions.

- Internal training:
  - Pre-service training: the aim is to enable new recruits to understand the company's business items, operation profiles and corporate culture, and comply with the rules and regulations, so they are competent for future work. The course content includes company vision and operational strategy, company operating model, company organization and function, introduction of technique, status quo of domestic and international pharmaceutical industry, clinical development research, pharmaceutical regulations, management methods of official document research and development results, intellectual property rights, administrative accounting process, information resources, benefits and obligations, and the main duties of each department.
  - Language Training: In order to improve the foreign language ability of employees, the company employs professional foreign teachers to teach in the company, and regularly arranges courses of writing and daily conversations.
  - Other in-house training: In order to enhance the professional knowledge and skills of employees to improve work performance, we hold in-house education and training in the forms of holistic lecture and seminar based on actual needs. In addition, the company also hires external professional lecturers to the company to conduct education and training, so that more colleagues can participate in learning.
- On-the-job training:

  To cultivate high-level professional and managerial talents with international perspective and all-round strategic thinking. Employees who have officially worked for more than one year may voluntarily participate in relevant training courses such as medical related research institutes, MBAs or EMBAs established by domestic and foreign university research institutions (including supplementary education institutions).

Training Program execution status

The 2017 implementation of the Company's education and training program is as follows:

- Course title: 2017 Gastrointestinal Cancers Symposium, 2017 ASCO Annual Meeting, ESMO Congress 2017, Accelerating Anticancer Agent Development and Validation (AAADV) Workshop, 2017 AAPS Annual Meeting, Practical Application of Toxicology in Drug Development, 2017GS1, International Trend Forum on Medical Automation Recognition and Management, Import Drug Inspection Registration Management Seminar, 2017 “Maintaining Quality QA From System Construction, Linkage, Communication and Application” Series Courses, the Challenge of Compiling Consolidated Statements, the Key Analysis of the Latest Practice Status and Legal Responsibilities of US and Taiwan Securities Trading Supervision, Adversity Management, Investment in Biotechnology and New Medicines, Legal Compliance for the Company's Management Rights and Insider Equity Transactions. There were 80 education training courses in total.

- Annual education and training costs:1,761 (thousand NTD)
- Trainees: 84 people
- Total hours trained: 875.5 (hours)
- Average hours of training per year per employee by employee category is as follows:

Items		Male	Female
Average hours of training (hour)	Senior manager	33.9	61.5
	R & D employee	49.6	39.9
	Other employee	7.4	17.8

In the future, the company will continue to uphold the concept of lifelong learning, provide every employee with good education and training opportunities and learning environment, cultivate the professional skills required for each job, ensure that employees perform their best job performance, and use this to gain customer trust, and achieve outstanding results for customers, shareholders, companies and employees.

3.3 Safe and Healthy Working Environment

The company organizes employee safety and health education training from time to time to avoid accidents caused by ignorance. In addition, the company also strengthened related workplace environmental safety management, environmental sanitation maintenance, fire safety management, and employee health management to safeguard employees' personal safety.

Workplace environment safety management

- Stipulate "Employee regulation", specify safety management items for employees to follow
- Implementation of access control, employees or visitors are required to swipe access card or validate

Environmental cleaning

- Office cleaning task: Twice every week
- Building disinfection task: Every odd month
- Building rodent control inspection: Every even month
- Drinking water inspection: Once every month
- Air conditioning filter replacement: Once every 3 months

Fire safety

- According to the regulation of the building in which the Company is located should provide with a complete fire control system, including alarm system, fire control system and escape system
- The fire protection equipment of the building where the Company is located is commissioned by the qualified professional inspection company to carry out system function testing
- The premises of the Company are giving out fire drills and fire safety training courses, such as the use of fire extinguishers and fire hose, and hire professionals to give lessons on CPR and AED
- Other fire safety related facilities: Dry powder fire extinguishers are placed in public walkways according to regulations and regularly inspection with maintenance of all the fire protection systems

Employees health management

- General health checkup allowance for every employees every two years
- There was no occupational injury, occupational disease and deaths in 2017
- In 2017, the company did not have duties with staff engaged in high risk or high incidence of specific disease.

3.4 Employee Welfare Programs

The Company's salary policy, various employee welfare, further education, training, pension system and its implementation status, agreements between employees and employer, as well as maintenance measures of various employee interests and benefits are as follows:

Salary Policy

The salary policy of the company is based on the company's overall salary in the market positioning, the results of industry salary surveys, the growth cycle of the industry in which the company operates, and consideration of the internal fairness of the company. The salary level of the company is based on the level of the job, the job attributes, and the difficulty of substitution to make different market salary positioning. Since the work of R&D supervisors requires a high level of professionalism and considerable work experience, the salary levels at or above the 12-level (inclusive) position are located at the P90 of the same industry. The salary levels of R&D executives at the 10 and 11 level are located at P75 in the same industry, and the remaining positions are at P50. The level of salary payment is comparable to that of most enterprises in the same industry, and not varies by employees' race, religion, gender, nationality, age, or any legally warranted status, and the pays of all employees currently exceed the basic salary.

- Range of ratios of standard entry level wage compared to local minimum wage at significant locations of operation as follow:

Unit: NTD

Title	Grade	Minimum monthly salary	ROC basic salary (implemented on January 1, 2018)
Specialist	3	30,000	22,000

- Employees welfare measures

To create a good working environment, attract talent, and encourage employees to serve the Company for long term, the Company established welfare regulations and implementation welfare measures, described as following:

- Bonus/Allowance
  - Annual bonus
  - Birthday gift: Birthday parties from the Company and giving out birthday bonus for the birthday of the month
  - Wedding gift: Wedding gift from the Company for congratulating of the employee's wedding
  - Fertility gift: Employee or employee's spouse can receive fertility gift
  - Annual gift: Giving out annual gift on Dragon Boat Festival and mid-Autumn Festival
  - Disease and hospitalization condolence money: May apply for allowance from the Company's group insurance or given out condolence money
  - Disaster salvage subsidy: Salvage subsidy will be given according to the situation
  - Funerals: The Company will be given at funerals of sympathy if first-degree relatives (parents, children, spouse) or second-degree or third degree relatives of the employee passed away
  - Health inspection subsidy: Health inspection allowance can be applied in the second year where the employee has worked at least one year in the Company, allowance given out once every two years

- Domestic and international travel subsidy:
  A. Domestic travel: Fully subsidized except new comers less than one month
  B. International travel: Given out subsidy according to the annual budget.Calculated in ratio if worked less than a year. If international travel is hosted by the Company of that year, it is estimated by the budget of that year, except new comers worked less than a year will be calculated in proportion

- Leave regulation
  - Special leave
  - Family care leave
  - Female physical leave
  - Birth delivery (production) leave / maternity leave / paternity leave
- Others
  - Group insurance: Insured 3 to 5 million NTD for accident coverage according to job levels, 30 thousands NTD for injury medical insurance and hospitalization insurance
  - Depending on the budget and needs, the Company organizes dinner, Year Open Party and other activities from time to time

Retirement system

- In accordance with the retirement regulation under labor standard Act, the Company allocates employee retirement reserve one monthly basis, deposit in specialized account, retirement qualification:
  - Service of the Company over 15 years and over 55 years old, or service of the Company over 25 years, or service the Company over 10 years and over 60 years old could apply for retirement.
  - Employees that is over 65 years old or who have mentally or physically disabled are forced to retire. Every retired employee's length of service, given two base points per full year, and one base point per year beyond 15 years of service length, service length less than 6 months count as half year, between 6 months and one year count as 1 year. The total of the base points can't exceed 45 points, base of the retirement pension standard is calculated by the average salary of the last month prior to the date of retirement, average salary is calculated by the regular payment of the employee (temporary paid and subsidy not included). Workers who are forced to retire, whose minds are lost or physically disabled due to the execution of their duties, are added with 20% increase in accordance with the provisions of the preceding paragraph.
  - The company has fully settled its employees' seniority in the old system in 2014.
- Since the commencement of the Labor Pension Ordinance (hereinafter referred to as the new system) on July 1, 2005, the employees who has decided to adopt the new system or carry out the new system within the next 5 years, or new employees after the new system, the retirement pension will be calculated with the new system, that is, the provision of the pension system, the payment of its pension is categorized by scale of its monthly salary, allocated by the Company on a monthly basis with no less than 6% of the monthly salary as retirement pension, deposit at labor pension personal accounts.

3.5 Employee Participation

Labor Meeting

The company did not set up a safety and health committee, but set up a labor meeting, which was held at least once every quarter. The topics of the meeting include labor welfare, safety and health, labor health, and agreement between labor and employer. The participating members include two representatives from the employee side and two from the employer side. The labor share of the labor meeting is one-half.

Multiple activities

Every year, the company elects two welfare committee members by the employees, and coordinates with HR to manage issues related to employee welfare issues.

- Host birthday party monthly for celebration
- Domestic or international travel
- Family day
- Company's Spring Party
- Reading club–
- Jogging activities
- Badminton group
- Invite visually impaired massage therapists to the company to help employees relieve stress on their bodies and minds, taking into account the love for public welfare.

- **Labor relations**

Any new or revised measures of the company concerning labor relations have been finalized after the two parties have fully communicated and reached the agreement. Therefore, there is no dispute and the relationship between the employer and employees is harmonious.

Company Trip in Kinmen, 2017

3.6 Human Rights Protection

The company complies with government regulations and protects human rights. The company does not use child labor, nor does it use forced labor or forced overtime; it opposes unequal discrimination, respects gender, nationality, race, religion, association, and has set a labor meeting and complaints processing channel to safeguard human dignity and create a fair and harmonious workplace environment. The company does not illegally employ child labor, violates the provisions of the Indigenous Peoples' Rights, or related labor contracts or labor laws.

In 2017, the company did not file complaints related to human rights through formal mechanisms.

3.7 Performance Review and Career Development

The company's annual performance and development review is mainly aimed at supporting, encouraging, and assisting employees. Employees with outstanding performance can be affirmed with salary increase or promotion. The company further communicates with employees who perform poorly to enable them to understand and coach them to improve their work efficiency, so that all employees can adapt to their capabilities, give full play to their strengths, successfully complete the company's overall goals, and achieve the win-win objective for the company and the employees.

- **Objects:** All of the Company’s employees have attended the performance review in 2017
- **Time:** Duration of ever year ended
- **Review items:**

- The supervisor evaluates the following two items:
  - The achieved annual target, accounting for 75% of the total. Each employee adjusts the proportion of detailed items according to the goals set for each year.
  - The appraisal of competency adequacy, accounting for 25% of the total. It includes professional knowledge, efficiency, cooperative attitude, leadership, and management ability.
- The employees perform three self-evaluations annually as the basis for how the supervisors can assist in employee performance improvement, training plans, or action plans for employees.
  - The annual employee self-examination includes the following seven items: performance of work results, degree of due diligence, knowledge and skills, degree of team cooperation, negotiation skills, communication and coordination skills, and degree of job desire. In addition, employees with supervisor roles are charged with self-evaluation of their leadership management capabilities.
  - Present post review and development
  - Establishment of individual's goal for next year

4. Environmental Protection

The greenhouse effect has caused global warming, and the issue of environmental protection has received considerable attention year after year. The company is working hard to reduce energy consumption and prevent pollution on the subject of energy conservation and environmental protection.

4.1 Energy Consumption

The company is a new drug development company and its energy consumption consists of the following three areas:

- Energy consumption for drug development (direct)

  The direct energy consumption for the development of new drugs is mainly composed of two parts: one part is the energy consumption needed to develop the new drug itself, including the energy consumption for infrastructure of the drug manufacturing; the other part is the energy consumption for relevant preclinical trials, animal experiments and human clinical trials during the new drug test process .

- Energy consumption of logistics operations (indirect)

  It is mainly the energy consumption of transporting medicines via various ways, such as aviation, railways, highways, etc., as well as storage, custody, loading and unloading, and handling during the transportation.

- Staff commuter transport

  More than half of the employees commute to work by means of public transportation or riding a bicycle.

- Energy consumption of corporate internal operating processes (indirect)

  The energy consumption of the company's internal operating processes is mainly the consumption of water (municipal water supply), electricity, paper, and personnel travel. These energy consumption are related to daily management, information and operation.

Water and electricity statistics for calendar year 2015-2017

Unit: cubic meters/KWH

	2015	2016	2017
Water Consumption	877	953	899
Electricity Consumption	62,004	62,871	62,975

Since PharmaEngine's business model is based on an international strategic alliance, it seeks new drugs in the clinical stage and introduces them into Asia for development. This is the so-called "No Research, Development Only, NRDO" and "Networked Pharma" (out-source) model. Using this model can reduce the company's risk, increase the success rate of new drug development, accelerate the launch of new drug products, and achieve a win-win result with licensing partners. Therefore, the company mainly delegates the new drug development and logistics to its international partners, and handles related project planning and management on its own. As a result, the energy consumption is chiefly indirect consumption for internal operating process.

4.2 Pollution Prevention

The company is located in Taipei City, which is not an ecological reserve or habitat and has no factory. It will not affect the ecology of conserved animals, and does not violate the environmental protection laws and major leakages. There is no hazardous waste output as defined by the Basel Convention.

Due to the operating characteristics, the company does not need to consume too much electricity and water. The main source of pollution in the company's operations is general domestic wastewater discharge and waste. In terms of the discharge of general domestic wastewater, there is no recycling and reuse. Instead, the domestic wastewater is discharged into the sewage sewers in Taipei City, and then discharged into the sewage treatment plant. In terms of waste disposal, the generated domestic waste is classified into two major categories by waste classification:

- Recyclable garbage:
  - Flatten categories (newspapers, photocopying papers, magazines, etc.) and stereoscopic categories (all types of bottles, glass, iron, aluminum, etc.) are centralized by the building and commissioned to recycling companies for handling.

- Wastes with reuse value of resource, such as scrapped computer equipment, are collected and sent to the recycling companies for disposal or commissioned to public welfare units to be donated to vulnerable groups.
- Kitchen wastes are centralized by the building and commissioned to recycling companies for handling.

- Non-recyclable garbage: general household wastes are centralized by the building and transported for disposal.

The company does not have significant environmental capital expenditure due to its operating characteristics. According to the data provided by the Bureau of Energy, Ministry of Economic Affairs and the Taipei Water Department, the total carbon dioxide emissions in 2017 were 33.38 metric tons, and the per capita carbon dioxide emission was 1.28 metric tons. Compared with the previous year, the per capita carbon dioxide emissions decreased by 4.5%; it is expected that the per capita amount of carbon dioxide emissions will be reduced by more than 5% per year. There are no statistics for other greenhouse gases such as CH4, N2O, HFCs, etc. The household wastes are centralized by the building management center, and there is no statistical data.

2015-2017 CO2 emissions statistics

Unit: Metric tons

	2015	2016	2017
Total carbon dioxide emissions	32.4	33.3	33.38
Per capita CO2 emissions	1.71	1.34	1.28

In 2017, the company was not penalized by environmental agencies or involved in pollution disputes due to environmental pollution.

4.3 Energy Conservation

Energy Saving, Waste Reduction and Utilization of High Efficiency and Renewable Energy Measures

- Preclinical trial design:

  For the company's preclinical trials, the number of trial groups in the trial design follows the industry-accepted trial plan, and the number of experimental animals in each group is optimally designed, and the minimum number of statistically significant groups can be achieved as much as possible. The number of experimental animals was designed to complete pre-clinical trials and avoid unnecessary numbers of experimental animals in order to achieve efficient operations such as effective manpower and material management.

- Production process and analytical/test methods designs:

  In the design of production process and analytical methods, the company considers the use of repeatedly reusable materials such as glass or stainless steel, applied to test equipment or production equipment, and minimize the use of disposable (one-off use) equipment and facility in order to achieve reducing waste, saving materials, and other effective management of production operations.

- Office energy saving and environmental protection:
  - Some of the lamps were changed to LED lighting to save energy and achieve power saving.
  - The air-conditioning system is under the unified control of the building, and is on at regular office hour and off after work.
  - The lighting equipment was off regionally during the lunch break and completely closed after office hours.
  - The office was decorated with plants to reduce the carbon dioxide emissions.
  - Energy efficiency and reduced carbon dioxide emissions can be achieved by using the "Energy Conservation" certified office machines.

5. Community Participation

The company is based on the concept of “from the society, give back to the society” to encourage employees to participate in various social charity and volunteer activities, to generate deeper care and learn to offer care for people. These public welfare activities can bring about joy and motivate the spirits of consolidation and cooperation back to workplace.

5.1 Social Service Activities

- **"China Andrew Charity Association" supplies raising and organizing activities on September 22, 2017**

The China Andrew Charity Association was established at the end of 2011. It is mainly aimed at promoting the "Andrew Food Bank" program to receive donations from all walks of life to provide "food packages" to take care of vulnerable children. On the day of volunteer service, colleagues performed supply handling, sorting, and partial packaging.

On the day of volunteer service, colleagues performed supply handling, sorting, and partial packaging.

Before getting involved in volunteer services, we learned about the Andrew Charity Association and got to know that there was a huge monthly demand for supplies. PharmaEngine thus called on our internal staff to speak for the vulnerable children. Based on the long-term needs of Andrew Food Bank project, we volunteered to donate and purchase 192 boxes of rice and 140 boxes of ready-to-eat meat parcels to solve some of the shortfalls in supply for children in the second half of the year.

PharmaEngine initiated a supply-raising campaign. Our colleagues donated and purchased 192 boxes of rice and 140 boxes of ready-to-eat meat parcels in total.

5.2 Impact of Operations on the Community

The company maintains good public relations with government agencies, local agencies, news media, investors, etc., and forms a positive cycle. It also strives to be a good neighbor with employees of other companies and residents in the neighborhood. There are no significant or potential negative impacts on local communities by its operating activities.

- **Social participation activities over the years**

Year	Activity
2011	CSR Report, Street Invoice Raising - Hope Foundation for Cancer Care
2012	CSR Report, 2012 Clean Up The World - Clean the Earth and and Protect Taiwan's Environment
2013	CSR Report, Jinshan Guoshengpu Beach - Clean up the Beach Activity
2014	CSR Report, Support for Visually Impaired Care Foundation, Farmland Consolidation and Habitat Maintenance, by Sankeng Friendly Farming
2015	CSR Report, Support for Visually Impaired Care Foundation, engaged in coastal cleanup activity "North Coast and Guanyinshan National Scenic Area - Linshanb
2016	CSR Report, Support for Visually Impaired Care Foundation, Street Invoice Raising - Sunshine Social Welfare Foundation
2017	CSR Report, Support for Visually Impaired Care Foundation, Supply Donation and Volunteer Service - China Andrew Charity Association

2015 Clean up the Beach Activity

2016 Street Invoice Raising

5.3 Participation of Public Associations and External Initiatives

Participation of Public Association

- Taiwan
  - Taiwan Research-based Biopharmaceutical Manufacturers Association (TRPMA): The company is a member of the TRPA. In addition to regularly participating in professional courses organized by the association to promote related knowledge, more importantly we hope to play an important role in the industrial chain cooperation between Taiwan and the world in the process of new drug R&D with its industry experience.
  - Taiwan Clinical Research Association (TCRA): The company is a member and a member of the Supervisory Board. Apart from regularly participating in the monthly meetings organized by the Association, it also shares its experiences with others in the Association; and implements the R&D of clinical trials of new drugs in Taiwan. At the same time it also connects with the international development for global testing.

- Overseas: The company has participated in the annual seminars organized by the American Society of Clinical Oncology (ASCO) and the American Society of Clinical Oncology Gastrointestinal Cancers (ASCO GI) Symposium and published its briefing and clinical trial data. By participating in these international conferences, not only the company can conduct academic exchanges with professionals and share important medical information, it can also enhance its international visibility.

External initiatives

At present, there are no economic, environmental and social regulations, principles, or other initiatives that have been signed by the company and formulated externally.

6. About the Report

6.1 Description of the Report

The company has been deeply aware of its integrity management and social responsibility as an enterprise management principle and core value that is recognized by the international community. To enable related stakeholders to understand more about the company, PharmaEngine has issued its first 2011 Corporate Social Responsibility Report in 2012. This has been the seventh consecutive year, and the company commits to continually issuing its corporate social responsibility reports, fully disclosing its great efforts in fulfilling its social responsibilities, and this serves as a practical way for PharmaEngine to continuously strive for achieving its integrity management and social responsibility.

- **Report Content and Guidelines for Follow-up**

This report is prepared by the company in an integrated manner and is presented in traditional Chinese. The publication cycle is once a year and is based on the core options of the GRI Standards proposed by the Global Sustainability Standards Board (GSSB) for compilation. The information covers various units of the company.

- **Report period and disclosure release**

The 2017 CSR annual report disclosed the period from January 1, 2017 to December 31, 2017. As part of the plan was for the medium- and long-term project, therefore it contained earlier information.
In order to implement environmental protection, only an electronic version of the announcement is available. Please download the pdf file from the official website http://www.pharmaengine.com.

Release date of this report: March 22, 2018

The entities included in the consolidated financial statements

- The company included all subsidiaries in the consolidated financial report. Subsidiaries are included in the consolidated financial report from the date the company obtains control, and the merger ceases on the date of loss of control.
- The PharmaEngine Europe Sarl is included in the consolidated financial report from 2015.

Information recompilation and report change

Compared with previous reports, this report has no significant changes in the scope of the categories and themes, and there is no recompilation of information.

Feedback

If you have any questions about 2017 PharmaEngine Inc.'s Corporate Social Responsibility Report, you are welcome to contact us and help us continue to improve.

Contact us

For information on this report or related social responsibility activities, please contact:

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Tel: 886-2-2515-8228

Significant difference between the reporting options and previous reports

Report year	Basis of Compilation	Date of issuance
2011	The company proposes	March 8, 2012
2012	The company proposes	March 26, 2013
2013	The third generation of GRI's Sustainability Reporting Guidelines (GRI G3 Guidelines)	March 19, 2014
2014	The fourth generation of GRI's Sustainability Reporting Guidelines (GRI G4 Guidelines)	March 19, 2015
2015	The fourth generation of GRI's Sustainability Reporting Guidelines (GRI G4 Guidelines)	March 24, 2016
2016	The fourth generation of GRI's Sustainability Reporting Guidelines (GRI G4 Guidelines)	March 7, 2017

External assurance / Assurance

The financial data disclosed in this report refers to the audited financial statements by the accountants, but no external certification procedures have been obtained.

6.2 Global Reporting Initiative (GRI) Standards Content Index

Global Reporting Initiative Indicators GRI Standards Comparison Table - Core Options

Disclosed●

GRI guideline titles	Disclosed item number	Disclosed item title	status	Section index	Page
General disclosure	102-14	Decision maker's statement	●	Statement from the General Manger & CEO of the Organization	3
General disclosure	102-1	Name of Organization	●	1 Company Organization and Operation	6
General disclosure	102-2	Events, Brands, Products and Services	●	1.1 Company Profile	6
General disclosure	102-3	Headquarters	●	1.1 Company Profile	7
General disclosure	102-4	Bases of Operation	●	1.1 Company Profile	7
General disclosure	102-5	Nature of ownership and legal form	●	1.1 Company Profile	8
General disclosure	102-6	Market served	●	1.1 Company Profile	9
General disclosure	102-7	The scale of the organization	●	1.1 Company Profile	7
General disclosure	102-8	Information of employees and other workers	●	3.1 Composition of Employees	41
General disclosure	102-41	Group Agreement	●	3.1 Composition of Employees	41
General disclosure	102-9	Supply Chain Aspect	●	1.3 Company Operation	13
General disclosure	102-10	Major changes to organizations and other supply chains	●	1.3 Company Operation	17
General disclosure	102-11	Precautionary principles or guidelines	●	2.7 Risk Assessment and Crisis Management	37

General disclosure	102-12	External initiatives	●	5.3 Participation of Public Associations and External Initiatives	60
General disclosure	102-13	Association membership	●	5.3 Participation of Public Associations and External Initiatives	59
General disclosure	102-45	The entities included in the consolidated financial statements	●	6.1 Description of the Report	61
General disclosure	102-46	Defining report content and subject boundary	●	2.4 Important Topics and Stakeholder Communication	29
General disclosure	102-47	Major subject list	●	2.4 Important Topics and Stakeholder Communication	29
Management Approach	103-1	Explain major subjects and their boundaries	●	2.4 Important Topics and Stakeholder Communication	29
General disclosure	102-48	Recompilation	●	6.1 Description of the Report	61
General disclosure	102-49	Report changes	●	6.1 Description of the Report	61
General disclosure	102-40	Stakeholder groups	●	2.4 Important Topics and Stakeholder Communication	30
General disclosure	102-42	Identify and select interested parties	●	2.4 Important Topics and Stakeholder Communication	30
General disclosure	102-43	Policy for Communicating with Stakeholders	●	2.4 Important Topics and Stakeholder Communication	30
General disclosure	102-44	Key subjects and concerns raised	●	2.4 Important Topics and Stakeholder Communication	19
General disclosure	102-50	Reporting period	●	6.1 Description of the Report	61
General disclosure	102-51	Date of the last report	●	6.1 Description of the Report	63
General disclosure	102-52	Reporting cycle	●	6.1 Description of the Report	61

General disclosure	102-53	Contacts who can answer reports related questions	●	6.1 Description of the Report	62
General disclosure	102-54	Declaration in accordance with the GRI guidelines	●	6.1 Description of the Report	61
General disclosure	102-55	GRI content Index	●	6.2 Global Reporting Initiative (GRI) Standards Content Index	64
General disclosure	102-56	External assurance / Assurance	●	6.1 Description of the Report	63
General disclosure	102-18	Governance Structure	●	2.1 Corporate governance	18
General disclosure	102-16	Values, Principles, Standards, and Codes of Conduct	●	1.2 Corporate Culture, Vision and Strategy 2.2 Ethical Corporate Management and Ethical Code	10 25
Management Policy	103-2	Management policy and its elements	●	2.4 Important Topics and Stakeholder Communication	28
Management Policy	103-3	Management policy assessment	●	2.4 Important Topics and Stakeholder Communication	28

Global Reporting Initiative GRI Standards Comparison Table - Non-Core Options

Disclosed●

GRI guideline titles	Disclosed item number	Disclosed item title	status	Section index	Page
General disclosure	102-26	The role of the highest governance unit in setting purposes, values and strategies	●	Statement from the General Manger & CEO of the Organization	3
General disclosure	102-30	The effectiveness of the risk management process	●	2.7 Risk Assessment and Crisis Management	36
General disclosure	102-35	Remuneration policy	●	2.1 Corporate governance	21
General disclosure	102-36	Compensation decision process	●	2.1 Corporate governance	21
General disclosure	102-38	Annual total compensation ratio	●	3.4 Employee Welfare Programs	46
General disclosure	102-17	Ethics-related recommendations and mechanisms of concern issues	●	2.2 Ethical Corporate Management and Ethical Code 2.3 Anti-Corruption Policy	25 26
Economic performance	201-4	Financial assistance from the government	●	1.3 Company Operation	16
Market presence	202-1	Standard-to-Local-Minimum-Salary Ratio for Entry-Level of Different Genders	●	3.4 Employee Welfare Programs	47
Energy	302-1	Energy consumption within the organization	●	4.1 Energy Consumption	53
Energy	302-2	Energy consumption outside of the organization	●	4.1 Energy Consumption	53
Water	303-1	Total water withdrawal by source	●	4.2 Pollution Prevention	54
Biodiversity	304-1	The operational bases owned, leased, managed by the organization, or their neighboring areas are located in environmental protection areas or other areas with high biodiversity value	●	4.2 Pollution Prevention	54
Biodiversity	304-2	Activities, products and services, significant impact on biodiversity	●	4.2 Pollution Prevention	54

Emission	305-1	Direct (Scope 1) Greenhouse Gas Emissions	●	4.2 Pollution Prevention	54
Emission	305-5	Reduction of Greenhouse Gas Emissions	●	4.2 Pollution Prevention 4.3 Energy Conservation	54 56
Wastewater and waste	306-1	Water discharge by quality and destination	●	4.2 Pollution Prevention	54
Wastewater and waste	306-2	Total weight of waste by type and disposal method	●	4.2 Pollution Prevention 4.3 Energy Conservation	54 56
Wastewater and waste	306-3	Severe leakage	●	4.2 Pollution Prevention	54
Wastewater and waste	306-4	Waste transportation	●	4.2 Pollution Prevention	54
Wastewater and waste	306-5	Water bodies affected by release water and other (surface) runoff discharges	●	4.2 Pollution Prevention	54
Environmental protection	307-1	Violation of environmental regulations	●	4.2 Pollution Prevention	54
Employment	401-1	New employees and departing employees	●	3.1 Composition of Employees	41
Employment	401-2	Benefits for full-time employees	●	3.4 Employee Welfare Programs	46
Employment	401-3	Parental Leave	●	3.1 Composition of Employees	42
Occupational safety and health	403-2	Type of injury, rate of injury, occupational disease, number of days lost to work, absenteeism, etc., and number of work-related deaths	●	3.3 Safe and Healthy Working Environment	46
Occupational safety and health	403-3	Workers with high incidence and high risk of diseases related to their occupation	●	3.3 Safe and Healthy Working Environment	46
Training and education	404-1	Average Hours of Training Accepted by Each Employee Per Year	●	3.2 Employee Career Development	44
Training and education	404-2	Enhance staff functions and transition assistance programs	●	3.2 Employee Career Development 3.4 Employee Welfare Programs	42 46
Training and education	404-3	Percentage of employees who regularly receive performance and career development checks	●	3.7 Preformance Review and Career Development	52
Employee Diversity and Equal Opportunities	405-1	Diversification of governance units and employees	●	3.1 Composition of Employees	41

Non-discrimination	406-1	Incidents of discrimination and corrective actions taken by the organization	●	3.6 Human Rights Protection	51
Child labor	408-1	Major risks of using child labor at operational locations and by suppliers	●	3.6 Human Rights Protection	51
Forced or compulsory labor	409-1	Operational sites and suppliers with significant risks of forced and compulsory labor events	●	3.6 Human Rights Protection	51
Aboriginal rights	411-1	Incidents involving violation of Indigenous rights	●	3.6 Human Rights Protection	51
Local Communities	413-2	Operating activities with significant actual or potential negative impacts on local communities	●	5.2 Impact of Operation on the Community	58
Anti-corruption	205-1	Operating sites that have conducted a risk assessment of corruption	●	2.3 Anti-Corruption Policy	27
Anti-corruption	205-2	Communication and training on anti-corruption related policies and procedures	●	2.3 Anti-Corruption Policy	27
Anti-corruption	205-3	Confirmed incidents of corruption and actions taken	●	2.3 Anti-Corruption Policy	27
Public policy	415-1	Political contributions	●	2.2 Ethical Corporate Management and Ethical Code	25
Anti-competitive behavior	206-1	Legal actions of anti-competitive behavior, antitrust and monopoly practice	●	2.2 Ethical Corporate Management and Ethical Code	26
Social and Economic Compliance	419-1	Violation of laws and regulations in the social and economic fields	●	2.2 Ethical Corporate Management and Ethical Code	26
Customer Health and Safety	416-2	Violations of health and safety regulations concerning products and services	●	2.5 Customer Relations	34
Marketing and labeling	417-2	Failure to comply with product and service information and labeling regulations	●	2.5 Customer Relations	34
Marketing and labeling	417-3	Failure to comply with regulations related to marketing communications	●	2.5 Customer Relations	34
Customer privacy	418-1	Total number of substantiated complaints regarding breaches of customer privacy or losses of customer information	●	2.5 Customer Relations	34