



1. Application Begins for Self-Determined Reduction Plans Alongside Carbon Fee System

The carbon fee system has been launched officially this year. *The Regulations Governing the Collection of Carbon Fees* (碳費收費辦法) specify that those subject to carbon fees are required to determine their greenhouse gas (GHG) emissions in 2025 by May 2026 and pay the fees accordingly. MOENV, revealed that a survey indicated that nearly 80% of those subjects to carbon fees are willing to propose their specified reduction goals by 2030 and apply for self-determined reduction plans to qualify for the premium rates of NT\$50 or NT\$100 per metric ton of CO₂e. The MOENV pointed out that, according to the *Regulations Governing Self-Determined Reduction Plans* (自主減量計畫管理辦法), enterprises are to file applications of self-determined reduction plans by 30 June 2025 in order to become eligible for the premium rates when registering and paying the 2025 carbon fees in 2026.

Not aiming for a financial purpose, the carbon fee system is a tool to encourage CO₂ reduction. Instead of increasing the government's revenues, the MOENV aims to accelerate carbon reduction and facilitate industrial transitions through the specified reduction goals by 2030 and self-determined reduction plans proposed by those subjects to carbon fee collection. To help them familiarize themselves with the carbon fee system, a total of 12 meetings, both individually and jointly with the Ministry of Economic Affairs (MOEA), were organized with nearly 4,000 people attending in person or online. MOENV mentioned that they have begun to take in applications of self-determined reduction plans. Those subject to carbon fees are to register a user account at the Carbon Fee Collection System Management Platform (碳費徵收系統管理平台) and upload information regarding their self-determine reduction plans onto the platform before filing the applications to the MOENV.

The MOENV expressed that they will put together a review board by inviting the central industry competent authorities to conduct reviews on self-determined reduction plans according to the Regulations Governing Self-Determined Reduction Plans. If necessary, experts will be hired to help with the reviews. The decision of approval or not will be finalized based on review results within three months. The MOENV has simultaneously also started selecting members for the review board, which will have a meeting every month in principle based on application progresses of self-determined reduction plans.

In addition, the MOEA added the energy conservation and carbon reduction as investment tax credits in the *Statute for Industrial Innovation* (產業創新條例) to reduce the investment burdens for those implementing self-determined reduction plans. A consultation mechanism has been initiated to provide professional industrial

and technical consultation and guidance, helping business apply for self-determined reduction plans and become eligible for premium rates. This is to reduce impacts of carbon fee collection on development of Taiwan's industries and ensure their edges in the international competitions while they achieve substantial reduction.

2. MOENV Promulgates *Prohibited or Restricted Types of HFCs for Manufacture, Import, Export, Sale, Use or Emission* and Management HFCs Regulations to Align with international conventions

Hydrofluorocarbons (HFCs), substances of high global warming potentials (GWP), have been added in the Kigali Amendment of the Montreal Protocol. To stay in line with the Protocol, the MOENV promulgated the *Prohibited or Restricted Types of Hydrofluorocarbons for Manufacture, Import, Export, Sale, Use or Emission* (禁止或限制製造、輸入、輸出、販賣、使用或排放之氫氟碳化物種類) and announced the *Management Regulations for Hydrofluorocarbons* (氫氟碳化物管理辦法) on 25 February 2025. Approval for importing or exporting is required for 18 types of pure HFCs and their mixtures starting from 1 July 2025, and HFC consumption is frozen from 2026 and will be reduced in stages from 2029 as part of international efforts to mitigate global warming.

The MOENV indicated that HFCs are used primarily in, for example, refrigeration equipment, electronics washing, industrial processes, firefighting equipment and material foaming. These are common chemical substances in place of hydrochlorofluorocarbons (HCFCs) that are known for destruction to the ozone layer. HFCs do not cause destruction to the ozone layer but have GWPs. Some HFCs' GWPs are even more than 10,000 times that of CO₂. That is why the Kigali Amendment was approved in Montreal Protocol MOP-28, listing HFCs as controlled substances under the Protocol. This is in hopes that all parties restrict HFC manufacture, import and export and that restrictions on HFC consumption (i.e., manufacture quantity + import quantity – export quantity) are carried out in stage in developed and developing countries, respectively, to gradually reduce the use of HFCs.

So far, more than 160 countries and regions have submitted the approval documents for the Kigali Amendment and committed to complying with its reduction schedule and control regulations. As a responsible citizen of the planet, the MOENV has taken the initiative to follow the international protocol and promulgated the *Prohibited or Restricted Types of Hydrofluorocarbons for Manufacture, Import, Export, Sale, Use or Emission* according to Article 38 of the *Climate Change Response Act* (氣候變遷因應法), listing 18 types of pure HFCs and their mixtures for monitoring for control. The Management Regulations for Hydrofluorocarbons were announced as well. Major focuses are summarized below:

- I. Compliance with the control regulations under the Kigali Amendment of the Montreal Protocol: The MOENV has set Taiwan's consumption baseline at 24,523,864.2 metric tons CO₂e as well as specified reduction rates and schedules

for each stage.

II. Specification of Taiwan's policies and measures for HFCs control:

1. Control items and effective dates: Manufacture is prohibited from now on, and export or import without approval is prohibited from 1 July 2025.
2. Schedule for allocation application: Applications for 2025 allocation are to be submitted to MOENV by the end of March 2025; after that, applications for next year's allocation are submitted to MOENV by the end of every July.
3. Equation for calculating allocation: The 2025 allocation is sum of the average annual Implementation Records from 2020 to 2022 and 65% of that from 2009 to 2010. From 2026 onwards, the allocation is determined by the percentage of total national consumption quantity of the sum of 50% of the Implementation Record of the previous year and the Implementation Record for the first half of the current year.
4. Allocation principle: with 15% of the consumption limit as the national reserve, the allocation goes to users first and then to suppliers.

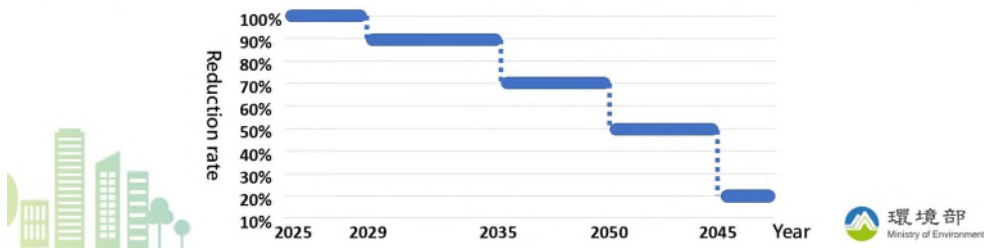
The quantity of raw materials used in the manufacturing process is not included in consumption, but documents issued by the MOEA's Industrial Development Administration are required to prove its use.

5. Report requirements: Entities eligible for allocation or holding Allocation Quotas shall report the Implementation Record of previous season to the MOENV by the end of every January, April, July and October. The season's Implementation Record is considered zero for failure to report by the given deadlines and provide the missing information afterwards. An entity with zero Implementation Records for eight consecutive times is no longer eligible for allocation and will have its Allocation Quota not implemented for the current year deducted.

The MOENV stated that the promulgation of two HFCs control regulations this time is Taiwan's determination to comply with international protocols and will gradually lower Taiwan's HFCs consumption and, thus, achieve the goal of substantial GHG reductions through enforcing control measures on high-GWP GHGs. The MOENV will organize meetings on the HFCs allocation system to help enterprises business understand application process of obtaining allocation eligibility and quote and relevant required documents.

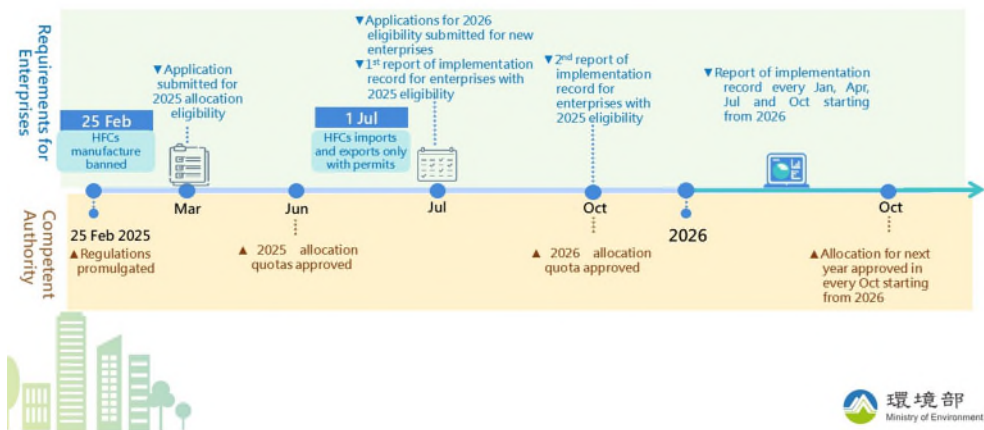
Taiwan' s HFCs Reduction Schedule

- Taiwan' s consumption baseline: 24,523,864.2 metric ton of CO₂e
 - 2026~2028: Annual national consumption < consumption baseline
 - 2029~2034: Annual national consumption < 90% of consumption baseline
 - 2035~2039: Annual national consumption < 70% of consumption baseline
 - 2040~2044: Annual national consumption < 50% of consumption base
 - 2045 onwards: Annual national consumption < 20% of consumption base
- Consumption = production + import - export



Taiwan's HFCs reduction schedule

Taiwan' s HFCs Reduction Schedule



Taiwan's HFCs control schedule

3. MOENV Addresses Concerns of Rising Prices of Renovation Waste from March

There has been reports that “Designers Worry About Price Increase for Mandatory Registration for Renovation Waste Removal and Clearance from March.” Regarding this, the MOENV explained as follows:

Interior renovation projects involve short project schedules, multiple job sites and difficulty keeping track of indoor renovation. In response to these features, the MOENV has set up a mechanism of registration by clearance and removal enterprises and confirmation by receiving enterprises to track whereabouts of renovation wastes and lower risks of illegal dumping. Registration is much simpler than before without additional costs to these enterprises.

Wastes are generated from either interior project in newly built but unfurnished

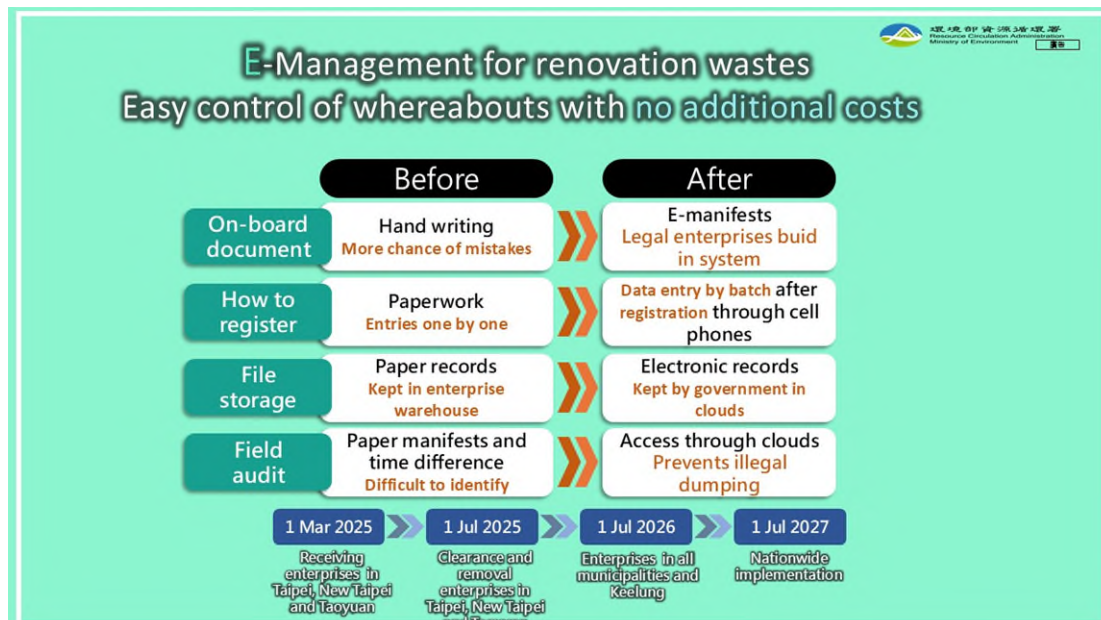
properties or renovations in pre-owned, older ones. It does not matter if an interior designer, turnkey contractor or carpenter is commissioned, most renovation wastes are disposed by a disposal enterprise except the rare occasions where property owners dispose of it themselves. The registration system now has a built-in option for direct selection of legal enterprises. Information is kept in the cloud from the moment removal enterprises complete registration, then receiving enterprises enters the actual weight once they confirm having received the waste. It ensures that renovation waste enters legal disposal channels, thus reducing the risk of illegal dumping.

I. Easier registration before without additional costs to enterprises

The MOENV explained that waste clearance, removal, and receiving enterprises previously had to have their staff type out a paper document recording where their trucks would collect waste and where the wastes were delivered to. Truck drivers were to take the document along the ride and then bring it back to the office where the staff would enter all data into their business records. Now with registration digitized, clearance and removal enterprises are just key in the content of the previous paper document with computers or cell phones, and receiving enterprises click in the system to confirm the weight received, storing the data entry in the cloud. There is no need to keep the paper documents or bring them back to the office or enter data one after another. The declaration can be made using a cell phone or computer, making it much easier for enterprisers who must work outside their offices.

II. Initial implementation in Taipei City, New Taipei City and Taoyuan City, and then phasal promotion in different areas

The MOENV pointed out that it has announced the amended Article 6-2 of the *Regulations Governing General Waste Recycling, Clearance and Disposal* (一般廢棄物回收清除處理辦法) and Item 8-1 of the *Registration Format, Item, Content and Frequency Concerning Online Registration of Waste Generation, Storage, Clearance, Disposal, Reuse, Export and Import* (以網路傳輸方式申報廢棄物之產出、貯存、清除、處理、再利用、輸出及輸入情形之申報格式、項目、內容及頻率) on 3 January 2025. Such revisions on renovation waste registration were the results of discussions with enterprises in 13 meetings. Stage 1 started on 1 Mar 2025 in Taipei City, New Taipei City and Taoyuan City. The actual details of receiving wastes shall be registered online within a day after they are received. The mandatory registration will be promoted in stage in different areas. It aims to ensure real-time controls of whereabouts and amount of renovation wastes and delivery to legal disposal sites, Achieving interior renovation and environmental protection.



E-Management for renovation wastes

4. MOENV Holds Hearing on GHG Emission Reduction Goals of Third Stage with New Reduction Pathway Announced

The MOENV held the public hearing on the draft goals for the third regulatory stage of greenhouse gas emissions at the Ministry's multifunctional conference hall on 7 February. It attracted many people to sign up and ended up with nearly 800 participating in person and online. Public opinions were collected over the Climate Talks platform. MOENV and all six relevant departments presented the draft third-stage goals during the hearing, and the public was allowed to be registered to speak. In total, 26 spoke at the hearing in person and 46 online and in writing, all from fields covering NGOs or representatives of young adults, students and businesses. Legal technical consultation boards and experts and scholars specializing in human rights and gender equality were invited to provide their insights. In nearly four hours of presentations and responses from government agencies, an open, transparent and science-based communication and dialogue was done to reach public consensus discuss Taiwan's national reduction goal by 2030 (emission reduced by $28\pm 2\%$ compared to that of 2005), and work together towards net-zero emissions by 2050.

The MOENV mentioned that draft of the third-stage goal was announced on 30 December 2024. It increases Taiwan's GHG emission reduction goal by 2030 from "a $24\pm 1\%$ reduction compared to emission of the base year (2005)", announced as the Nationally Determined Contribution (NDC) in 2022, to "a $28\pm 2\%$ reduction compared to emission of 2005". The ambition revealed in this reduction goal is second only to Japan among all Asian countries. Besides regulatory goals for the six major departments including energy, manufacture, residential and commercial activities, transportation, agriculture, and environment, the regulatory goal of electricity emission coefficient is also proposed, set at 0.319 kg of CO₂e/kWh by 2030, a decrease by approximately 35% as opposed to today's coefficient.

The MOENV stressed that the goal this time is set with science-based estimation. Research and estimation are as explained below:

- I. In the data compilation stage, the National Development Council provided the estimated GDP growth rate of individual domestic industries from 2023 to 2030 and the national population, both as the basis for the estimate. Ministries in charge of the six major departments estimated the GHG emission trends and carried out scenario analysis according to Article 5 of the *Enforcement Rules of Climate Change Response Act* (氣候法施行細則) and submitted the results to the MOENV.
- II. In the expert consultation stage, the MOENV established the expert consultation board according to Article 10 of the *Climate Change Response Act* for an in-depth goal-setting process and consult experts in climate change, energy, and economy or with practical experiences. The minutes of the two meetings held in 2024 and data provided by individual departments have been published on the New National Carbon Reduction Section website, which includes the four detailed steps of estimation by all 6 departments. They are basic scenario analysis (BAU); reduction scenarios, contributions and costs; energy needs in reduction scenarios; and departmental GHG emission estimation and projection.
- III. Finally In the stage of consultation between the ministries, the Net-Zero Team under the National Council for Sustainable Development (NCSA) initiated the cross-ministerial coordination mechanism since the scientific estimation results for the 6 departments failed to reach the 2030 NDC, i.e., a $24\pm1\%$ reduction compared to emission of the base year. The MOENV estimated the possible maximum carbon reduction by 2030 “from top to bottom” based on Taiwan’s Pathway and Strategy to 2050 Net-Zero Emission and the largest development trends of the 12 key net-zero strategies. Then each department optimized their respective key strategies “from bottom to top” before the NCSA’s Net-Zero Team focused on carbon reduction project “from top to bottom” and increased reduction efforts. At the end the third-stage goal was drafted and announced to collect public opinions.

The MOENV invites the public to visit the Climate Talks at <https://www.cca.gov.tw/info/> or New National Carbon Reduction Section at <https://www.cca.gov.tw/affairs/carbon-reduction-targets/2367.html> to comment on the draft of the third-stage goal. The collection of opinions will end on 10 February 2025. The respective ministries will answer the public hearing minutes and public opinions made online or in writing during this period, and these answers will be made available on the websites above in 30 days after the hearing as well as submitted to the Executive Yuan for approval. In addition, the six departments will prepare for the formulation of GHG reduction action plans for the third stage and relevant public hearings to expand collection of public opinions.

5. MOENV Launches Net-Zero Green Lifestyle Alliance to Join Force with Enterprises

MOENV has joined force with the industries to establish the Net-Zero Green Lifestyle Alliance on 18 February in response to the Net-Zero Green Lifestyle. This is part of the effort to achieve Taiwan's 2050 net-zero emission goal and promote the "Create Net-Zero, Sustainable Green Lifestyle", a strategy under the National Project of Hope. More than 20 entities from the industry, academic and research sectors took the initiative to join the alliance and pledged to practice green living. It is hoped to foster net-zero awareness among employees via corporate efforts and at the end encourage the public to practice a net-zero, green lifestyle.

The MOENV Minister Peng Chih-Ming stated in his speech that Taiwan's Project of Hope proposed by President Lai comes with five strategies and one of them is to "Create a Net-Zero, Sustainable Green Lifestyle". On the other hand, every industry and enterprise have its own reasons to lower emissions, and it requires all enterprises and people to jointly make a difference and create a mutually beneficial environment. Through establishment of the Net-Zero Green Lifestyle Alliance, the MOENV expects to, with a spirit of serving others, lead the public treat net zero as a faith of life; introduce energetic green ideas with young people's creativity; turn green living into daily habits through hard working; and with corporate thinking create a market environment of positive cycles so that enterprises are willing to invest and consumers glad to support. The aim is to facilitate the green transition of the entire society and build a green industry ecosystem. By establishing the Net-Zero Green Lifestyle Alliance, the MOENV intends to gather corporations to build a cooperation platform matching green living solutions needs, thus combining efforts from all sides more efficiently.

While explaining the Alliance's operating mechanism, Director General Hung Shu-Hsing of Department of Comprehensive Planning stated that it will continue to monitor the status and needs of industries' green living transition and share the latest trends and information of green living solutions. Enterprises will assist in introducing "lifestyle transition" in daily operations through various measures to build a green work environment and in turn encourage employees to develop environmentally friendly habits and behaviors. The hope is to build a public awareness of sustainability and practice green living through corporate efforts.

There were a series of forums revolving around the Net-Zero Green Lifestyle Alliance with topics involving "green office", "green tourism", green diets" and "green consumption". The first series, "Green Office: Enterprises on the Move and Green Lifestyle at Work", was held on 18 February, with Dr. Yeh Shin-Cheng, professor at National Taiwan Normal University, invited as the forum presenter and host. Professor Yeh mentioned that cheap prices and convenience are the largest hurdle of net-zero, green lifestyle and that it requires formulating measures with incentives and easier for staff to participate during the promotion while considering how to combine technologies to break the barriers of human nature. He shared his experience in promoting green living before having discussions with the other three speakers.

In the speech titled "From Being Moved to Getting Moving – Practice of Corporate Net-Zero Through Sustainable Experiences", CEO Wang Shu-Cheng of Friendly SEED pointed out that, although slow, education is effective and the most useful weapon to change the world. When a seed of being environment-friendly is planted in every one's heart, all consumption behaviors will change from daily life to work. She expects to

help enterprises facilitate internal green efforts through various environmental education.

In his speech titled “Green Office – Carbon Neutrality in An Office Building”, Director Li Shu-Ping of AUO shared actual measures to help the staff practice ideas of green office in their daily routines. Examples include low-carbon diets at the company dining hall, installation of parking spots and charging stations for electric cars, advocate for responsible consumption to enhance employees’ sustainability literacy, reports of carbon footprints provided for work travels, and challenges organized to promote carbon reduction. These are some of the diverse measures to motivate their employees.

Finally, Li Ching-Ju, operation manager of Taipei Fubon Bank, mentioned that sustainability is like a marathon, starting from “developing awareness” to “taking actions”, from “one person” to “a group of people”. Promoting green living among employees must be simple, fun, with incentives and sustainable. A company may start by organizing internal activities to urge all employees to adopt a green lifestyle so that they are willing to choose the “greener” options in aspects, which are food, clothing, residence, transportation, education, leisure and shopping.

With experience sharing and exchanges among enterprises, the Net-Zero Green Lifestyle Alliance will help inspire more innovative thinking and ideas. Tiny changes made by every person will accumulate and become influences that bring sustainability to the environment. All industry sectors and enterprises across Taiwan are invited to join the Alliance, stay tuned for the latest trends and information on green living and the Alliance’s first-hand news, participate in the Alliance’s various events, and match services with green living solutions, together marching toward a beautiful green lifestyle.



Net-Zero Green Lifestyle Alliance brings together industry, academic and research sectors to practice net-zero living



All businesses are invited to join the Alliance



Net-Zero Green Lifestyle Alliance brings together industry, academic and research sectors to practice net-zero living



The MOENV Minister Peng Chih-Ming explains concepts of the Net-Zero Green Lifestyle Alliance



Discussion at the Forum, "Enterprises on the Move and Green Lifestyle at Work"

6. Online Platform Introduced to EIA Meetings to Collect Public Opinions

The MOENV scheduled the 28th environmental impact assessment (EIA) meeting for the upgrade and renovation of Hsieh-Ho Power Plant on 26 February 2025. To break through the EIA meetings' current limitations on venues, time, and space for and allow more people to express their opinions, the MOENV started a trial platform for online comment collection (<https://reurl.cc/RLNdMZ>) for the 28th EIA meeting, in which opinions were collected on the platform. The platform was made available from 12:00 p.m. on 24 February to 12:00 p.m. on the day of the EIA meeting (26 February). Opinions were first compiled and presented at the meeting venue in real time, and Taipower was requested to reply. It is hoped to gather opinions as diverse from as many channels as possible and set up a mechanism to incorporate more

public participation into the decision-making process of the EIA meetings without neglecting public comments simply because they were not there to speak in person. Those concerned of the upgrade and renovation project of Hsieh-Ho Power Plant may visit the MOENV's Environmental Impact Assessment Inquiry System at <https://eiadoc.moenv.gov.tw/eiaweb/> to download and examine the project information.

The MOENV explained that 20 people are allowed at the meeting as observers in principle according to the *Guidelines of the Ministry of Environment for Observing the Environmental Impact Assessment Reviews* (環境部環境影響評估審查旁聽要點). Coordination may be needed to allow representatives with different opinions to observe, and on the day of EIA meeting the presiding chairman may permit entry of more people for observation at the venue with review members' approval based on public attendance. At the task force's sixth preliminary review meeting, the opposition side expressed its reluctance to accept coordination and strongly demanded to let all the people come in and speak. After consulting the chairman and the EIA committee members present, the meeting staff agreed to allow all 60 people who had registered to speak to enter the venue to express themselves, considering that the meeting that day was one for the task force. Following a full day of discussion, the chairman asked the experts and scholars present, also EIA committee members and part of the task force, and they all said that the information was sufficient for decision. Considering the incident above and that many people have expressed themselves as third parties instead of either supporters or opposers, the 28th EIA meeting inevitably had to resort to a fair, open and transparent draw to decide entries of observing community members.

The project's review concluded that "the stage-two EIA shall be conducted", which was announced 6 June 2018. The MOEA transferred this case for review on 13 October 2020, which went on with eight meetings in six years. With public concerns and issues presented in the meetings screened manually and by AI, it shows that so far there have been 937 statements (made by EIA committee members, government agencies, and elected legislators) on nearly 40 issues. Regarding issues such as impacts of coastal reclamation on marine ecosystem and fishery resources, those of building a liquid natural gas (LNG) receiving station on Keelung Harbor's stability and operations, and safety of storage tanks, all committee members have had a thorough understanding and asked Taipower to address these issues of public concern. Taipower has modified the development project based on the committee members' comments accordingly. Originally, the project planned for an 18.6-hectare land reclamation by building dikes just off the existing power plant to install LNG tanks, but now the reclamation has been reduced to approximately 14.5 hectares and moved slightly eastwards to within the harbor of the LNG unloading station as an attempt to avoid the corals at the submerged breakwaters outside of the power plant.

The nature of the EIA committee review is to allow the committee members to make judgments professionally and independently based on the conclusions produced in the task force's preliminary meeting. It is not a public trial, and approval of the project is not decided based on the number of supporters and opposers during the review meetings. As a result, adjustment was made in this meeting for the public expression. People were given the opportunity to express themselves in writing even though they

were not able to enter the meeting venue in addition to the online opinion collection platform. All opinions written on paper or online were immediately presented to EIA committee members for reference and replied by Taipower on the spot. Whether the case receives the EIA approval or is deemed not to proceed, the MOENV respects the professional judgments made by the EIA committee members.



An online platform is introduced in the MOENV's EIA meetings for public opinions to urge public participation

7. NT\$10 billion from National Development Fund to be Guided by “Operating Directives for Strengthening Investment in the Green Growth Net-Zero Industry”

The Ministry of Environment (MOENV) proposed the *“National Development Fund’s implementation project for strengthening investments in the green growth net-zero industry”* (行政院國家發展基金加強投資綠色成長淨零產業實施方案) as part of the goals towards “Green growth and 2050 net-zero emissions” stated in the President’s National Project of Hope. The Directives were approved by the National Development Fund (NDF) on 29 November 2024, including a request for NT\$10 billion to be invested into net-zero sustainable emerging industries. The MOENV collected feedback from the public on details of how the investment project can be executed, then on 4 February 2025 promulgated the *“Operating Directives for Strengthening Investment in the Green Growth Net-Zero Industry, Ministry of Environment”* (環境部辦理加強投資綠色成長淨零產業實施方案作業要點). Meanwhile, a project office and a trust account were established to invite investors via a series of presentations, aiming to start receiving investment applications in Q2 2025.

The MOENV explained that the Operating Directives are based on those of other investment projects under the NDF, specifying details such as the establishment of trust accounts and project offices, investment eligibility, documents required for selection, co-investment principles and procedures, requirements for management

fees and performance bonus payments, supervisory management mechanisms for the investee businesses, obligations and responsibilities placed upon co-investors, and periodical reporting to the NDF.

The MOENV pointed out that more feedback will be collected from venture capitalists, industrial associations and competent authorities, then workshops will be scheduled to accelerate national carbon reduction efforts, improve incentives, enhance feasibility of investments and achieve the goals of green growth and transition to net-zero. By incorporating key suggestions, the mechanism for strengthening the Operating Directives, which aims to incorporate key suggestions, as compared to other NDF projects, is explained as follows:

- I. Investment targets (investees) include non-listed domestic firms engaged in emerging businesses in net-zero and sustainability, and foreign firms with substantial business activities in Taiwan. The total investment amount shall not exceed NT\$150 million for a single company or NT\$100 million for a single investment.**
- II. Regarding co-investments and their proportions, the co-investor shall place its investment together with the dedicated trust account, and the amount shall not be lower than that invested through the account. Also, considering the foundation that has been set for Taiwan's net-zero technology development, six priority investment targets are specified, with the amount of co-investment to be no less than a half the amount invested through the trust account. In addition, if the cooperation is with or entrusted to a central competent authority of the target industry or technology, or it is an investment case for an approved research program, the co-investment amount may be no less than 1/3 of the amount invested through the trust account. Investment recipients may include:**
 1. Investment in the emerging industry of resource circulation.
 2. Investment in the emerging industry of sustainable and forward-looking energy technology development and technical energy storage.
 3. Investment in the emerging industry of energy efficiency improvement.
 4. Investment in the emerging carbon capture and reuse, and negative carbon technology development.
 5. Investment in the emerging industry of digital, low/reduced-carbon technology development.
 6. Investment in the emerging industry of climate change adaptation technology development.
- III. Regarding eligibility of co-investors, the project is designed to attract venture capital for co-investment, as the business ecosystem for start-ups is developing in Taiwan and a variety of incubating entities and accelerators are entering the**

market to help startup businesses in addition to traditional venture capitalists, not to mention financial institutes and legal persons with an investment accelerator. A reasonable number of projects to be invested in by co-investors is established for flexibility of operations. An outstanding co-investor merit system has been developed for co-investors with good investment records, encouraging and incentivizing co-investors to look for appropriate projects to invest in.

- IV. Regarding strengthened functions of the project office, the office provides investment matching services and has resources to provide guidance for emerging net-zero businesses that have funding needs, to help them find much-needed funds or investors. The office also provides connections to financing, marketing, and management professionals, helps to build net-zero and CO₂ reduction expert guidance and consultation mechanisms, and eliminates hurdles that obstruct the commercialization of innovative technologies.
- V. Regarding investment management, visits and evaluations by experts specializing in various fields can be arranged to lower investment risks at the pre-investment stage, depending on the maturity of the business/company being invested in. In the post-investment stage, a management mechanism is established to monitor the business and financial operations of entities invested in, according to category. In addition, participation in board meetings of investee companies is requested to monitor their business operations and strengthen supervisory and management mechanisms.

MOENV added that a project office and a trust fund will be set up, co-investors selected, and presentations organized for a campaign. All interested parties are welcome to join these efforts to develop Taiwan's net-zero innovative technologies and start new green growth for Taiwan.

8. National Environmental Research Academy Signs Cooperation MOU with Water Resources Agency

To improve Taiwan's ability to respond to climate change and build a resilient and sustainable environment, the National Environmental Research Academy, Ministry of Environment (NERA) and the Water Resources Agency, Ministry of Economic Affairs (WRA) signed a MOU on 17 February 2025 to cooperate on studying technologies for climate change mitigation, adaptation and governance. It is hoped that more effective use of scientific research resources will be seen on both sides, to help face the daunting challenges of climate change.

Mr. Tsung-Yung Liu, president of the NERA, indicated that climate change is an ongoing fact. The threats that climate change brings to the environment is a topic of global concern, particularly in Taiwan, where there are high risks of typhoons, floods and earthquakes, and the reason behind national efforts to "reduce CO₂ to save the Earth and adapt to save Taiwan". The Ministry of Environment (MOENV) very seriously considers the potential impacts of extreme weather events. Multilateral and cross-boundary cooperation is crucial, particularly when facing hydrological and

meteorological disasters, and even compound disasters. President Liu pointed out that the WRA, as the competent authority for water resources, has performed well controlling nationwide water resource policy planning, leading the development of water resource technologies and implementing major water resource construction projects. In particular, the WRA and NERA have several emerging areas in common, such as climate change adaptation and environmental governance. The key points for their bilateral cooperation include cross-departmental climate change adaptation, governance and pollution control. At the same time, systematic basin governance planning and quantitative river basin models can be combined with climate risk adaptation measures to achieve the objectives of evidence-based governance.

The NERA continues to strive together with academic and research institutes in Taiwan to cooperate across multiple fields and achieve the policy objectives of “disaster prevention, net zero and adaptation” in one package, to build a resilient and sustainable homeland. This MOU signifies that the NERA may leverage the WRA’s expertise and rich experience in hydrological surveys to cultivate experts to help with adaptation, improve the utilization of cross-departmental resources, enable the development of water resources and environmental protection to complement each other, and create an efficient cooperation model. It can also strengthen the implementation of robust adaptation actions in green growth and 2050 net zero transition strategies.



The NERA and the WRA cooperate on the future of climate change adaptation: Mr. Tsung-Yung Liu, president of the NERA (left), MOENV Minister Peng Chi-Ming (center) and Dr. Chien-Hsin Lai, WRA Director General (right).



Mr. Tsung-Yung Liu, president of the NERA (left), MOENV Minister Peng Chi-Ming (center) and Dr. Chien-Hsin Lai, Director General of the WRA (right), finalize the signing of an MOU between the NERA and the WRA.

9. Findings of 2024 Environmental Protection Expenditures Survey

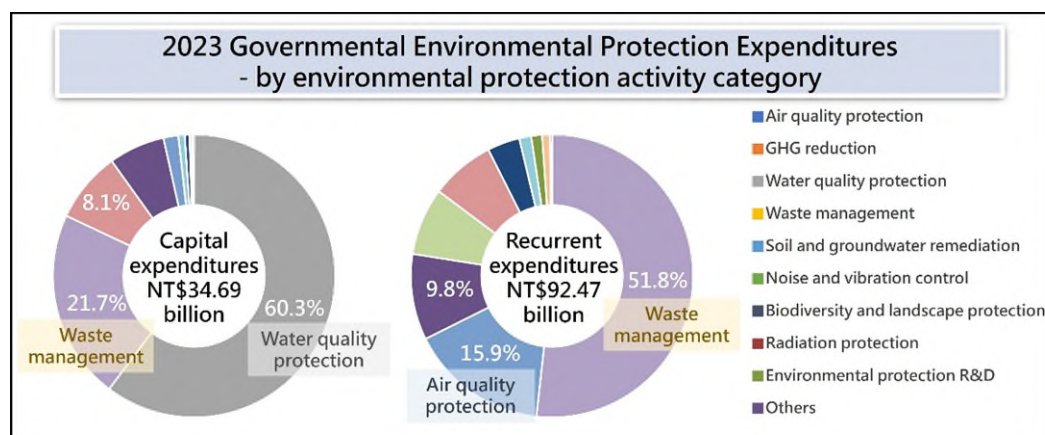
For both economic development and a sustainable environment, the United Nations established the *System of Environmental-Economic Accounting* (環境與經濟帳系統) to evaluate interactions between economic activities and environment. The “*Environmental Protection Expenditure Accounts*” (環保支出帳) aim to provide financial information from environmental protection activities conducted to prevent, reduce or eliminate pollution or other environmental damage and otherwise implement environmental policies. The information to be recorded in the accounts is collected through statistical surveys and existing official data.

Since 2023, the Ministry of Environment (MOENV) has been conducting the “environmental protection expenditure survey on government agencies and the industrial sector”. Based on UN specifications and Taiwan’s conditions, environmental protection activities are grouped into 10 categories: air quality protection; greenhouse gas reduction; water quality protection; waste management; soil and groundwater remediation; noise and vibration control; biodiversity and landscape protection; protection against radiation; environmental protection R & D; and other. The survey was expanded in 2024 in terms of scope and the government agencies covered both the central and local levels, instead of the original 11 central agencies. For the industrial sector, the coverage was expanded to include mining, quarrying, manufacturing without factory registration, and construction businesses, in addition to the previous categories of manufacturing with factory registration, power and gas supply and water supply.

The findings of the 2024 survey (based on data for 2023) revealed that the government spent a total of NT\$127.16 billion in 2023 for environmental protection activities, including NT\$34.69 billion for capital expenditures. Most expenditures were on water quality protection, accounting for 60.3%, followed by 21.7% for waste management. Recurrent expenditure accounted for NT\$92.47 billion, of which the largest proportion, 51.8%, was spent on waste management, followed by 15.9% for air quality protection.

As for the industrial sector, 2023 environmental protection expenditures added up to NT\$206.27 billion, of which the highest proportion, 47.0%, or NT\$76.26 billion, went to air quality protection, followed by 30.7% for water quality protection. Recurrent expenditures were NT\$130.01, most of which went to waste management, accounting for 34.1%, followed by 25.1% for air quality protection and 24.5% for water quality protection.

MOENV has been endeavoring to advance environmental protection policies in recent years. This year's environmental protection expenditure survey clearly indicates that in 2023, governments and industries spent most of their environmental funds on air quality protection, water quality protection and waste management, suggesting these are key areas that impact the quality of the environment and the daily lives of people. MOENV will continue to work together with other government agencies and private organizations to strengthen investment by the industrial sector in environmental protection, mitigate environmental impacts, and create win-win situations for both the economy and the environment.



2023 environmental protection expenditures by governments in Taiwan



2023 environmental protection expenditures by the industrial sector in Taiwan

10. Expanded Public Participation in “AIR 2025: Smart Cities – Sustainable and Clean Air Technology Innovation Forum” Helps Set Future Clean Air Policies

On 24-25 February 2025, the Ministry of Environment (MOENV) held the “AIR 2025: Smart Cities – Sustainable and Clean Air Technology Innovation Forum” in Taipei City. The officials and experts from Japan’s Ministry of the Environment and the South Coast Air Quality Management District (SCAQMD) of California, USA, were invited to share their insights on air pollution management and their experiences in developing AI technology. An in-depth discussion on improving air quality issues of public concern took place to stimulate innovative thinking for the upcoming new white paper on air quality policy.

In his opening speech, MOENV Minister Peng Chi-Ming stated:

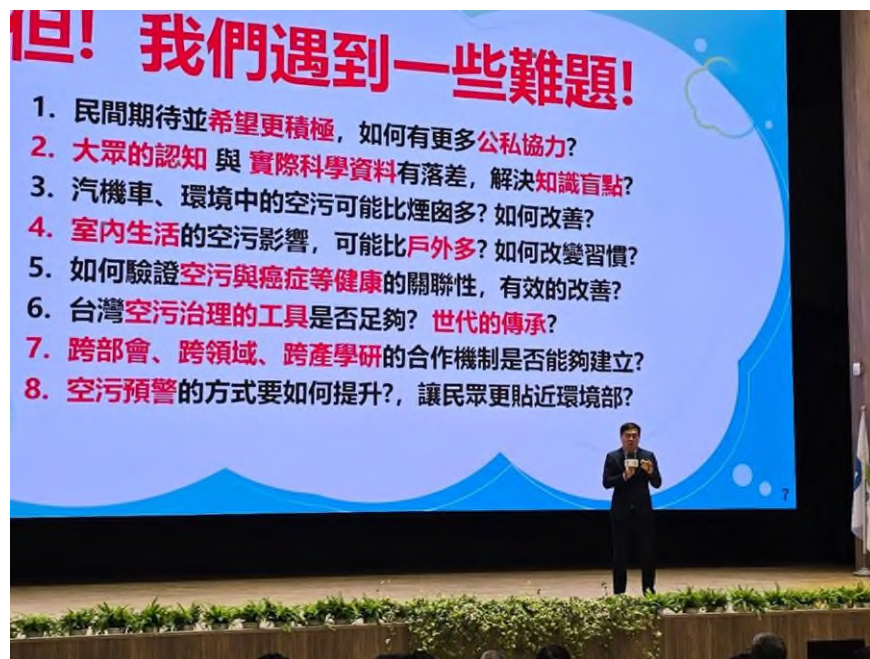
“The 2030 net greenhouse gas emission reduction goal has been established, set at a reduction of $28\pm 2\%$ compared to 2005. The impacts and benefits of CO₂ reduction on air pollution should be assessed, while the target for PM_{2.5} is an annual average concentration of 10 mg/m³ or lower. Changes in people’s habits play an important role. This forum will use “Wishing Well” and “World Café” formats to gather comments, which will show how participants from the public expect better cooperation between government and the private sector. It is also recognized that policies promoted need solid scientific foundations. To respond to these needs, the MOENV will establish an artificial intelligence and data governance center and an air quality monitoring and forecast center to improve air pollution AI environmental governance and move toward sustainable net-zero and intelligent green energy development.”

MOENV pointed out the two major emphases of this forum:

- I. Introduction of new international knowledge:** Officials and experts from Japan and the USA were invited, including Mr. Suki Kuroda of the Environmental Management Division of Japan’s Ministry of the Environment; Mr. Sam Wang, Program Supervisor of SCAQMD; Dr. Greg Carmichael from the University of Iowa; Dr. Johsua Fu from the University of Tennessee; and Dr. Nga Lee (Sally) Ng from the Georgia Institute of Technology. The experts shared their insights on analysis of atmospheric composition, aerosol formation mechanisms, experiences in pollution control and the application of AI technology. The latest technology and policy developments in air pollution governance were discussed to help optimize governance strategies.
- II. Greater public participation:** Based on the comments collected from sessions “Good air wishing well” and “Good air world café”, the MOENV divided the topics for the forum according to four aspects: “air quality management”, “industrial air pollution management”, “transportation air pollution management” and “daily life and fugitive air pollution management”. Experts, civic groups, business representatives and government agencies were invited to focus on and discuss the future blueprint for air quality policy.

The MOENV indicated that comments have been successfully collected through events such as the “Good air wishing well” and the “Good air world café”, and today’s forum was a big step toward converting ideas from the public into solid policies. Looking to the future, the new air quality policy white paper will be composed of serve as the core document guiding third stage air pollution control solutions. Policy performance will be assessed periodically to ensure the continuous improvement of air quality.

MOENV appreciates the input of all who participated and expects the results of this forum will help create a healthier and more livable environment in Taiwan and fulfill a clean air vision for all to share.



Minister Peng Chi-Ming is giving his opening speech at the forum.



The participants of the Smart Cities – Sustainable and Clean Air Technology Innovation Forum held on 24 February 2025.

11. MOENV and Pure Green Foundation Jointly Hold “Green Living and Low-Carbon Diet Workshop”

Climate change is a daunting challenge that the world must deal with today, and the goal of 2050 net-zero emissions and transitions in daily living play an essential role. Every tiny action is the start of change. The Ministry of Environment (MOENV) cooperated with the Pure Green Foundation to hold the “Green Living and Low-Carbon Diet Workshop” on 25 February 2025 in Taipei City. Experts, catering businesses and government representatives were invited to discuss how to promote green living through low-carbon diets.

In his speech at the workshop, MOENV Minister Peng Chi-Ming pointed out that the quantity of meat consumed around the world, including Taiwan, keeps growing, while animal farming creates heavy burdens on lands. The relationship between food and land needs to be seriously considered. If we are to follow the principles of economic, social and environmental fairness and justice without compromising access to food for future generations, excessive use of resources and over-cultivation of land should be avoided in current production, processing, distribution and consumption of food. To ensure food security and biodiversity, the generation of greenhouse gases and food waste needs to be reduced, while water resources need to be efficiently utilized.

Minister Peng went on to say how popularity of sustainable food can be increased by making it taste better. Farmers that provide sustainable food ingredients can be rewarded through public recognition, and chefs who prepare sustainable food can be trained so that they are valued. We can start by promoting sustainable food restaurants and connect them to sustainable food ecosystems, enabling everyone to see the future of the sustainable food market and encouraging more people to support it.

The workshop featured a total of five sessions of speeches and interactions, led by: Director General Hung Shu-Hsing of the Department of Comprehensive Planning; Dr. Wu Chun-Yen of the Chung-Hua Institution for Economic Research; Mr. Yen Hsin-Yung, founder of the Good Food Vegetarian Lab; Dr. Tai Ching-Hua, CEO of Pure Green Foundation, and; Mr. Tien Ting-Feng, chairman of the Green Vegetarian Assessment Committee. From the angles of environmental policy, health science and industrial innovation, multiple perspectives were presented on the challenges and opportunities of low-carbon diets. MOENV shared its ideas on net-zero green living, experts led discussions on practical experiences, catering businesses shared how to create value out of environmental protection, and restaurants shared how to be incorporating green ideas, from the process of coming up with innovative ideas to designing menus to running a restaurant.

Director General Hung added that the “Zero Waste and Low-Carbon Diets” advocated by the government includes encouraging local and in-season food, low-carbon cooking, minimizing waste of food ingredients, carrying one’s own utensils, cherishing food and minimizing leftovers, and choosing environment-friendly places first for dining out. Currently, the MOENV is following the net-zero trend to improve environment-friendly restaurants and is planning a net-zero-transformation catering guide to help

restaurants with their green transition and invite them to take part in a low-carbon lifestyle.

The MOENV has re-dedicated itself to dialogue with the public in recent years. At the “Green Living and Low-Carbon Diet Workshop”, experts from industrial, governmental and academic sectors gathered for in-depth dialogues with private businesses and enterprises, to work together for sustainable development, plant the concept of green living in everyone's minds, and work towards "Net Zero Green Living" together for the Earth.



Minister Peng Chi-Ming of the MOENV explaining the benefits of low-carbon diets



All industrial ecosystems connected with each other in response to low-carbon diets



MOENV Minister Peng Chi-Ming giving his speech at the “Green Living and Low-Carbon Diet Workshop”



Director General Hung Shu-Hsing of the Department of Comprehensive Planning explaining how the MOENV promotes low-carbon policy