SECOND PARTY OPINION

GREEN FINANCE FRAMEWORK

METROPOLITAN WATERWORKS AUTHORITY ("MWA")

Document Title: Second Party Opinion on Metropolitan Waterworks Authority Green Finance Framework
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Location: Bangkok, Thailand
Date: 10/07/2026
Project Number: 10626700
Identification: DNV-2026-ASR-10626700-MWA

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DNV'S INDEPENDENT ASSESSMENT

Scope and Objectives

The Metropolitan Waterworks Authority ("MWA" or the "Customer") is a state enterprise established in 1967 under the supervision of the Ministry of Interior, with a mandate to procure raw water resources, produce, and distribute potable water across Bangkok, Nonthaburi, and Samut Prakan. MWA plays a critical role in supporting urban development, public health, and economic activity by ensuring reliable and high-quality water supply services to a population exceeding eight million people. Its long-term strategic direction emphasises operational resilience, climate adaptation, and sustainable infrastructure development to address increasing water demand and climate-related risks affecting water resources and systems.

In line with its strategic objectives and commitment to environmental sustainability, MWA has established a Green Finance Framework (the "Framework") to facilitate the issuance of green finance instruments, including green bonds and green loans, to finance and/or refinance eligible projects. These projects primarily focus on strengthening climate-resilient water supply systems, enhancing energy efficiency, and supporting renewable energy integration within water operations. The Framework is designed to channel capital toward investments that contribute to sustainable water management, improved resource efficiency, and climate change mitigation and adaptation outcomes, while aligning with the Issuer's broader sustainability strategy. The Framework is in alignment with the stated Principles and Standards (collectively the "Principles & Standards"):

- Green Bond Principles ("GBP"), issued by the International Capital Market Association ("ICMA"), June 2025
- ASEAN Green Bond Standards ("AGBS"), issued by ASEAN Capital Market Association ("ACMF") in October 2018
- Green Loan Principles ("GLP"), issued by the Loan Market Association ("LMA"), Loan Syndications and Trading Association ("LSTA"), and Asia-Pacific Loan Market Association ("APLMA"), March 2025

DNV (Thailand) Co. Ltd. ("DNV") has been commissioned by the MWA to review its Framework and provide a Second Party Opinion on the Framework, based on the Principles & Standards.

Where applicable, reference is also made to eligibility criteria laid down in the following taxonomies:

- ASEAN Taxonomy Version 4 ("AT"), dated 6 November 2025
- Thailand Taxonomy ("TT"), as of May and July 2025

MWA will ensure that any investment listed in this Framework, and intended to be labelled as green will align with either the ASEAN Taxonomy or the Thailand Taxonomy, as applicable.[1]

Our methodology to achieve this is described under 'Work Undertaken' below. We were not commissioned to provide independent assurance or other audit activities.

Responsibilities of the Management of MWA and DNV

The management of MWA has provided the information and data used by DNV during the delivery of this review. Our statement represents an independent opinion and is intended to inform MWA management and other interested stakeholders in the bond as to whether the Green Finance Instruments (GFIs) are aligned with the Principles & Standards. In our work we have relied on the information and the facts presented to us by MWA. DNV is not responsible for any aspect of the nominated assets referred to in this

[1] Meeting with MWA on 12 June 2026

opinion and cannot be held liable if estimates, findings, opinions, or conclusions are incorrect. Thus, DNV shall not be held liable if any of the information or data provided by MWA's management and used as a basis for this assessment were not correct or complete.

Basis of DNV's Opinion

We have adapted our assessment methodology to create the MWA-specific Eligibility Assessment Protocol (henceforth referred to as "Protocol"). Our Protocol includes a set of suitable criteria that can be used to underpin DNV's opinion.

As per our Protocol, the criteria against which the Framework has been reviewed are grouped under the four core components:

1. **Use of Proceeds**
   The Use of Proceeds criteria are guided by the requirement that an issuer of a bond or a borrower of a loan must use the funds raised to finance or refinance or to repay equity of eligible activities. The eligible activities should produce clear environmental and social benefits.

2. **Process for Project Evaluation and Selection**
   The Project Evaluation and Selection criteria are guided by the requirements that an issuer of a bond or a borrower of a loan should outline the process it follows when determining eligibility of an investment using Green Finance proceeds and outline any impact objectives it will consider.

3. **Management of Proceeds**
   The Management of Proceeds criteria are guided by the requirements that an GFI should be tracked within the organisation, that separate portfolios should be created when necessary and that a declaration of how unallocated funds will be handled.

4. **Reporting**
   The Reporting criteria are guided by the recommendation that at least annual reporting should be made of the use of proceeds and that quantitative and/or qualitative performance indicators should be used, where feasible.

No assurance is provided regarding the financial performance of instruments issued via the Framework, the value of any investments, or the long-term environmental benefits of the transaction. Our objective has been to provide an assessment that the Framework has met the criteria established on the basis set out below.

Work Undertaken

Our work constituted a high-level review of the available information, based on the understanding that this information was provided to us by MWA in good faith. We have not performed an audit or other tests to check the veracity of the information provided to us. The work undertaken to form our opinion included:

- Creation of a Protocol, adapted to the purpose of the bond, as described above and in Schedule 3 to this Assessment;
- Assessment of documentary evidence provided by MWA on the bond and supplemented by a high-level desktop research. These checks refer to current assessment best practices and standards methodology;
- Review of published materials by MWA and MWA's website;
- Discussions with MWA's management, and review of relevant documentation and evidence related to the criteria of the Protocol; and
- Documentation of findings against each element of the criteria.

Our opinion as detailed below is a summary of these findings.

Findings and DNV's Opinion

DNV's findings on the alignment with Principles & Standards are listed below:

1. **Use of Proceeds**
   MWA intends to use the net proceeds of the GFIs to finance or refinance in whole or in part any eligible Green Projects.

   The Framework defines the following eligible project categories:

   - Water Supply and Climate Change Adaptation
   - Renewable Energy
   - Energy Efficiency

   DNV undertook an assessment of the associated project types to determine their eligibility as Green and their alignment with the Principles & Standards. DNV concludes that the eligible categories outlined in the Framework are consistent with the categories referenced in the Principles & Standards.

2. **Process for Project Evaluation and Selection**
   MWA has established a cross-functional governance process for project evaluation and selection, led by the Deputy Governor (Finance) and involving key technical and financial departments. Projects are screened against the Framework's eligibility criteria and ESG policies before receiving final approval from the Governor. Annual reviews ensure continued eligibility and proper allocation of proceeds, with ineligible projects replaced as needed. This approach aligns with international principles that emphasise transparent selection processes and effective management of environmental and social risks.

   DNV concludes that MWA's Framework appropriately describes the process for Project Evaluation and Selection.

3. **Management of Proceeds**
   MWA will manage the net proceeds of its Green Finance Instruments using a portfolio approach, with funds deposited in its general funding account and tracked through an internal reporting system overseen by the Finance Department. The issuer aims to ensure that the value of eligible projects matches or exceeds the outstanding proceeds, while unallocated funds are temporarily held in cash or cash equivalents in line with internal policies and excluding prohibited activities. This approach is consistent with international principles requiring transparent tracking and allocation of proceeds to eligible green projects.

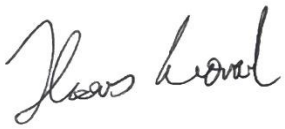
   DNV has reviewed the evidence presented and concludes that the Framework appropriately describes the process for Management of Proceeds.

4. **Reporting**
   MWA commits to providing transparent annual reporting on the allocation and impact of its Green Finance Instruments until full allocation, and thereafter in the event of material changes. Allocation reporting will include details of outstanding instruments, distribution of proceeds by project category, key project descriptions, financing versus refinancing proportions, and any unallocated balance. Impact reporting will disclose, on a best-effort basis, qualitative and quantitative environmental outcomes using relevant indicators and methodologies. This approach is aligned with international best practices that emphasise regular, transparent disclosure of both allocation and environmental impacts.

Based on the limited assurance procedures conducted, nothing has come to our attention that causes us to believe that the Framework is not, in all material respects, in accordance with the Pre-Issuance requirements of the Principles & Standards.

For DNV (Thailand) Co., Ltd.

Bangkok, Thailand / 10th July 2026



Thomas Leonard
Quality Reviewer

Kobrat Chotruangprasert
Lead Verifier

Schedule 1. Description of Categories to be financed or refinanced through the Customer's Green Finance Instruments

Eligible Green Project Categories	Eligible Criteria and Description	DNV Findings
Water Supply and Climate Change Adaptation	Construction, extension, operation, and maintenance of water collection and supply systems and related infrastructure to reduce climate risks and ensure reliable and sufficient water supply for the public. Examples of eligible projects are the Ninth Bangkok Water Supply Improvement project and the Construction Project for Raw Water Reservoir on the East Side. • **ASEAN Taxonomy (Climate Change Adaptation)**: 36[001] Construction, extension and operation of water collection, treatment and supply system	The category is clearly defined and directly aligned with climate adaptation objectives. It supports essential infrastructure resilience and sustainable water management, consistent with internationally recognised green project categories.
Renewable Energy	Installation, operation, and maintenance of solar energy systems and energy storage systems. • **ASEAN Taxonomy (Climate Change Mitigation)**: 351[021] Electricity generation using solar photovoltaic technology • **ASEAN Taxonomy (Climate Change Mitigation**: 351[072] Storage of electricity, including pumped storage • **Thailand Taxonomy– Energy Sector (Climate Change Mitigation)**: 1. Solar energy generation • **Thailand Taxonomy– Energy Sector (Climate Change Mitigation)**: 14. Storage of electricity, thermal energy and low-carbon hydrogen and its derivatives	The eligibility criteria are robust and consistent with recognised taxonomy thresholds for renewable energy. The category contributes to climate mitigation by reducing reliance on fossil-based electricity.
Energy Efficiency	Installation, upgrade, and replacement of equipment, devices, and technologies that enhance energy efficiency in buildings and water supply systems and networks.	The eligibility criteria are robust and consistent with recognised taxonomy thresholds for renewable energy. The category contributes to climate mitigation by reducing reliance on fossil-based electricity.

	• **ASEAN Taxonomy (Climate Change Mitigation)**: 68[003] Energy performance measurement, regulation, control • **Thailand Taxonomy– Construction and Real Estate Sector (Climate Change Mitigation)**: 4. Installation, maintenance, and repair of special-purpose building equipment Note: energy efficiency projects in water supply systems and networks are referenced against the ASEAN Taxonomy Foundation Framework, as the relevant technical screening criteria are unavailable.	Due to the absence of Technical Screening Criteria for energy efficiency projects in water supply systems and networks, Foundation Framework assessment is being applied.

Exclusion Criteria (if relevant)

MWA's financing proceeds shall not be utilised towards the following activities:

- Development, refining, and transportation of fossil fuels (including coal, oil, and gas)
- Fossil fuel power generation
- Nuclear power generation
- Weapons and defence
- Gambling and casinos
- Alcohol and tobacco (excluding beer and wine)
- Activities with forced or child labour
- Production or trade of dangerous chemicals, radioactive materials, or endangered species
- Commercial logging in old growth or primary tropical forests
- Harmful marine or coastal fishing practices

Projects, assets, or expenditures associated with human or labour rights violations or environmental harm are also excluded.

Schedule 2. Contributions to UN SDGs

Eligible Project Categories	UN SDGs	DNV Findings
Water Supply and Climate Change Adaptation	• **SDG 6.4:** By 2030, substantially increase water-use efficiency across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity. • **SDG 11.1:** By 2030, ensure access for all to adequate, safe and affordable housing and basic services, including safe water, and upgrade slums. • **SDG 12.2:** By 2030, achieve the sustainable management and efficient use of natural resources.	DNV is of the opinion that the eligible category outlined in the Framework contributes to the achievement of the UN SDGs.
Renewable Energy	• **SDG 7.2:** By 2030, increase substantially the share of renewable energy in the global energy mix.	
Energy Efficiency	• **SDG 7.3:** By 2030, double the global rate of improvement in energy efficiency. • **SDG 9.4:** By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean technologies. • **SDG 13.2:** Integrate climate change measures into national policies, strategies, and planning.	

Schedule 3. Eligibility Assessment Protocol

1. Use of Proceeds

Ref.	Criteria	Requirements	DNV Findings
1a	Type of Bond /Loan	The Bond/Loan must fall in one of the following categories, as defined by the Principles & Standards: • Green Use of Proceeds Bond • Green Use of Proceeds Revenue Bond • Green Project Bond • Green Securitised Bond • Loan instrument made available for Green project (Green use of loan proceeds)	The Framework states that that MWA intends to issue GFIs, whereby an amount equivalent to the net proceeds is exclusively allocated to eligible green projects. The Framework is explicitly developed in alignment with the Principles & Standards. DNV confirms that GFIs meet the criteria under the Principles & Standards, and DNV confirms this process to be aligned with the Principles & Standards.
1b	Green Project Categories	The cornerstones of Green Bonds and Loans are the utilisation of the proceeds of the bonds or the loans which should be appropriately described in the legal documentation for the security.	Eligible project category presented by MWA are/is as follows: • Water Supply and Climate Change Adaptation • Renewable Energy • Energy Efficiency The above-mentioned project categories meet the eligible green project categories in the Principles & Standards. The activities meet Green Technical Screening Criteria (TSC). The TSC Eligibility Assessment is presented in Schedule 4, while the DNSH and MSS assessment are provided in Schedule 5. DNV confirms this to be aligned with the Principles & Standards.
1c	Environmental Benefits	All designated Green Project categories should provide clear environmental benefits, which, where feasible, will be quantified or assessed by the Issuer.	The Framework states that the Eligible Green Project Categories are intended to generate positive measurable environmental outcomes, including increased water capacity, energy savings, and GHG reductions. DNV confirms that the proposed use of proceeds will reasonably be expected to deliver meaningful environmental benefits.
1d	Refinancing Share	In the event that a proportion of the proceeds may be used for refinancing, it is recommended that issuers provide an estimate of the share of financing vs. re-financing, and where appropriate, also clarify which investments or project portfolios may be refinanced.	The Framework states that the net proceeds of GFIs may be used to finance and/or refinance eligible green projects, including both new and existing assets and expenditures. MWA clarifies that refinancing is subject to a maximum look-back period of 3 years. Allocation reporting will include

			disclosure of the share of new financing versus refinancing on an annual basis. The proposed management of net proceeds from the GFIs is confirmed by DNV to reasonably be expected to meet the criteria under the Principles & Standards.

2. Process for Project Selection and Evaluation

Ref.	Criteria	Requirements	DNV Findings
2a	Investment-Decision Process	The Issuer of a Green Bond and Loan should outline the decision-making process it follows to determine the eligibility of projects using Green Bond and Loan proceeds. This includes, without limitation: • The environmental objectives of the eligible Green Projects; • The process by which the issuer determines how the projects fit within the eligible Green Projects categories; and • Complementary information on processes by which the issuer identifies and manages perceived environmental and social risks associated with the relevant project(s).	The Framework clearly defines environmental objectives, including climate adaptation, sustainable water management, renewable energy, and energy efficiency. A structured cross-functional governance process screens and evaluates projects against eligibility criteria before approval by senior management, ensuring consistency and accountability. Eligible projects are identified through cross-departmental meetings chaired by the Deputy Governor (Finance), involving key technical and financial departments to ensure alignment with the Framework's eligibility criteria and ESG policies. Selected projects are then submitted to the Governor for approval, establishing a defined governance and accountability structure. The Framework also includes annual reviews of allocation and impact reporting, during which projects that no longer meet eligibility criteria are removed and replaced. Additionally, the Finance Department monitors developments in sustainable finance and disclosure requirements, ensuring ongoing alignment with market practices. DNV confirms this process for project selection and evaluation to be aligned with the Principles & Standards.
2b	Issuer/ Borrower's Environmental and Governance Framework	Issuers are also encouraged to: • Position the relevant information within the context of the issuer's overarching objectives, strategy, policy and/or processes relating to environmental sustainability. • Provide information, if relevant, on the alignment of projects with official or market-based taxonomies, related eligibility criteria • Have a process in place to identify mitigants to known material risks of	The Framework establishes a formalised, cross-functional project evaluation and selection process led by the Deputy Governor (Finance), ensuring that eligible projects are assessed against defined criteria and aligned with MWA's ESG policies. This process is embedded within MWA's broader sustainability strategy, which emphasises natural resources efficiency

		negative environmental and/or social impacts from the relevant project(s).	and circular economy[2]. Eligible project categories are directly linked to these strategic priorities, demonstrating consistency between project selection and MWA's environmental objectives. This is complemented by corporate responsibility principles aligned with ISO 26000, supporting the management of potential adverse. DNV confirms that MWA's ESG strategies are aligned with the Principles & Standards.

3. Management of Proceeds

Ref.	Criteria	Requirements	DNV Findings
3a	Tracking Procedure	• (Bond) The net proceeds of Green Bonds should be credited to a sub-account, moved to a sub- portfolio or otherwise tracked by the Issuer in an appropriate manner and attested to by a formal internal process that will be linked to the Issuer's lending and investment operations for Green Projects. • (Loan) The proceeds of Green Loans should be credited to a dedicated account or otherwise tracked by the borrower in an appropriate manner, so as to maintain transparency and promote the integrity of the product. Where a green loan takes the form of one or more tranches of a loan facility, each green tranche(s) must be clearly designated, with proceeds of the green tranche(s) credited to a separate account or tracked by the borrower in an appropriate manner.	The Framework states that the net proceeds of GFIs will be deposited and tracked in general funding account and managed on a portfolio basis. MWA's Finance Department is responsible for tracking and managing the GFIs proceeds. DNV confirms that the Framework outlines processes to track proceeds and allocations to the nominated projects, that are aligned with the Principles & Standards.
3b	Tracking Procedure	So long as the Green Bonds or Loans are outstanding, the balance of the tracked proceeds should be periodically reduced by amounts matching eligible green investments or loan disbursements made during that period.	The Framework states that the balance of net proceeds tracked to ensure that the eligible projects financed and/or refinanced match or exceed the net proceeds outstanding. As project-level disbursements occur, the amount of net proceeds designated as unallocated will be reduced accordingly, ensuring clear and transparent tracking of how proceeds transition from unallocated to allocated status over time. DNV confirms that the Framework outlines processes to track proceeds

[2] https://www.mwa.co.th/wp-content/uploads/2025/07/%E0%B8%99%E0%B9%82%E0%B8%A2%E0%B8%9A%E0%B8%B2%E0%B8%A2%E0%B8%81%E0%B8%B2%E0%B8%A3%E0%B8%9E%E0%B8%B1%E0%B8%92%E0%B8%99%E0%B8%B2%E0%B8%84%E0%B8%A7%E0%B8%B2%E0%B8%A1%E0%B8%A2%E0%B8%B1%E0%B9%88%E0%B8%87%E0%B8%A2%E0%B8%B7%E0%B8%99.pdf

			and allocations to the nominated projects that are aligned with the Principles & Standards.
3c	Temporary Holdings	Pending such investments or disbursements to eligible Green Projects, the Issuer should make known to investors the intended types of temporary investment instruments for the balance of unallocated proceeds.	The Framework states that any unallocated funds will be held in cash or cash equivalent instruments in line with MWA's financial policies, and will exclude any projects and activities listed under the excluded categories in the Framework. DNV confirms that the Framework outlines instruments to which unallocated proceeds will be invested, that are aligned with the Principles & Standards.

4. Reporting

Ref.	Criteria	Requirements	DNV Findings
4a	Periodical Reporting	• Issuers should make, and keep, readily available up to date information on the use of proceeds to be renewed annually until full allocation, and on a timely basis in case of material developments. • The annual report should include a list of the projects to which Green Bond proceeds have been allocated, as well as a brief description of the projects, the amounts allocated, and their expected impact. • Where confidentiality agreements, competitive considerations, or a large number of underlying projects limit the amount of detail that can be made available, the GBP recommend that information is presented in generic terms or on an aggregated portfolio basis (e.g. percentage allocated to certain project categories).	The Framework states that MWA is committed to annual, publicly available disclosures on both allocation and impact until full allocation, and thereafter in case of material changes. Allocation reporting will provide transparency on instruments, project categories, financing share, and unallocated proceeds, while impact reporting will, on a best-effort basis, disclose qualitative and quantitative environmental benefits, potentially on an aggregated basis. The reports will be published on MWA's website at www.mwa.co.th. DNV confirms that the Framework outlines reporting processes that are aligned with the Principles & Standards.

Schedule 4. Technical Screening Criteria (TSC) Eligibility Assessment

Eligible Green Project Categories	Applicable Taxonomy, Activity, and Environmental Objective (EO)	Technical Screening Criteria (TSC)	DNV Findings
Water Supply and Climate Change Adaptation	**ASEAN Taxonomy** **Activity:** 36[001] Construction, extension and operation of water collection, treatment and supply system **EO2:** Climate Change Adaptation	The Activity complies with the following criteria: 1. Where data is available, the physical climate risks that are material to the Activity have been identified by performing a robust Climate Risk and Vulnerability Assessment (CRVA) in accordance with the guidance provided in Annex 3; AND 2. The Activity has implemented physical and non-physical solutions ('adaptation solutions') that substantially reduce the most important physical climate risks that are material to that Activity; AND 3. Acceptable residual risk thresholds should be defined for the Activity; AND 4. Specific and measurable key performance indicators (KPIs) must be developed to track the reduction of material climate risks; AND 5. It must be shown that the Activity is necessary for the provision of water security.	1. MWA has identified material physical climate risks for the Ninth Bangkok Water Supply Improvement Project. The documentation identifies key hazards including flooding, drought, saltwater intrusion, and rising temperatures leading to algal blooms, all of which have already caused disruptions to water production and supply systems. 2. The Ninth Bangkok Water Supply Improvement Project incorporates a range of targeted adaptation measures that address identified risks. These include increasing water production capacity, constructing new transmission tunnels to enhance system redundancy, expanding clear water storage capacity, and developing additional pumping infrastructure. Operational measures such as real-time water quality monitoring and coordinated water resource management further strengthen resilience. These interventions directly reduce system vulnerability to climate-related disruptions 3. Operational strategies such as maintaining reserve storage capacity, diversifying supply systems, and ensuring redundancy mechanisms indicate a practical approach to managing residual risks 4. The Framework provides indicative impact metrics such as increased water production capacity, expanded storage

			volumes, and improved system reliability. 5. MWA serves a population of over 8 million people in the Bangkok metropolitan area and faces increasing water demand alongside climate pressures. The project directly enhances supply reliability, increases system capacity, and improves resilience to climate variability, ensuring continuous access to safe and sufficient water.
Renewable Energy	**ASEAN Taxonomy** **Activities:** • 351[021] Electricity generation using solar photovoltaic technology • 351[072] Storage of electricity, including pumped storage **EO1:** Climate Change Mitigation	Activity generates electricity using solar photovoltaic (PV) technology.	Electricity generation using solar photovoltaic technology activity is automatically eligible. Construction and operation of grid-connected electricity storage, including pumped hydropower storage is eligible.
	Thailand Taxonomy **Activities:** • Energy Sector 1. Solar energy generation • Energy Sector 14. Storage of electricity, thermal energy and low-carbon hydrogen and its derivatives **EO1:** Climate Change Mitigation	All solar-related energy generation is aligned with Taxonomy objectives	The solar energy generation activity is automatically eligible. All electricity and low-carbon hydrogen (and derivatives) storage systems—such as battery energy storage systems (BESS)—are aligned with Taxonomy objectives, as are thermal energy storage systems where the generated energy has lifecycle emissions below 100 g CO_2e/kWh, including geothermal energy storage.
Energy Efficiency	**ASEAN Taxonomy** **Activity:** 68[003] Energy performance measurement, regulation, control **EO1:** Climate Change Mitigation:	The Activity consists of one of the following individual measures: 1. Installation, maintenance and repair of zoned thermostats, smart thermostat systems and sensing equipment,	MWA plans to install, upgrade and/or replace several energy efficiency appliances including BEMS and EMS.

		including motion and daylight control; OR 2. Installation, maintenance and repair of building automation and control systems, building energy management systems (BEMS), lighting control systems and energy management systems (EMS); OR 3. Installation, maintenance and repair of smart metres for gas, heat, cool and electricity; OR 4. Installation, maintenance and repair of façade and roofing elements with a solar shading or solar control function, including those that support the growing of vegetation.	
	Thailand Taxonomy **Activity:** Construction and Real Estate Sector 4. Installation, maintenance, and repair of special-purpose building equipment **EO1:** Climate Change Mitigation	At least one of the following projects must be implemented to comply with the Taxonomy: • Installation of renewable energy equipment, renewable energy charging stations and regulation devices; • Installation of the equipment that decreases building operational emissions and consumption of water, gas, or electricity; • Installation of infrastructure for charging electric cars using grid electricity; • Installation of equipment within the two highest energy efficiency classes for equipment, as determined by relevant international labelling schemes or Thailand regulation • Addition of insulation to existing envelope components, such as: - external walls	MWA plans to install, upgrade and/or replace several energy efficiency appliances including BEMS and EMS.

		(including green walls), - roofs (including green roofs), - lofts, - basements and ground floors (including measures to ensure airtightness, - measures to reduce the effects of thermal bridges and scaffolding, - products for the application of the insulation to the building envelope (including mechanical fixings and adhesive); • Replacement of existing windows with new energy-efficient windows; • Replacement of existing external doors with new energy-efficient doors; • Installation and replacement of energy-efficient light sources; All installed equipment must comply with the highest standards of energy efficiency as defined by relevant national or international labels (e.g., Label No.5, Energy Saving Label or comparable)	

Schedule 5. Application of the Foundation Framework

Due to the absence of Technical Screening Criteria for energy efficiency projects in water supply systems and networks, Foundation Framework assessment is being applied. The activities assessed under this category include Pump Efficiency Optimisation, and District Metering Area (DMA) Pressure Management. The detail of each project is as follows:

(1) Pump Efficiency Optimisation Program

- **Variable Speed Drives (VSDs):**
  Install motor speed control systems to match pump output with actual water demand and pressure requirements. This avoids operating pumps at full capacity at all times and reduces energy consumption during low-demand periods.
- **Level Up Pumping Model (LVP+)**
  This model could optimize the utilization of distribution and transmission pumps and enhance the effectiveness of the distribution and transmission operation and also can reduce the electricity

consumption. MWA can use it to find out the efficient way to operate and select pumps to be used under each condition.

- **High-Efficiency Pump Replacement:**
  Replace aging and inefficient pumps under the water utility master plan to lower the **specific energy consumption** (kWh per cubic meter of water produced).

(2) District Metering Area (DMA)Pressure Management

A District Metering Area (DMA) Pressure Management is a controlled water distribution and measurement zone by divides the large-scale water distribution network into smaller sub-zones and installs water meters at the inflow and outflow points of each area to monitor and evaluate water management efficiency.

- **Reduction of Water Loss**
  It enables the MWA to track the actual volume of water entering and consumed with each zone, allowing for the precise calculation of water loss , or Non-Revenue Water.
- **Optimized Pressure Control:**
  Valves can be installed to optimize and regulate water pressure within area to maintain pressure within optimal limits (not too high to cause pipe bursts, and not too low to affect supply) reduces unnecessary pump workload and energy use.
- **Leak Detection and Isolation**
  When high water loss is detected in specific zone, MWA can narrow down the search area, locate the leaks and conduct repairs much faster than conducting a random city-wide search.

Note

Targeted efficiency measures may be considered green activities in themselves where they verifiably reduce energy use/losses and GHG emissions. This does not mean the entire facility or system becomes a green activity.

Section 1A — Does the Activity avoid / reduce GHG emissions?

1. How does the Activity avoid or help reduce emissions?

These projects primarily reduce indirect (Scope 2) greenhouse gas emissions by improving energy efficiency across water supply operations. Pump Efficiency Optimization lowers electricity consumption through the use of Variable Speed Drives (VSDs) and high-efficiency pump replacements, ensuring that energy use aligns with actual demand and minimizing waste during low-demand periods. Meanwhile, DMA Pressure Management reduces unnecessary pumping by maintaining optimal network pressure, which decreases energy requirements, limits water leakage, and reduces the need for additional water production and treatment. It also lowers electricity use at the customer level by reducing reliance on household booster pumps. Overall, these measures combine operational efficiency and system optimization to deliver sustained emissions reductions without altering core service delivery.

1(a). Does the Activity avoid locking in high carbon activity?

The activities upgrade existing infrastructure rather than expanding fossil-fuel-dependent systems. They prolong asset life while making systems more efficient, avoiding the need for new energy-intensive capacity. VSDs and efficient pumps are future-proof technologies compatible with grid decarbonisation.

1(b). Does the Activity avoid leading to significant GHG emissions (CO_2, CH_4, N_2O, SF_6, NF_3, HFCs)?

The activities do not generate significant GHG emissions and materially reduce indirect emissions. They reduce electricity-related emissions, which are typically the dominant footprint in water utilities.

1(c). Does the Activity avoid leading to extensive deforestation?

No deforestation risk associated with these activities as no land-use change or greenfield development is involved.

2. Do the Company's policies and business strategy generally avoid contradicting or impeding alignment with the specified EO1 principles?

MWA's policies and business strategy do not contradict EO1 principles. MWA Sustainable Development Policy actively support climate mitigation through energy efficiency, renewable energy adoption, water loss reduction, and sustainable resource management.

3. Where applicable and relevant, is a 3rd party certification or verification of alignment of Activity with EO1 available?

Not applicable.

4. Does the Activity fulfil relevant environmental law(s) applicable to EO1?

Thailand does not yet have dedicated legislation specifically mandating GHG emissions reduction.

5. Are the effects of Climate Change Mitigation efforts measurable and observable? (e.g., data on amount of carbon emissions avoided).

Emissions data have been reported in accordance with GRI 305 and have undergone independent third-party verification.

Schedule 6. Do No Significant Harm and Social Aspects

6.1 Do-No-Significant Harm

DNV has conducted a gap assessment of DNSH between ASEAN Taxonomy and Thailand Taxonomy. The result of the gap assessment shows that the DNSH of both Taxonomies are interoperable. Both Taxonomies require materiality assessment if the harm is considered significant. When the harm is significant, mitigation measures have to be put in place. However, Thailand Taxonomy offers guidelines which are specific to the context of the applicable sectors in Thailand. Fulfilling Thailand Taxonomy DNSH requirements is considered equivalent to fulfilling ASEAN Taxonomy DNSH requirements in the view of DNV. For the activities where the TSC is assessed against ASEAN Taxonomy, DNV refers to Thailand Taxonomy generic DNSH criteria.

As per the definition of 'Significant Harm' outlined in Thailand Taxonomy, the materiality assessment of the eligible green activities that have a potential for significant harm is stated in the table below.

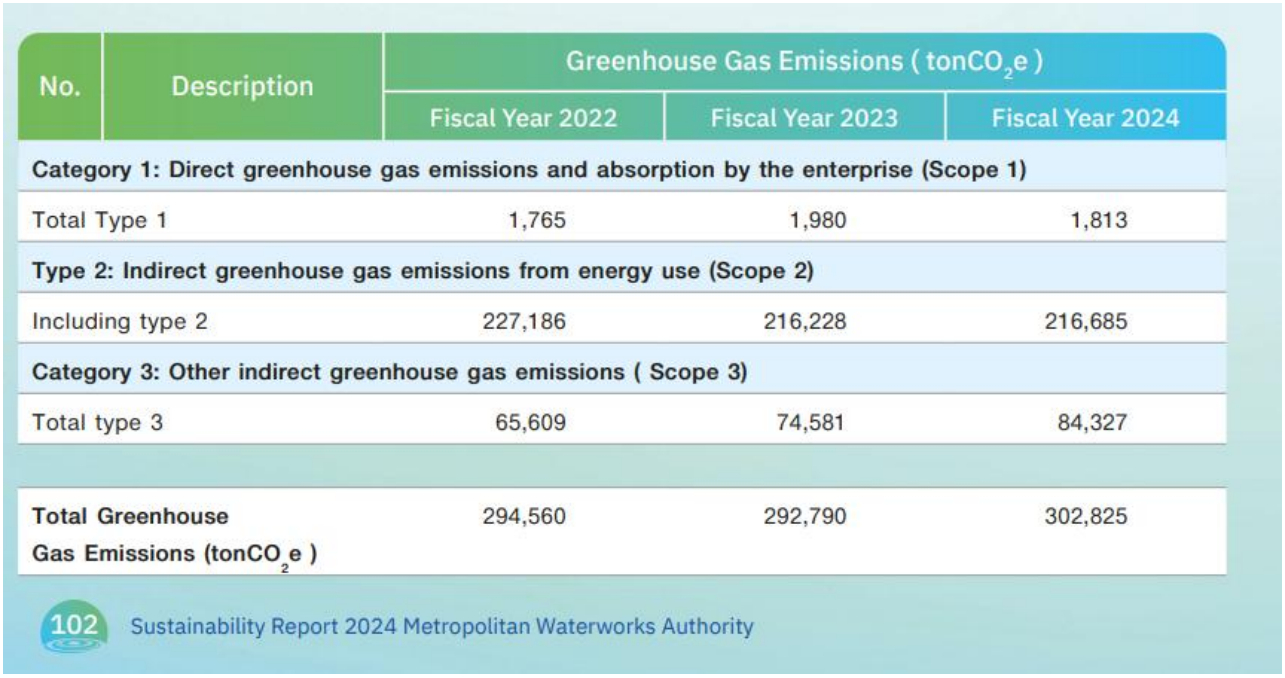
Eligible Project Categories	EO1 Climate Change Mitigation	EO2 Climate Change Adaptation	EO3 Sustainable Use and Protection of Marine and Water Resources	EO4 Resource Resilience and the Transition to a Circular Economy	EO5 Pollution Prevention and Control	EO6 Protection and Restoration of Biodiversity and Ecosystem
Water Supply and Climate Change Adaptation	Generic DNSH	Green TSC under ASEAN Taxonomy	Generic DNSH	Generic DNSH	Generic DNSH	Generic DNSH
Renewable Energy	Green TSC under Thailand and ASEAN Taxonomy	Generic DNSH	Generic DNSH	Generic DNSH + Sector Specific DNSH	Generic DNSH	N/A
Energy Efficiency	Green TSC under Thailand and ASEAN Taxonomy	Generic DNSH	Generic DNSH + Sector Specific DNSH	Generic DNSH + Sector Specific DNSH	Generic DNSH + Sector Specific DNSH	N/A

EO1 (Climate Change Mitigation) DNSH

MWA demonstrates a robust approach to quantifying greenhouse gas (GHG) emissions, including Scope 1, Scope 2, and Scope 3 emissions. In FY2024, reported emissions amounted to 1,813 tCO_2e (Scope 1), 216,685 tCO_2e (Scope 2), and 84,327 tCO_2e (Scope 3), totalling 302,825 tCO_2e. The organisation applies recognised methodologies aligned with national standards and international frameworks such as GRI and IPCC-based emission factors.

MWA has implemented clear mitigation measures to minimise GHG emissions, including installation of solar photovoltaic systems (999.6 kWp capacity, generating 443,476 kWh and reducing approximately 221,693 $kgCO_2e$), transitioning to electric vehicles, and optimising pump operations. Energy intensity has improved to 1.05 MJ per cubic meter of water supplied, reflecting enhanced efficiency.

Overall, MWA demonstrates strong alignment with EO1 DNSH requirements, supported by measurable emissions accounting, absence of significant adverse emissions impacts, and implementation of credible, ongoing emissions reduction measures.



No.	Description	Greenhouse Gas Emissions ($tonCO_2e$)		
		Fiscal Year 2022	Fiscal Year 2023	Fiscal Year 2024
Category 1: Direct greenhouse gas emissions and absorption by the enterprise (Scope 1)				
Total Type 1		1,765	1,980	1,813
Type 2: Indirect greenhouse gas emissions from energy use (Scope 2)				
Including type 2		227,186	216,228	216,685
Category 3: Other indirect greenhouse gas emissions (Scope 3)				
Total type 3		65,609	74,581	84,327
Total Greenhouse Gas Emissions ($tonCO_2e$)		294,560	292,790	302,825

Figure 1: MWA's Emissions as reported on 2024 Sustainability Report[3]

EO2 (Climate Change Adaptation) DNSH

MWA has conducted a comprehensive identification of physical climate risks, consistent with the intent of a Climate Risk and Vulnerability Assessment (CRVA). Key physical climate risks identified include flooding, drought, saltwater intrusion, and rising temperatures leading to algal blooms, all of which have already impacted water supply operations, including temporary plant shutdowns and deterioration in raw water quality. This indicates a structured and evidence-based understanding of climate vulnerabilities across the water supply system.

In response, MWA has implemented a range of adaptation solutions designed to minimise identified risks, including expansion of water production capacity, construction of transmission tunnels to enhance redundancy, development of additional pumping stations, and increased storage capacity through clear water tanks. Operational measures such as real-time monitoring of water quality and coordination with national authorities on water resource allocation further strengthen system resilience. These solutions support system-level adaptation, aligning with national infrastructure resilience priorities and long-term urban water security strategies.

Additionally, MWA's adaptation approach incorporates forward-looking planning, including projections of increasing water demand and more frequent climate-related disruptions. This reflects alignment with broader regional and national adaptation objectives, ensuring that infrastructure investments are resilient under future climate scenarios.

Overall, MWA demonstrates a **strong alignment with EO2 DNSH requirements,** with clear identification of risks and implementation of practical, system-wide solutions.

EO3 (Sustainable Use and Protection of Marine and Water Resources) DNSH

[3] https://www.mwa.co.th/wp-content/uploads/2025/09/SRMWA-2024-1.pdf

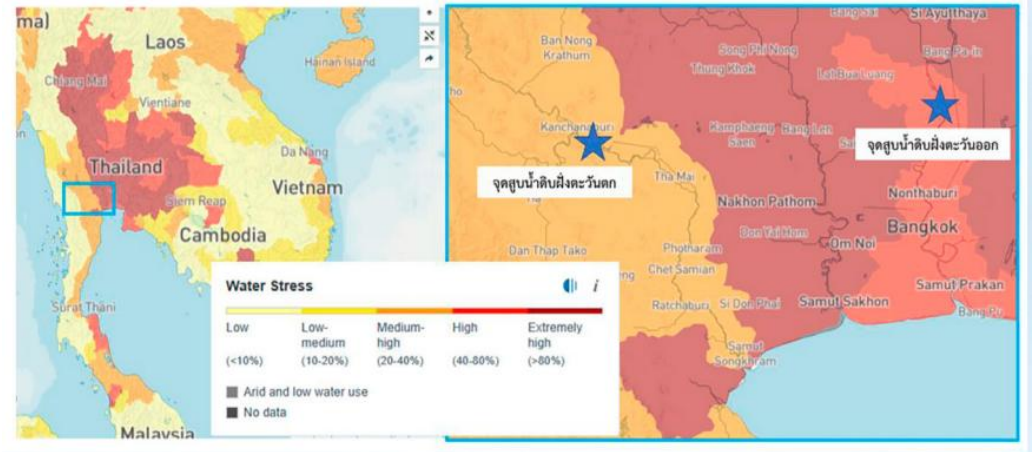
MWA demonstrates a systematic approach to identifying and managing risks related to water consumption and water quality. The organisation monitors raw water sources from the Chao Phraya and Mae Klong rivers and applies comprehensive water quality testing aligned with WHO guidelines and ISO standards. Continuous monitoring systems, laboratory testing under ISO/IEC 17025, and Water Safety Plans are implemented to assess physical, chemical, and biological risks across the water supply chain, indicating a structured approach comparable to recognised water risk assessment practices.

The sites are situated in water-stressed and climate-exposed conditions, including risks from drought, saltwater intrusion, flooding, and declining water quality. MWA has implemented mitigation and conservation measures such as raw water management coordination with authorities, expansion of storage capacity, reuse of water from treatment processes (e.g., reuse of 6,855 ML of filter backwash water), and reduction of non-revenue water through leakage control programs. These actions reflect the presence of water management and conservation planning aligned with stakeholder engagement, particularly with government agencies responsible for water allocation.

MWA has also implemented structured water management frameworks consistent with international standards, including ISO 14001 for environmental management, Water Safety Plans aligned with WHO guidelines, and compliance with national water quality regulations. Monitoring, reporting, and verification practices are embedded through routine water quality testing, performance indicators (e.g., compliance rates for turbidity, chlorine, and microbiological parameters), and public disclosure under GRI Standards.

EO3 Construction and Real Estate sector specific DNSH: MWA demonstrates a clear commitment to promoting water efficiency across its value chain, including both supply-side operations and end-user consumption. As part of its demand-side management strategy, MWA has implemented initiatives such as the water efficiency labelling scheme ("water saving label"), which encourages the adoption of water-efficient appliances among customers. This scheme aligns with recognised water labelling systems and supports efficient use of potable water resources by influencing consumer behaviour.

Overall, the activity demonstrates **strong alignment with EO3 DNSH requirements,** supported by comprehensive water risk identification, implementation of mitigation and conservation measures, and adherence to internationally recognised standards for water resource management and protection.



ภาพแสดงจุดรับน้ำดิบของ กปน. เปรียบเทียบกับแผนที่พื้นที่เสี่ยงต่อการใช้น้ำ (Water stress area)
อ้างอิงจาก https://www.wri.org/applications/aqueduct/water-risk-atlas/

Figure 2: MWA's Water Stress Level as reported on 2024 Sustainability Report[4]

[4] https://www.mwa.co.th/wp-content/uploads/2025/09/SRMWA-2024-1.pdf

EO4 (Resource Resilience and the Transition to a Circular Economy) DNSH

MWA's broader environmental management system (ISO 14001-certified) supports resource efficiency and lifecycle management, although explicit lifecycle assessment (LCA) aligned with ISO 14040/14044 is not formally disclosed.

MWA has implemented concrete measures to maximise resource efficiency and reuse, particularly in water operations. This includes the reuse of process water (e.g., recovery of filter backwash water), reduction of non-revenue water through leakage control, and optimisation of operational processes to reduce material and energy consumption. In addition, wastewater and sludge generated from treatment processes are managed and disposed of in accordance with regulatory requirements, demonstrating proper treatment and waste handling practices. EO4 DNSH checklist for each project category is stated in the tables below.

The organisation also promotes long asset life and durability, for example through pipeline replacement programmes and infrastructure upgrades designed to minimise leakage and extend operational lifespan. However, explicit design for dismantling, refurbishment, and recyclability of infrastructure components, as well as formalised recycling partnerships or extended producer responsibility (EPR) mechanisms, are not clearly evidenced.

- EO4 DNSH Checklist for Water Supply and Climate Change Adaptation Checklist

Step	Item	Description	Explanation	Status
1A	Activity Definition	Activity	What is the proposed Activity?	Construction, extension, operation and maintenance of water collection, storage, treatment and distribution infrastructure
1B		Period of Activity (Start/End)	When will the Activity start and what it is expected life?	Construction phase followed by long-term operation and maintenance lifecycle typical of public water infrastructure
2A	Inputs and outputs throughout Activity lifecycle	Initial infrastructure/equipment	High level view of main equipment items	Water treatment plants, reservoirs, pipelines, pumps, control systems
2B		Raw materials used	What type of raw materials will be used for the activity? (Mainly applies to manufacturing Activities)	Not Applicable

2C		Replacements and Spares	What spares are likely to be consumed during Activity life?	Pumps, values, control systems, filters, electrical components
2D		Energy use	What forms of energy does the Activity consume?	Electricity from national grid for pumping, treatment, monitoring systems
2E		Emissions	What emissions does the Activity make?	GHG emissions
2F		Waste Streams	What forms of waste will the Activity generate in its lifetime?	Sludge from treatment, chemical waste
3A	Potential impacts from the Activity on EO4 (circular economy and resource resilience)	Initial infrastructure/equipment	For each of these categories, what are or could be the impact on EO4?	Large-scale infrastructure construction is resource intensive.
3B		Raw materials used		Not Applicable
3C		Replacements and Spares		Waste generation and resource efficiency concerns
3D		Energy use		Exposure to carbon intensity of grid
3E		Emissions		Impact on climate change from GHG emissions
3F		Waste Streams		Risk of soil/water contamination from sludge or chemical residues
4A	Proposed actions and improvements to mitigate impact	Initial infrastructure/equipment	What actions are or will be implemented to avoid harm to EO4?	Minimise footprint
4B		Raw materials used		Use low-carbon, recycled, or certified sustainable sourcing where feasible
4C		Replacements and Spares		Preventive maintenance, extend equipment life
4D		Energy use		Implement energy-efficient pumps,

				automation, renewable energy integration where possible
4E		Emissions		Monitor energy use and emissions; adopt decarbonization strategies
4F		Waste Streams		Proper sludge treatment and disposal, recycling of construction waste, chemical handling protocols

- **EO4 DNSH Checklist for Renewable Energy and Energy Efficiency projects**

Sector Specific EO4 DNSH: There is limited explicit disclosure regarding the end-of-life management of solar components, including panel recycling, inverter disposal, or contractual arrangements with recycling providers. In the Thai context, although extended producer responsibility (EPR) has been actively promoted in national policies and draft legislation, a comprehensive and enforceable EPR regulatory framework has not yet been formally enacted or published. Current waste management remains governed by fragmented regulations, while dedicated EPR laws—particularly for electronic waste and renewable energy components—are still under development and consultation by relevant authorities[5]

From an EO4 DNSH (Circular Economy) perspective, a similar limitation applies to energy efficiency equipment (e.g. BEMS, smart meters, LED systems, and control devices). These systems typically contain electronic components and materials with recyclability potential; however, there is limited evidence of lifecycle-oriented design, formal refurbishment strategies, or structured recycling and reuse arrangements (e.g. take-back agreements or integration of recycling costs into procurement). In Thailand, while equipment is often designed to international standards with inherent durability and modularity (allowing repair and component replacement), circularity practices—such as systematic dismantling, material recovery, and closed-loop recycling—remain partially developed in the absence of a mandatory EPR regime and fully integrated e-waste infrastructure

Step	Item	Description	Explanation	Status
1A	Activity Definition	Activity	What is the proposed Activity?	Solar power generation, and Energy Efficiency projects including thermostats, BEMS, lighting control and smart meters.

[5] https://tdri.or.th/2025/12/pv-eol-situation-white-paper/

1B		Period of Activity (Start/End)	When will the Activity start and what it is expected life?	20-30 years for solar, 5-20 years for energy efficiency systems
2A	Inputs and outputs throughout Activity lifecycle	Initial infrastructure/equipment	High level view of main equipment items	Renewable Energy: panels, inverters Energy Efficiency: Devices including BEMS, sensors and meters
2B		Raw materials used	What type of raw materials will be used for the activity? (Mainly applies to manufacturing Activities)	Not Applicable
2C		Replacements and Spares	What spares are likely to be consumed during Activity life?	Renewable Energy: Inverters, batteries Energy Efficiency: Sensors, Control units, etc.
2D		Energy use	What forms of energy does the Activity consume?	Renewable Energy: Not Applicable Energy Efficiency: Electricity from grid
2E		Emissions	What emissions does the Activity make?	Very low operational emissions; embodied GHG emissions from manufacturing
2F		Waste Streams	What forms of waste will the Activity generate in its lifetime?	End-of-life e-waste (solar panels and electric components)
3A	Potential impacts from the Activity on EO4 (circular economy and resource resilience)	Initial infrastructure/equipment	For each of these categories, what are or could be the impact on EO4?	Resource-intensive production phase
3B		Raw materials used		Not Applicable
3C		Replacements and Spares		Limited negative impact with maintenance strategy
3D		Energy use		Positive Impact

3E		Emissions		Limited negative impact on climate change from GHG emissions
3F		Waste Streams		Risk from end-of-life e-waste
4A	Proposed actions and improvements to mitigate impact	Initial infrastructure/equipment	What actions are or will be implemented to avoid harm to EO4?	Durable systems and maintenance system to extend the lifecycle
4B		Raw materials used		Not Applicable
4C		Replacements and Spares		Preventive maintenance
4D		Energy use		High efficiency systems, demand reduction, smart controls
4E		Emissions		Net emissions reduction
4F		Waste Streams		End-of-life e-waste will be disposed of in accordance with applicable national regulations.

Overall, MWA shows **moderate alignment with EO4 DNSH requirements**, supported by established practices in resource efficiency, reuse, and waste management. Further strengthening could be achieved through circular design integration, and end-of-life management planning for renewable energy and energy efficiency projects.

EO5 (Pollution Prevention and Control) DNSH

MWA demonstrates strong alignment with pollution prevention and control requirements, supported by the adoption of a recognised environmental management system. The organisation operates under ISO 14001:2015 certification, covering its water production and distribution processes, ensuring systematic identification, monitoring, and control of environmental impacts, including emissions, effluents, and waste. The organisation conducts screening and controlled dosing under laboratory supervision, ensuring that no dangerous substances are released at harmful levels. This is consistent with Thailand's Environmental Quality Promotion and Conservation Act B.E. 2535 (1992), Hazardous Substances Act B.E. 2535 (1992) and related regulations.

In terms of emissions and environmental thresholds, there is no indication that MWA's operations exceed applicable limits for air, water, or soil pollution. Water quality indicators (e.g., turbidity, chlorine levels, microbiological safety) are consistently maintained within regulatory thresholds, and operational controls are in place to prevent contamination.

EO5 Construction and Real Estate sector specific DNSH: Infrastructure and materials used in water systems are regulated under Hazardous Substance Act B.E. 2535 (1992). The use of such substances by MWA is primarily for essential public utility services—namely potable water production—which supports sustainable water resource management objectives and does not conflict with Thailand Taxonomy principles at either national or regional levels. DNV notes that MWA has an active ISO 14001:2015 certificate which can demonstrate MWA's compliance with relevant national regulations pertaining to environmental management including end-of-life products treatments.

However, certain environmental considerations remain relevant for continuous improvement. Electrical and electronic equipment, including energy efficiency devices may contain small quantities of substances of very high concerns such as Lead and Mercury. However, most energy-efficiency devices are subject to Restriction of Hazardous Substances (RoHS). Thailand does not currently have a comprehensive, mandatory RoHS regulation covering all electronic and electrical equipment placed on the market. RoHS-equivalent requirements (e.g., TIS2368-2564) currently exist as a voluntary standard rather than a comprehensive mandatory framework covering all electrical and electronic equipment. Therefore, DNV recommends that MWA strengthen its procurement policies to require that electronic products meet recognized RoHS standards or equivalent international requirements.

Overall, MWA demonstrates **strong alignment with EO5 DNSH criteria**, supported by certified environmental management systems, compliance with Thai environmental and hazardous substance regulations, and robust monitoring and control of pollution risks across its operations.

EO6 (Protection and Restoration of Biodiversity and Ecosystem) DNSH

MWA operates in compliance with Thailand's environmental regulatory framework, particularly the Enhancement and Conservation of National Environmental Quality Act B.E. 2535 (1992). MWA is committed to undertaking Environmental Impact Assessment (EIA) on a case-by-case basis where required by law and in circumstances where environmental or biodiversity risks may be material. While the Sustainability Report does not explicitly reference project-level EIA disclosures, MWA's large-scale water infrastructure projects (e.g., treatment plants, transmission systems) are typically required to undergo such assessments under Thai law, ensuring that biodiversity-related risks are identified and evaluated prior to implementation.

Regarding location risks, there is no evidence that MWA's major infrastructure is situated within UNESCO World Heritage sites, Key Biodiversity Areas, or protected habitats. Urban water systems are generally located in developed areas, reducing direct impacts on sensitive ecosystems. However, given reliance on natural river systems, indirect ecological impacts are relevant and are managed primarily through regulatory compliance and operational controls.

In terms of monitoring, reporting, and verification (MRV), MWA conducts regular monitoring of water quality and environmental indicators, supported by ISO-certified laboratories and reporting aligned with GRI Standards. This provides ongoing oversight of environmental performance and helps ensure that mitigation measures remain effective.

Overall, MWA demonstrates **strong alignment with EO6 DNSH requirements,** driven by compliance with Thailand's EIA requirements, implementation of environmental management systems, and active monitoring of water resource impacts.

EO6 DNSH criteria are generally not considered applicable to Renewable Energy (Solar) and Energy Efficiency projects, as these activities are implemented on or within existing buildings and do not involve new land use or direct interaction with biodiversity-sensitive areas.

6.2 Social Aspects

MWA's stakeholder management policy demonstrates a structured and comprehensive approach to social safeguards that is broadly aligned with the Thailand Taxonomy's social criteria. The policy adopts internationally recognized stakeholder engagement principles (e.g., AA1000SES) and identifies key stakeholder groups—including government, employees, customers, suppliers, and communities—ensuring their interests are systematically incorporated into decision-making and operations. It emphasizes transparency, legal compliance, anti-corruption, equitable service delivery, and continuous engagement, particularly in providing safe and reliable water as an essential public service. These elements strongly support the Taxonomy's objectives on social inclusion, access to basic services, and responsible business conduct[6].

Thailand has made significant progress in aligning with international labour standards, having ratified 8 out of 10 fundamental ILO conventions as of 2025, including those on forced labour, child labour, non-discrimination, equal remuneration, and occupational safety and health. However, the country has not yet ratified Convention No. 87 (Freedom of Association) and Convention No. 98 (Collective Bargaining), which remain key gaps in its alignment with full international labour standards. In this context, MWA helps bridge these gaps through its internal governance and practices by promoting stakeholder participation, employee engagement, adherence to national labour laws, and transparent communication channels. While formal collective bargaining rights may be governed at the national level, MWA's policy framework supports consultation, fair treatment, and grievance responsiveness, thereby partially mitigating risks associated with unratified conventions. Overall, MWA's approach contributes positively to embedding social safeguards in sustainable activities under the Thailand Taxonomy, with opportunities to further strengthen alignment through more explicit commitments to international labour standards and enhanced disclosure of labour-rights practices.

[6] https://www.mwa.co.th/wp-content/uploads/2025/08/%E0%B8%99%E0%B9%82%E0%B8%A2%E0%B8%9A%E0%B8%B2%E0%B8%A2-Stakeholder-%E0%B8%A5%E0%B8%87%E0%B8%99%E0%B8%B2%E0%B8%A1-2-%E0%B8%81.%E0%B8%84.-68.pdf

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