

# Green Bond Framework

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Stockholm Exergi Holding AB (publ)  
[stockholmexergi.se](https://stockholmexergi.se)





# This is Stockholm Exergi

Stockholm Exergi is Stockholm's energy provider. Through resource-efficient solutions, we ensure that the growing region of Stockholm has access to electricity, heating, cooling and waste management services. We are owned by the City of Stockholm and Ankhiale and our 700 employees work every day to reduce the climate impact of Stockholmers. By also developing carbon capture technologies, we are committed to making zero emissions a reality.

## What we do

Our activities are based on our distribution network, through which we provide our customers with heating and cooling and supply electricity to the Stockholm area. Today, more than 800,000 Stockholmers and around 400 locations – including hospitals, data centres, and other private and public sites – are connected to our

district heating network, which in turn is connected to our heating and cogeneration plants. These facilities capture residual heat and transform biofuels and waste that can no longer, or should no longer, be recycled into energy for distribution to all our customers and the community.

## Where are we headed?

At every point of our value chain, from energy production to use, we identify and develop solutions that meet ongoing changes for the benefit of our customers, employees and society. We are focused on meeting the energy needs of the Stockholm region, while at the same time improving sustainability by developing circular solutions and counteracting environmental impact.

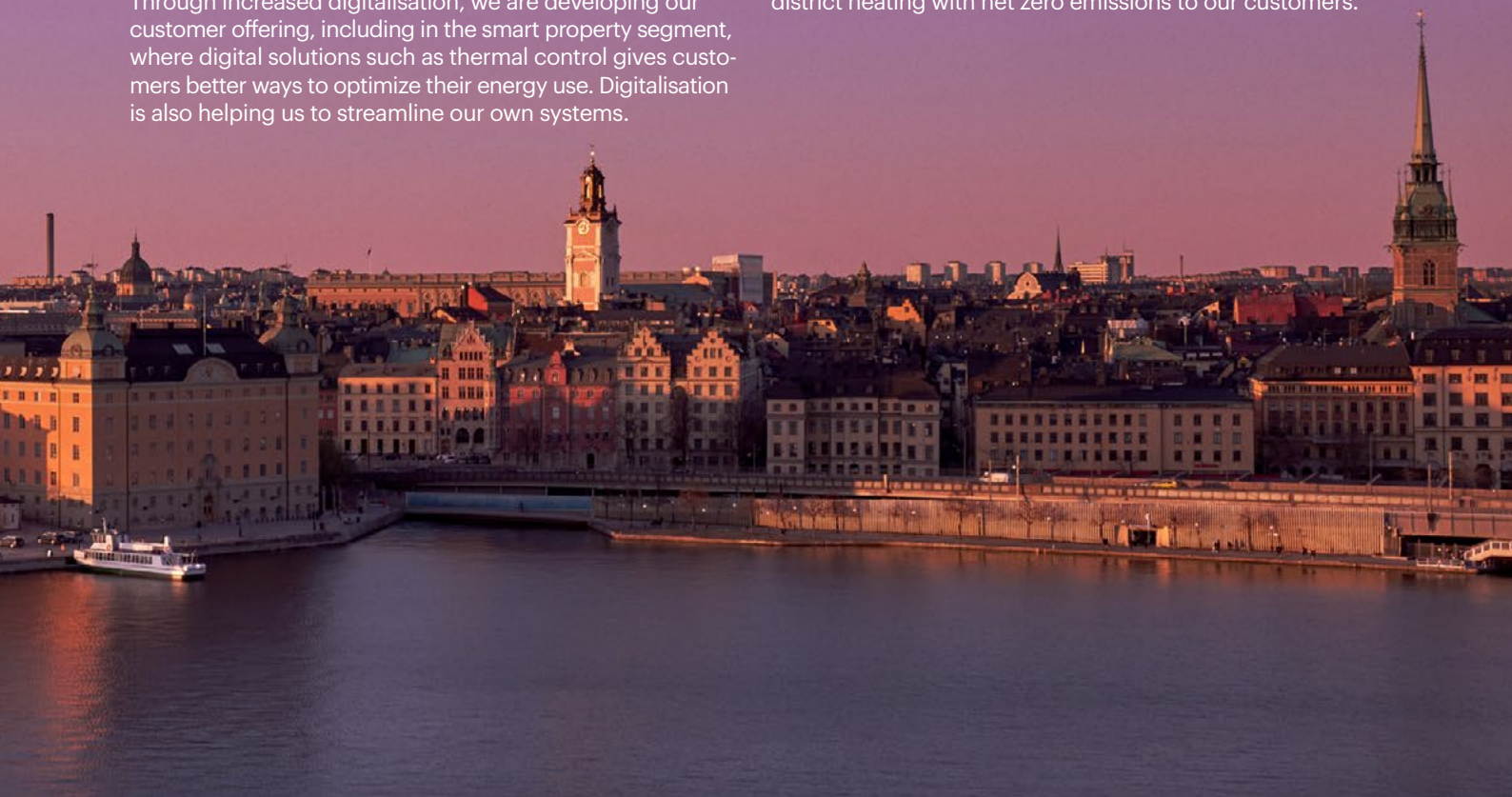
We enable increased electrification by developing our facilities and modernizing the district heating system. By creating more flexible district heating systems, we reduce pressure on overloaded electricity grids and generate electricity when needed. We are increasing collaboration between actors on electricity and heating markets with a view to establishing robust infrastructures with increased operational and delivery reliability.

Through increased digitalisation, we are developing our customer offering, including in the smart property segment, where digital solutions such as thermal control gives customers better ways to optimize their energy use. Digitalisation is also helping us to streamline our own systems.

We contribute to increased resource efficiency by optimizing and streamlining our own processes and by using renewable, recovered or recycled energy sources. We also create outlets for our own and others' residual products throughout the entire value chain. In these ways, we are part of – and develop – the circular economy.

We contribute to reduced environmental impact by phasing out fossil fuels and sorting recyclable plastic from the waste we incinerate. In addition, we are developing negative emissions technologies.

We invest in Carbon Capture and Storage (CCS) and Bio energy CCS (BECCS) technologies to separate carbon dioxide from both biofuel and residual waste, and thus reduce the climate impact from society's waste and create large permanent carbon sinks. We will eventually offer district heating with net zero emissions to our customers.



# Sustainability management

Sustainability is integrated throughout Stockholm Exergi's operations and is reflected in our vision, strategy, goal formulation and the decisions we take. Our sustainability policy forms the basis of our management culture and guides us in conjunction with codes of conduct for us and our suppliers.

## Our value chain and material sustainability issues

Stockholm Exergi has a major impact on the local society. Our business strategy is to combine value creation with a positive contribution to society, from an ecological, social and economic perspective.

We identify which sustainability issues that are most important, based on materiality assessments which includes both risks and opportunities. The key sustainability issues identified in the assessment have been mapped towards each step of our value chain, outlined below and in the figure to the right.



### Our most important sustainability issues linked to our value chain:

#### Customers and society

- Responsible actions in line with Stockholm Exergi's position on the heating market
- A comprehensive offering of sustainable products and services
- Recruitment with a focus on excluded groups

#### Society's residual products

- Waste treatment incorporating energy recycling

#### Suppliers

- Anti-corruption
- Renewable fuels
- Sustainable purchases and investments
- Transports
- Extraction of resources

#### Production

- Waste from operations
- Disruption of the immediate vicinity of production facilities
- Emissions to air and climate impact
- Emissions to water

#### Distribution

- Distribution in the immediate vicinity of operations

#### Employees

- Healthcare and health
- Diversity and inclusion
- Safe working environment

## Project Categories and relevance to the UN Sustainability Development Goal

Based on our materiality analysis, the UN Sustainability Development Goals (SDGs) below are those we prioritise the most. Our ambition with this Green Bond Framework is to, directly or indirectly, contribute to these SDGs.

### Critical objectives:



### Important objectives:



# Sustainable production and distribution

Our efficient and flexible production processes meet Stockholm's heating, electricity and cooling needs. Stockholm Exergi has around 30 production plants which, in co-ordination with each other and our partners' facilities, process various energy sources to ensure that the Stockholm region is supplied with cost-effective and sustainable energy regardless of weather conditions and temperatures.

For the last decade, Stockholm Exergi has been involved in structured renewal of the distribution network. New networks have improved thermal insulation which reduces energy losses while repairs of leaks and increased capacity in the network improve operational efficiency.

At present, about 97 per cent of the district heating we provide is produced from recovered or renewable energy. Our production is based on the following four sources:

**(i) Residual heat and electricity:** We use the heat in Stockholm's wastewater, residual heat from data centres and supermarkets, and heat created by district cooling. Electricity required for operating heat pumps and other electricity consumed in production is based on origin-labelled electricity from renewable energy sources.

**(ii) Waste treatment with energy recovery:** We produce electricity and heat by incinerating residual waste that remains when society has finished sorting it.

**(iii) Renewable fuels:** We use renewable biofuels in the form of residual material from forestry and industry, such as wood chips and bio-oils, to generate energy.

**(iv) Fossil fuels:** We use a certain amount of fossil oils partly to start and stop plants and partly in plants that we mainly use during severe cold periods. Coal has been entirely phased out from our production.

Stockholm Exergi's climate target is based on emission reductions and additional production of permanent negative carbon removals. Our goal is to become Europe's largest producer of permanent negative emissions by 2027 and achieve net zero operations by 2032. Reaching the goal and reducing our climate and environmental impact will be achieved mainly through investments in BECCS technology at our bioenergy plants and CCS technology at waste incineration plants. We also plan to phase out the remaining use of fossil oils.

## Bioenergy and CCS technology

Bioenergy is important to society. It provides around a quarter of all Sweden's energy needs and has a key role in combating global climate change, a view backed by for example the Intergovernmental Panel on Climate Change

(IPCC), the United Nations body for assessing the science related to climate change. Bioenergy used for our district heating is mainly based on forestry residues from areas that represent a net carbon sink according to the principles in the EU regulation on land, land use change and forestry (LULUCF).

We do not use biofuel that divert raw materials from the manufacture of products that would otherwise bind the biogenic carbon in long-lived products. We target our purchasing of solid biofuels to nations or regions where the carbon stock in the forest system is stable or increasing. Thus we extract energy from a climate natural carbon cycle.

By sequestering biogenic carbon dioxide from our existing cogeneration plants, and storing it permanently, we can create a permanent carbon sink. We are currently developing BECCS at our biopower plant in Värtan with the goal of having a large-scale carbon capture facility in operation by 2027. Once in operation, the facility will be able to capture 800,000 tonnes of biogenic CO<sub>2</sub> per year. BECCS refers to the process when biogenic CO<sub>2</sub> from burning biofuel is separated from flue gases and then stored permanently in bedrock. Since the CO<sub>2</sub> that is separated from the flue gases was previously captured from the air by plants through photosynthesis, the concentration of CO<sub>2</sub> in the atmosphere is reduced. Thereby resulting in permanent negative emissions which could be offered to companies that need them in order to reach net zero emissions.

## Energy recovery from society's waste products

Stockholm Exergi produces electricity and heat by incinerating the residual waste that remains when society has finished sorting it, so-called energy recovery. Our incineration is resource-efficient, based on the concept of a waste hierarchy that removes substances such as heavy metals from material recycling. Nonetheless, more waste needs to be sorted for reuse and recycling prior to incineration in our facilities in order to improve material recycling and reduce CO<sub>2</sub> emissions from waste treatment. The management of plastic in the residual waste is particularly important to manage as CO<sub>2</sub> emissions is released when plastic is burned. These emissions create waste treatment costs as they are subject to EU emissions rights trading. Emissions are also recorded from the energy recovered from combustion and these emissions currently make up the majority of CO<sub>2</sub> emissions that remain in district heating.

To reduce emissions from waste management, two practical steps are necessary: increased sorting and material recycling as well as separation of CO<sub>2</sub> from flue gases for permanent storage, so-called CCS. Together with partners, we have developed new solutions for mechanical sorting in order to recover even more recyclable materials, including organic



food waste, metal and plastics, before waste incineration and energy recovery takes place. We are also participating in a number of initiatives to encourage the people of Stockholm to increase the sorting of plastic from their residual waste. However, better incentives and rules are needed in order to systematically increase the amount of plastic being sorted and used as raw material in the production of new products.

### CCS as part of the waste solution

Making society's residual waste entirely free from plastic and other fossil materials will, however, be difficult to achieve in the near future. Stockholm Exergi therefore sees CCS as a natural next step. It should also be possible to process separated carbon dioxide into new secondary raw material, carbon capture and utilisation (CCU), and contribute to sustainable carbon cycles. We have conducted preliminary studies at our Högdalen and Brista cogeneration waste management and energy recovery plants, which have demonstrated that it is technically and logistically feasible to make use of captured carbon dioxide. Our strategy is to continue the work on CCS/CCU technologies to reduce the remaining fossil emissions associated with waste treatment. Once in operation and in combination with BECCS technology, it will allow us to reach the goal of a net zero business and will also make an important contribution to both regional and national climate goals.

## Sustainable value chain

Our Code of Conduct and business ethics guidelines help ensure that the business relationships we have with suppliers and other partners are conducted ethically and legally. We have a specific Code of Conduct for suppliers, which is based on the principles of the UN Global Compact on human rights, labour rights, the environment and anti-corruption. To assess the extent to which our suppliers comply with the Code, suppliers are required to complete a self-evaluation as part of the procurement processes, which are updated every three years. These form the basis of further sustainability checks. Before supply deals are agreed, we conduct additional business ethics checks. This involves checking that suppliers are not subject to sanctions or have any other negative associations. If we uncover evidence of this, we conduct a more in-depth review with an audit, or we choose not to proceed with the supplier in question.

For fuels, we assess risks based on fuel type, country of origin, and our past experience of specific supplier categories. Challenges include the risk of illegal logging, poor labour conditions, corruption and poor control of supply chains. Such risks are mitigated by requiring certifications that ensure traceability and that supply chains are audited annually by authorised auditors. Stockholm Exergi is certified by the Forest Stewardship Council (FSC) standard for traceability (FSC Chain of custody), meaning that our compliance with the standard is audited once a year. 100 per cent of our forest fuels must meet requirements for the FSC Controlled Wood standard or equivalent and adhere to the requirements of the EU's Renewable Energy Directive (RED) and EU directives or legislation that ensure the legality and traceability of the fuel.



# Rationale for Stockholm Exergi's Green Bond Framework

Sustainability is at the heart of our business and naturally, our financing is also connected to our sustainability work. We issued our first green bond in 2015 and in 2023, green bonds account for almost 80 per cent of our bond portfolio and we have established sustainability criteria linked to our loan financing. Sustainable financing is a key way to finance vital investments to develop Stockholm's energy system and making our operations net zero, while also giving us additional incentives to consistently make sustainable choices.

The sustainable finance market continues to evolve with new standards and regulations such as updated versions of the Green Bond Principles, published by the International Capital Market Association (ICMA), and the EU Taxonomy Regulation. This updated Green Bond Framework (the "Framework") is a further step towards increasing Stockholm Exergi's engagement and investments in a more sustainable direction and align with best market practices. The Framework enables us to mobilise debt capital via green bonds to support investments contributing to the transition towards a sustainable, resource-efficient and low-carbon energy system.

The Framework is developed to align with ICMA's Green Bond Principles (as of 2021 with June 2022 Appendix 1). The four core components of the Principles along with its recommendation of external review form the basis of the Framework:

- 1) Use of Proceeds
- 2) Process for Project Evaluation and Selection
- 3) Management of Proceeds
- 4) Reporting

The terms and conditions of the underlying documentation for each green bond issued by Stockholm Exergi shall provide a reference to this Framework. S&P Global Ratings has provided a second-party opinion, which is publicly available at Stockholm Exergi's website. This Framework may over time be updated, however new versions shall have no implications for the Green Bonds that have been issued under this Framework.

## 1. Use of Proceeds

### Allocation of net proceeds

An amount equal to the net proceeds from Green Bonds issued by Stockholm Exergi will finance or refinance, in whole or in part, investments undertaken by Stockholm Exergi or its subsidiaries that are in accordance with the Green Project categories defined in the next pages (Green Projects). Green Projects may include the value of fixed assets, capital expenditures and/or operating expenditures which together will form a portfolio of assets eligible for financing and refinancing with Green Bonds. The overarching goal of the Green Projects is to promote the transition towards low-carbon and resource-efficient growth.

### Exclusions

Green Bond proceeds will not be directly allocated to projects for which the purpose is fossil energy production, nuclear energy generation, weapons and defence, potentially environmentally harmful resource extraction, gambling or tobacco.

### Financing and refinancing

An amount equal to the net proceeds can finance both existing and new Green Projects financed by Stockholm Exergi. New financing is defined as allocated amounts to Green Projects financed within the reporting year,

and refinancing is defined as allocated amounts to Green Projects financed prior to the reporting year. Operating expenditures qualify for refinancing with a maximum look-back period of three years prior to the issuance date of the Green Bond.

### The EU Taxonomy alignment and reporting

The EU Taxonomy Regulation is a classification system establishing a list of environmentally sustainable economic activities with the aim of scaling up sustainable investments and implementing the European green deal. To align with the Taxonomy, eligible economic activities must make a substantial contribution to at least one of its six environmental objectives. In addition, the activity must comply with the criteria for not harming any of the other environmental objectives (the Do No Significant Harm criteria, DNSH) and be carried out in compliance with Minimum Safeguards (MS) related to respecting human rights and following good business conduct rules.

Stockholm Exergi acknowledges the importance of a common definition of sustainable activities and strives to align the Green Projects of this Framework with the EU Taxonomy Climate Delegated Act where applicable and to the extent possible. We will strive to disclose the proportion of Taxonomy-alignment of our Green Project portfolio financed in our green bond reporting going forward.

# Green Project categories

## Eligible Green Projects

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### ICMA GBP categories:

Renewable energy

### EU Taxonomy objective:

Climate change

Mitigation

### SDGs:



### Bioenergy

(Eligible EU Taxonomy categories: 4.20. "Cogeneration of heat/cool and power from bioenergy" and 4.24. "Production of heat/cool from bioenergy")

- The construction, modernisation, operation and maintenance of facilities that produce heat/cool or co-generate heat/cool and power exclusively<sup>1</sup> from biomass, biogas or bioliquids, based on sustainably sourced bio-materials that are in compliance with the EU Renewable Energy Directive (RED) and its requirements on GHG emission reductions.

### Waste heat

(Eligible EU Taxonomy category: 4.25. "Production of heat/cool using waste heat")

- The construction, modernisation, operation and maintenance of facilities that produce heat/cool using waste heat, such as waste heat from district cooling, sea/lake water and treated wastewater.

<sup>1</sup> Some fossil oil is needed at start and stop (in 2022, <1% of total input)

### ICMA GBP categories:

Energy efficiency

### EU Taxonomy objective:

Climate change

Mitigation

### SDGs:



### Efficient district heating and cooling network

(Eligible EU Taxonomy categories: 4.15. "District heating/cooling distribution" and "4.16. Installation and operation of electric heat pumps")

- The construction, modernisation, operation and maintenance of pipelines and associated infrastructure for distribution of heating and cooling that complies with the EU Eco Design Framework directive and the EU Energy Efficiency Directive<sup>2</sup>.
- System modifications to lower temperature regimes or advanced pilot systems (such as control and energy management systems and Internet of Things solutions).
- Installation and operation of electric heat pumps that meet the refrigerant threshold (GWP) of 675.

### Energy storage

(Eligible EU Taxonomy categories: 4.10 "Storage of electricity" and 4.11 "Storage of thermal energy")

- The construction, modernisation, operation and maintenance of facilities that store electricity and return it at a later time in the form of electricity.
- The construction, modernisation, operation and maintenance of facilities that store thermal energy and return it at a later time in the form of thermal energy or other energy vectors.

### Low carbon water transport infrastructure

(Eligible EU Taxonomy category: 6.16. "Infrastructure enabling low carbon water transport")

Construction, modernisation, operation and maintenance of infrastructure that is required for zero tailpipe CO<sub>2</sub> operation of vessels or the port's own operations, as well as infrastructure dedicated to transshipment. Stockholm Exergi don't own any ships, these projects are limited to infrastructure serving our operations such as biofuel input and captured CO<sub>2</sub> for permanent storage.

- Infrastructure dedicated to the operation of vessels with zero direct (tailpipe) CO<sub>2</sub> emissions: electricity charging, hydrogen-based refuelling.
- Infrastructure dedicated to the provision of shore-side electrical power to vessels at berth.
- Infrastructure dedicated to the performance of the port's own operations with zero direct (tailpipe) CO<sub>2</sub> emissions.
- Infrastructure and installations dedicated to transshipping freight between the modes: terminal infrastructure and superstructures for loading, unloading and transshipment of goods.

<sup>2</sup> Compliance implies that the system uses at least 50% renewable energy or 50% waste heat or 75% cogenerated heat or 50% of a combination of such energy and heat.

# Green Project categories

## Eligible Green Projects

## Eligible Green Projects

### ICMA GBP categories:

Pollution prevention and control

### EU Taxonomy objective:

Climate Change Mitigation

### SDGs:



### Waste-to-energy

- The construction, modernisation, operation and maintenance of facilities dedicated to waste incineration to produce heat/cool and power that follows a waste hierarchy to ensure that as much of the waste as possible is reused and recycled before being converted to energy. Life-cycle aspects of waste transportation are also assessed.

### Material recovery

(Eligible EU Taxonomy category: 5.9. "Material recovery from non-hazardous waste")

- The construction and operation of facilities for the sorting and processing of separately collected non-hazardous waste streams into secondary raw materials involving mechanical reprocessing. At least 50%, in terms of weight, of the processed waste should be converted into secondary raw materials that are suitable for substituting virgin materials in production processes.

### Carbon Capture and Storage

#### Carbon Capture

The construction, modernisation, operation and maintenance of CCS facilities dedicated to the reduction, avoidance or removal of GHG emissions associated with bioenergy plants (BEECS) and waste-to-energy plants (CCS).

#### Carbon capture and utilisation

The construction, modernisation, operation and maintenance of CCU facilities processing separated carbon dioxide into new secondary raw material, creating sustainable carbon cycles.

#### Transport of captured CO<sub>2</sub>

(Eligible EU Taxonomy category: 5.11. "Transport of CO<sub>2</sub>")

Transport of captured CO<sub>2</sub> via all modes that meet all of the following criteria: (i) no leakages above 0.5% of the mass of CO<sub>2</sub> transported, (ii) CO<sub>2</sub> is delivered to a permanent CO<sub>2</sub> storage unit, (iii) appropriate leak detection systems are applied and a monitoring plan in place, with the report verified by an independent third party, and (iv) the activity may include the installation of assets that increase the flexibility and improve the management of an existing network.

#### Carbon storage

(Eligible EU Taxonomy category: 5.12. "Underground permanent geological storage of CO<sub>2</sub>")

Permanent storage of captured CO<sub>2</sub> in appropriate underground geological formations that comply with both of the following criteria: (i) meeting the relevant EU directives related to assessment, exploration and operation of storage sites and surrounding area and (ii) appropriate leakage detective systems are implemented and a monitoring plan is in place

### Research & Development for CCS and CCU technologies

(Eligible EU Taxonomy category: 9.1 "Close to market research, development and innovation")

- Research, applied research and experimental development of solutions, processes, technologies, business models and other products dedicated to the reduction, avoidance, removal or reuse of GHG emissions associated with bioenergy plants, waste-to-energy plants or for the production of biochar.



# Green Project categories

## Eligible Green Projects

## Eligible Green Projects

### ICMA GBP categories:

Sustainable water and wastewater management

### EU Taxonomy objective:

Sustainable use and protection of water and marine resources

### SDGs:



### Water collection, water treatment and water supply systems

- Construction, modernisation, operation and maintenance of facilities, systems and technologies designed to treat and reuse wastewater, such as water purification processes, water loss prevention, increased water use efficiency and energy efficiency investments that reduce energy consumption or environmental impacts.

### ICMA GBP categories:

Climate change adaptation

### EU Taxonomy objective:

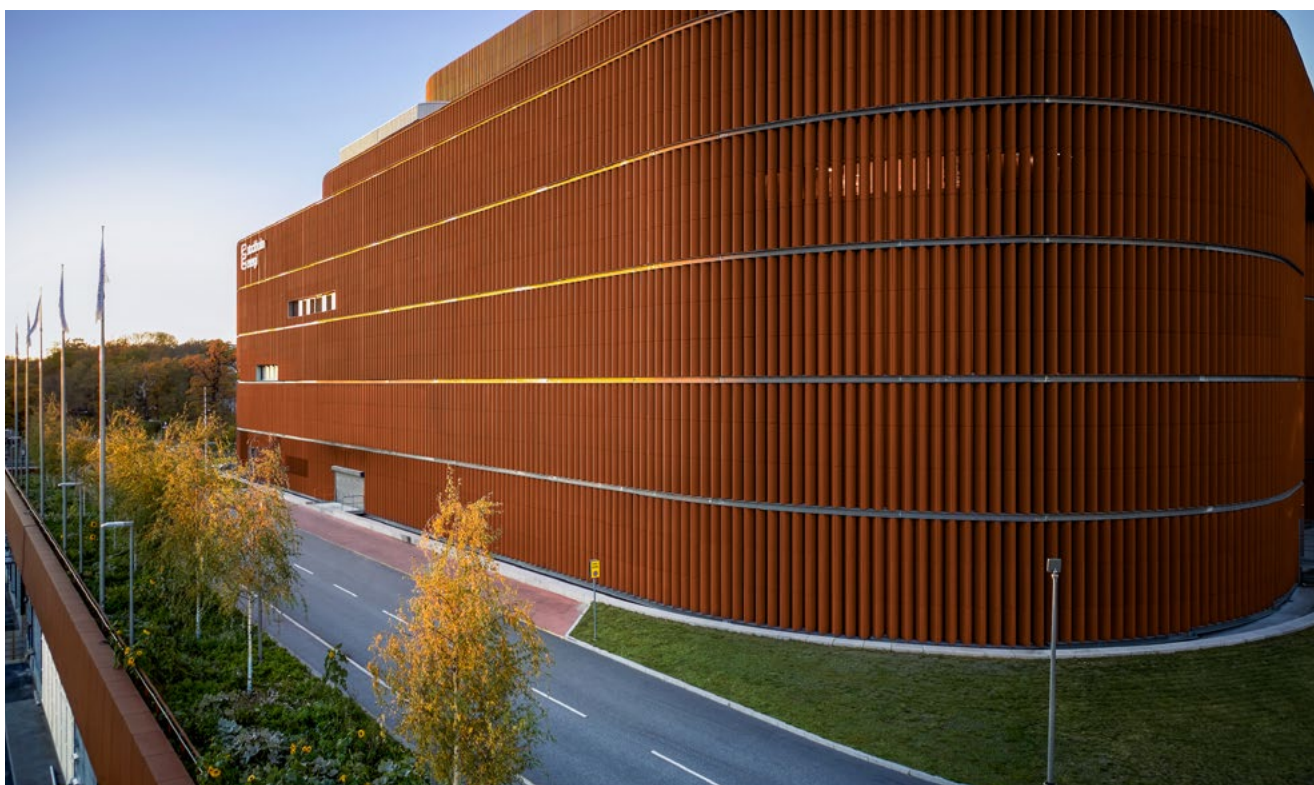
Climate Change Adaptation

### SDGs:



### Adaptation measures

- Investments to strengthen an asset or activity to withstand identified physical climate risks over its lifetime, such as adaptation measures aimed at reducing flood risks, e.g., creating wetlands and rainwater drainage systems.



## 2. Process for evaluation and selection of Green Projects Use of Proceeds

Sustainability is integrated throughout Stockholm Exergi's operations and is reflected in our vision, strategy, goal formulation and the decisions we take.

Our sustainability policy comprise our focus areas for sustainable development, such as respect for human rights, work safety, equality, diversity and inclusion, reduce climate impact and make responsible use of the Earth's resources, sustainable bioenergy and sustainable supply chains. The sustainability policy forms the basis of our management culture and guides us in conjunction with codes of conduct for us and our suppliers.

We take into account the risk and opportunities throughout the value chain and we make decisions with sustainability and financial responsibility in mind. Our structured and systematic working methods mean that we can develop and make constant improvements. This increases the value of our work and makes us a reliable supplier. As support tools, we have a certified management system for the working environment, quality and the environment. As sustainability is integrated in all our decisions, the process for Green Project evaluation and selection is based on the same standard decision-making processes and policies.

The process for evaluation and selection of Green Projects is managed by Stockholm Exergi's Green Bond Committee (the GBC), comprising the Chief Financial Officer, the Head of Sustainability and the Head of Treasury. The GBC is responsible for ensuring that an amount equal to the Green Bond net proceeds is allocated to Green Projects that comply with the Green Bond Framework and that have been evaluated from an ESG perspective in accordance with Stockholm Exergi's standards and policies.

The process to evaluate, select and allocate Green Bond proceeds to eligible Green Projects comprise the following steps:

**(i) Head of Treasury initiates a valuation** of the potential Green Projects in cooperation with the Sustainability Department. If a project is eligible, it will be added to the Green Project prospect pool.

**(ii) The GBC prioritizes and approves** potential Green Projects from the prospect pool based on adherence to the Green Bond Framework. If a project is approved, it will be added to the Green Project pool for allocation.

**(iii) The GBC allocates proceeds** from the issuance of Green Bonds to projects from the Green Project Pool for allocation. A decision to allocate proceeds will be made in consensus by the committee. Decisions made by the Committee will be documented and filed. Only projects which are chosen unanimously will be added to the list of allocated Green Projects.

**(iv) Selection and allocation decisions** are documented and filed.

The GBC holds the right to exclude any Green Projects already funded by Green Bond proceeds if the Green Project no longer meets the eligibility criteria defined in the Framework. In the event a Green Project is sold, or for other reasons loses its eligibility, funds will follow the procedure under Management of Proceeds until reallocated to another Green Project.

## 3. Management of proceeds

### Tracking of Green Bond net proceeds

The net proceeds from Green Bonds issued by Stockholm Exergi will be managed according to a portfolio approach. Stockholm Exergi will use a Green Register to track the allocation of net proceeds from Green Bonds to eligible Green Projects. The purpose of the Green Register is to ensure that net proceeds from Green Bonds only support the financing and/or refinancing of Green Projects. The Green Register will form the basis for the impact and allocation reporting.

### Temporary holdings

While any Green Bond net proceeds remain unallocated, Stockholm Exergi will temporarily place funds in the liquidity reserve and manage them accordingly. The maximum period that net proceeds may be unallocated is 12 months.

### Exclusions

Temporary holdings will not be placed in entities with a business plan focused on fossil energy production, nuclear energy generation, weapons and defence, potentially environmentally harmful resource extraction, gambling or tobacco.

# 4. Reporting

To enable the monitoring of performance and provide insight into prioritised areas, Stockholm Exergi will annually, until full allocation and in the event of any material developments, provide investors with a report describing the allocation of proceeds and the environmental impact of the Green Projects (the Green Bond Report).

## Allocation reporting

The allocation report will include the following information.

- A summary of Green Bond developments
- The nominal amount of Green Bonds outstanding
- The aggregate size of the portfolio of Green Projects that have been funded by Green Bonds and the split between each project category
- Relative share of new financing versus refinancing
- The amount of temporary holdings of net proceeds awaiting allocation (if any)
- Share of the Green Project Portfolio's alignment with the EU Taxonomy Climate Delegated Act

## Impact reporting

The impact reporting aims to disclose the environmental impact of the Green Projects financed under this Framework, based on Stockholm Exergi's financing share of each project. The report will, to the extent feasible, also contain relevant descriptions of methodology, baselines and assumptions used in the impact calculations.

The impact assessment is provided with the reservation that not all related data can be obtained and that calculations therefore will be made on a best effort basis. For example if a facility is under construction but not yet operational, Stockholm Exergi will provide best estimates of future energy production levels. Moreover, Stockholm Exergi will, to the extent possible, make every effort to follow the impact reporting principles stated in the "Nordic Public Sector Issuers: Position Paper on Green Bonds Impact Reporting". The impact report will, if applicable, be based on the impact reporting metrics presented in the table on the next page.

|  |  |
|--|--|
| <b>Renewable energy</b>                            | <ul style="list-style-type: none"> <li>- Renewable energy generation (MWh per year)</li> <li>- Installed renewable energy capacity (MW)</li> <li>- Quantity of reused/recovered waste energy (MWh per year)</li> <li>- GHG emissions reduced/avoided (tonnes per year)</li> </ul>  |
| <b>Energy efficiency</b>                           | <ul style="list-style-type: none"> <li>- Number of meters of piping or laid, upgraded or replaced</li> <li>- Pipe capacity increase (MW)</li> <li>- Type of low carbon water transport infrastructure investment</li> <li>- Energy use reduced/avoided (MWh or GWh or % per year)</li> <li>- GHG emissions reduced/avoided (tonnes per year)</li> <li>- GHG emissions per m<sup>2</sup> building area connected to district heating grid (kg/m<sup>2</sup>)</li> <li>- Storage capacity installed (MW)</li> </ul>  |
| <b>Pollution prevention and control</b>            | <ul style="list-style-type: none"> <li>- Energy recovery from thermal waste treatment (MWh per year)</li> <li>- GHG emissions reduced/avoided (tonnes per year)</li> <li>- Quantity of recovered material from waste (tonnes or % per year)</li> <li>- CO<sub>2</sub> emissions captured (tonnes per year) <ul style="list-style-type: none"> <li>- Tonnes of captured CO<sub>2</sub> emissions used in new secondary raw material, creating sustainable carbon cycles</li> <li>- Tonnes of captured CO<sub>2</sub> from BECCS or biogenic part of waste, creating permanent negative emissions</li> <li>- Tonnes of captured CO<sub>2</sub> transported and permanently stored</li> </ul> </li> </ul> |
| <b>Sustainable water and wastewater management</b> | <ul style="list-style-type: none"> <li>- Water savings (m<sup>3</sup> per year)</li> <li>- Volume of wastewater treated, reused or avoided (m<sup>3</sup> per year)</li> <li>- Capacity of facilities (m<sup>3</sup>)</li> </ul>   |
| <b>Climate change adaptation</b>                   | <ul style="list-style-type: none"> <li>- Physical climate risk addressed and expected adaptation related outcome (quantified if possible).</li> </ul>  |



# External Review

## Second-Party Opinion

S&P Global Ratings has provided a second party opinion to this Framework verifying its credibility, impact and alignment with the ICMA Green Bond Principles.

## Post-issuance verification

An independent external party, appointed by Stockholm Exergi, will on an annual basis, until full allocation of the net proceeds and in the event of any material changes, provide a review confirming that an amount equal to the Green Bond net proceeds has been allocated to eligible Green Projects.

## Publicly available documents

The Green Bond Framework and the second party opinion will be publicly available on Stockholm Exergi's website, together with the post-issuance review and the Green Bond Report once published.

## Stockholm Exergi in brief

Stockholm Exergi is Stockholm's energy provider. Using resource-efficient solutions, we ensure that the growing Stockholm region has access to electricity, heating, cooling and waste services. We provide heat to more than 800,000 Stockholmers and our 3,000-kilometre-long district heating network forms the basis for the societal benefits that we create together with our customers and partners. We are owned by the City of Stockholm and Ankhiale and our 700 employees work every day to reduce Stockholmers' climate impact. By developing carbon dioxide capture technologies, we are committed to making zero emissions a reality.

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