

GREEN FINANCE FRAMEWORK

OCTOBER 2019



1. INTRODUCTION

ABOUT METSÄ GROUP

Metsä Group is a Finnish-based forest industry company. Its parent company is Metsäliitto Cooperative with its over 100,000 forest-owner members that value their forests in a long-term and sustainable manner. The Group consists of Metsäliitto Cooperative with its business areas Metsä Forest and Metsä Wood; Metsä Board Corporation, Metsä Fibre Ltd. and Metsä Tissue Corporation, and innovation company Metsä Spring.

Metsä Group operates in resource-wise bioeconomy utilising renewable wood from sustainably managed northern forests. We focus on wood supply and forest services, wood products, pulp, fresh fibre paperboards and tissue and greaseproof papers through dedicated business areas. We serve global markets and our products are sold in over 130 countries.

METSÄ GROUP

METSÄLIITTO COOPERATIVE		GROUP'S PARENT COMPANY		OWNED BY ABOUT 100,000 FINNISH FOREST-OWNERS	
METSÄ FOREST WOOD SUPPLY AND FOREST SERVICES	METSÄ WOOD WOOD PRODUCTS	METSÄ FIBRE PULP AND SAWN TIMBER	METSÄ BOARD PAPERBOARD	METSÄ TISSUE TISSUE AND GREASEPROOF PAPERS	
Holding Metsäliitto Cooperative 100%	Holding Metsäliitto Cooperative 100%	Holding Metsäliitto Cooperative 50.1% Metsä Board 24.9% Itochu Corporation 25.0%	Holding Metsäliitto Cooperative 45.1% share of votes 63.2%	Holding Metsäliitto Cooperative 100%	

METSÄ SPRING | INNOVATION COMPANY

*as per 31.10.2019 (revised in case of changes in the holdings)

SUSTAINABILITY AS PART OF STRATEGY

Metsä Group works for strong, profitable growth. Our business is based on renewable raw materials and recyclable products, in which wood from northern, sustainably managed forests and our profound expertise provide a competitive advantage. We develop our operations sustainably, always taking into account the economic, environmental and social aspects of our operations. By applying the sustainable forest management practices, we contribute to the growth of forests and by investing in the best technologies, we expand our industrial operations sustainably and contribute to the shift from fossil economy to circular bioeconomy. The majority (around 80 per cent) of the wood Metsä Group procures comes from Finland. In addition wood is procured from Sweden, the Baltic countries and Russia. Established forest management legislation is the basis for Metsä Group's wood procurement supported by the sustainable forest certification schemes (PEFC and FSC).

Sustainability is a profound part of Metsä Group's strategy and operations. Since 2003, Metsä Group has been committed to the UN Global Compact (UN GC) and the initiative's ten principles concerning human rights, labour rights, environment and anti-corruption. Metsä Group's sustainability principles are based on this globally acknowledged initiative, and they are included in the Group's Code of Conduct and Environmental Policy.

The importance of the UN Sustainable Development Goals (UN SDGs) has been recognised at Metsä Group. Our strategic sustainability objectives and agenda are in line with the SDGs, and with our operations we support them in a material way. We have identified seven SDGs (6, 7, 8, 9, 12, 13, 15) to which we have a direct and material contribution.

Metsä Group products substitute fossil-based and non-renewable materials. In our R&D we focus on further exploring new opportunities in the development of new bioproducts. Metsä Group R&D work focuses on three areas:

- Circular economy and resource efficiency
- Renewable raw materials and sustainable value chain
- Value-added products and services

We utilise each fraction of wood to high added-value products, and our target is to develop the use of all the production side streams resource-wisely in circular bioeconomy.

SUSTAINABILITY OBJECTIVES AND TOPICS

RELATED TO GREEN FINANCE

Metsä Group's strategic sustainability 2030 objectives, that also build the Group's sustainability agenda, are the following:

- Increasing the amount of carbon stored in forests and products and safeguarding biodiversity
- Fossil free mills and resource-efficient production
- Sustainable supply chain and fossil free raw materials
- Responsible corporate culture and accident-free work environment

The material topics, that support the strategic sustainability management and reaching the 2030 objectives, are:

1. Sustainable forest management and biodiversity
2. Resource efficiency, emissions to water and air, water use, renewable energy, circular economy
3. Product safety, innovations, new bioproducts
4. Safety at work, supporting local livelihoods and society

The baseline of the 2030 objectives is 2018. The progress of our sustainability work is reported openly and transparently on an annual basis in Metsä Group's Sustainability Report, assured by a third party. The performance of the Group's sustainability 2020 targets is available in earlier reports. Metsä Group, for example, has reduced fossil CO₂ emissions per product tonne by 45 per cent in 2009-2018.

SUSTAINABILITY GOVERNANCE AT METSÄ GROUP

Metsäliitto Cooperative's Board of Directors is the highest body approving sustainability objectives and guiding policies. The Group's CEO and President has the highest operative responsibility for sustainability management, supported by the Group's Executive Management Team, the Management Team of Sustainability Process and the Compliance Committee. The Management Team of Sustainability Process consists of the Business Area and function representatives, who are also responsible for the implementation of sustainability objectives throughout the organisation. At Metsä Group, sustainability process is led by the VP, Sustainability, who reports to the SVP, Corporate Affairs.

GREEN FINANCE FRAMEWORK

Each company in Metsä Group uses this Metsä Group Green Finance Framework to finance or refinance their respective Green investment projects with Green Bonds or Green Loans ("Green Debt").

Metsä Group's companies Metsäliitto Cooperative with its business areas Metsä Forest and Metsä Wood; Metsä Board Corporation, Metsä Fibre Ltd. and Metsä Tissue Corporation, and innovation company Metsä Spring are separately financed and have their own Green Debt with Eligible Projects defined individually for each group company based on the criteria set forth below.

This Green Finance Framework is based on the 2018 version of Green Bond Principles and the 2018 version of Green Loan Principles, published by the International Capital Markets Association ("ICMA") and the Loan Market Association ("LMA"), Asia Pacific Loan Market Association ("APLMA") and the Loan Syndications and Trading Association ("LSTA") respectively.







Metsä Group aims to align any Sustainability Linked Instrument with the latest version of the Sustainability Linked Loan Principles ("SLLP"), published by the LMA, APLMA and LSTA. This Framework provides the background for positioning the rationale for Sustainability Linked Instruments within Metsä Group's overarching sustainability strategy. For each Sustainability Linked Instrument, Metsä Group will set out specific Sustainability Performance Targets ("SPTs") that are aligned with its overall sustainability objectives and strategy.

For the avoidance of doubt, Sustainability Linked Instruments and Green Debt are not synonyms nor mutually exclusive transaction types, and there may be times when an instrument can be both Sustainability Linked and Green Debt. However, Green Debt are always defined by the Green Eligible Assets and Projects criteria described in this Framework. Metsä Group aims at providing information regarding the type of the instrument in connection to any Sustainability Linked Instrument or Green Debt issued.

2. USE OF PROCEEDS

The amount equal to the net proceeds of Green Debt issued by Metsä Group entities will be used to finance or re-finance Eligible Assets and Projects that have been evaluated and selected by Metsä Group in accordance to this Green Finance Framework. Refinancing of Eligible Projects will have a look-back period of no longer than 3 years from the time of issuance.

ELIGIBLE ASSETS AND PROJECTS

Green Bond Principles Categories	Metsä Group description of projects	Linkage to the UN SDGs
Renewable Energy	<p>Renewable energy means energy produced of the biomass generated from harvesting residues, or resource-efficient energy production from side streams of the bioproduct and pulp mills, sawmills and other mechanical wood engineering operations, board mills or tissue paper mills.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> increase the production or share of renewable energy instead of fossil-based energy renew the equipment or process for renewable energy production at mills 	
Energy Efficiency	<p>Energy efficiency projects develop production technology and processes to reduce the consumption of energy in relation to production.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> develop production processes to reduce energy consumption replace equipment with more energy efficient solutions. Typically, the improvement in these projects is over 25 % renew the production line entirely or partially to improve specific energy consumption per production develop the energy recovery of processes develop closed loop processes (e.g. water systems) are "Green field investments" for the production unit utilising best available technology (BAT) compared to the earlier practices. 	
Pollution Prevention and Control	<p>Projects related to improving the environmental performance of our operations as well as improving the utilisation of all resources.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> prevent and/or decrease emissions to air prevent and/or decrease emissions to water improve the utilisation of industrial side streams reduce the amount of landfill waste 	
Environmentally sustainable management of living natural resources and land use	<p>Projects that develop sustainable forest management practices, such as harvesting, regeneration and transportation of wood from sustainably managed forests.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> improve sustainable forest management practices and safeguard biodiversity based on international sustainable forest management schemes, such as PEFC and/or FSC increase the amount of carbon stored in forests 	
Sustainable Water (and waste water) Management	<p>Projects that improve sustainable use of water. Water is globally a key resource. Even though Metsä Group operates in areas with abundant surface water resources, we aim to reduce water use even further.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> reduce the intake of water and the use of process water improve the recycling and reuse of process water use cooling water to heat raw waters 	
Circular Economy Adapted Products, Production Technologies and Processes	<p>Projects that explore new sustainable, wood-based alternatives to be commercialised and to broaden the product portfolio of forest industry.</p> <p>Examples of eligible uses are projects that</p> <ul style="list-style-type: none"> take ideas from the R&D to production and full commercialisation enable more sustainable and more resource-efficient production. improve material efficiency 	

3. SELECTION AND EVALUATION OF ELIGIBLE PROJECTS

Metsä Group has designed and implemented a process to ensure that only projects aligned with the criteria set out above will be selected as Eligible Assets and Projects for its potential Green Debt issuances. To oversee this a Sustainable Funding Committee has been established with members from management, treasury, sustainability and investment management. Metsä Group's CFO is the chair of the committee.

Metsä Group follows the below process when selecting and evaluating projects for the Eligible Projects.

1. Each Metsä Group company is responsible for the evaluation of its own investments and have them approved by their respective group company internal decision making order. Major investments are always decided by the Board of Directors of the respective Metsä Group company.
2. The group company makes the first evaluation of the projects' eligibility for Green Debt and proposes the projects to Metsä Group Sustainable Funding Committee.
3. Metsä Group Sustainable Funding Committee finally reviews the eligibility of proposed investments and approves investments eligible to be financed with Green Debt.

4. MANAGEMENT OF PROCEEDS

Metsä Group will establish a Green Funding Register for each company in relation to potential Green Debt issued by Metsä Group companies for the purpose of monitoring the Eligible Assets and Projects and the allocation of the amount equal to the net proceeds from any group company's Green Debt to Eligible Assets and Projects.

Metsä Group companies will over the duration of their outstanding Green Debt build up and maintain an aggregate amount of Asset and Projects in the Green Funding Register that is at least equal to the aggregate net proceeds of all outstanding Green Debt of the Metsä Group company.

There may be periods when the total outstanding net proceeds of Metsä Group company's Green Debt temporarily exceeds the value of the Eligible Assets and Projects in the Green Funding Register. Any such portion will be held in accordance with Metsä Group's normal liquidity management policy.

The Green Funding Register is maintained by Metsä Group Treasury and will form the basis for the impact reporting.

5. REPORTING

Metsä Group will publish annually on its website on www.metsagroup.com/gff a report on the allocation and impact of Green Debt issued under this framework. In addition, the Group companies will publish a report, when relevant. Metsä Group will seek to align the reporting with the latest standards and practices as identified by ICMA and the guidelines in the Nordic Public Sector Issuer's Position Paper on Green Bond Impact Reporting. The impact report will, to the extent feasible, also include a section methodology, baselines and assumptions used in impact calculations.

ALLOCATION REPORT

The allocation report will, to the extent feasible, include the following components:

- For each Metsä Group company a list of all Eligible Assets and Projects funded including amounts allocated
- Descriptions of selected Eligible Assets and Projects financed
- Amounts allocated in each category as defined in the Use of Proceeds section and the relative share of new financing versus refinancing

IMPACT REPORT

Metsä Group will strive to report on the actual environmental impact of the investments financed by their Green Debt. If/when actual impact for some reason is not observable, or unreasonably difficult to source, estimated impact will be reported.

The impact indicators may vary with investment category, as defined in this Green Finance Framework. The impact metrics selected may include the following:

- Renewable Energy
 - Total Renewable Energy generated in MWh
 - Total Reduction of fossil-based energy in MWh or avoided fossil CO2 emissions
- Energy Efficiency
 - Reduced energy consumption as MWh in relation to production (in tons or m3)
 - Reduced / avoided fossil CO2 emissions
- Pollution prevention and control
 - Reduced emissions to air in relation to production
 - Reduced emissions to water in relation to production
 - Reduction of landfill waste in relation to production (in tons and in tons/production)
 - Improved utilisation of side streams for higher value-added end-uses (share)
- Sustainable Water Management
 - Reduced amount of process water in relation to production (m3/ton)
- Sustainable Forest Management
 - Share of FSC or PEFC certified wood (used/delivered certified wood per all used/delivered wood, %)
- New circular bioeconomy solutions
 - in case of investment to a new technology, better environmental performance or carbon footprint in comparison to earlier technology (e.g. textile)
 - externally validated lifecycle calculations

6. EXTERNAL REVIEW

Metsä Group has engaged Sustainalytics to act as an external verifier of this Green Finance Framework. The Second Party Opinion is publicly available on Metsä Group website www.metsagroup.com/gff.

Make the most of **Metsä**



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