

LABELED BOND AND LOAN ASSESSMENT METHODOLOGY

MSCI ESG Research LLC

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Contents	Introduction	3
	Green, Social and Sustainability Bonds and Loans	3
	Bond and loan assessment methodology	4
	1 Use of proceeds	5
	2 Process for project evaluation and selection	7
	3 Management of proceeds	7
	4 Ongoing reporting	8
	Appendix I: Use of proceeds categories	10
	Green	10
	Social	14
	Target demographics	16
	Appendix II: Chronology of methodology updates	17
	Green	17
	About MSCI	20
	Contact us	20

Introduction

This document outlines our approach to defining bonds and loans labeled as:

- Green;
- Social; or
- Sustainability.

Such labeled bonds and loans are instruments whose proceeds have a clear net positive environmental and/or social impact¹. Our approach aims to have clear criteria to define such instruments. This methodology is subject to change based on the evolving areas for use of proceeds, changes in regulatory requirements and standard definitions.

Green, Social and Sustainability Bonds and Loans

Proceeds

The proceeds of labeled Bonds and Loans are exclusively and formally applied to projects or activities that:

- Promote the transition to a low-carbon economy or other environmental sustainability purposes, i.e., **Green**.
- Aim to address or mitigate a specific social issue and/or seek to achieve a positive social outcome, especially but not exclusively, for a target population, i.e., **Social**.
- Include both the Green and Social criteria above, i.e., **Sustainability**.

For bond instruments, “proceeds” shall mean net proceeds, i.e., all proceeds minus the cost of issuance of bonds. or an equivalent amount. Loans include syndicated loans and revolving credit facilities.

Nomenclature

There are differing naming conventions used for bonds and loans in our coverage universe. Self-labeled green, social or sustainability bonds² and self-labeled green, social or sustainability loans are evaluated using these criteria to identify bonds and loans that may have a positive environmental and/or social benefit.

¹ Sustainability-linked bonds and loans, where the coupon of general-purpose bonds and loans is linked to sustainability performance, are outside the scope of this methodology which is proceeds focused.

² This includes standard use of proceeds bonds, revenue bonds, project bonds and secured bonds.

For example:

- Green bonds and green loans can be issued under a sustainability bond/loan framework or may be called “climate mitigation bonds/loans”, “blue bonds/loans”, or other similar nomenclatures.
- Social bonds and social loans can be issued under a sustainability bond/loan framework or may be called “positive impact bonds/loans,” “healthcare bonds/loans” or other similar nomenclatures.
- Sustainability bonds and sustainability loans can be issued under a sustainable bond/loan framework, Sustainable Development Goals (SDG) bond/loan framework or other similar nomenclatures.

Post-issuance labeling

In cases where issuers label a bond as green, social or sustainability after the issuance of that bond, we consider the bond to be eligible for assessment only where the labelling occurs within six months of issuance.

Bond and loan assessment methodology

We independently evaluate bonds and loans along four dimensions to determine whether an instrument meets the requirements for the labeling. The evaluation criteria reflect themes articulated in principles administered by the International Capital Markets Association (“ICMA”) and the Loan Market Association (“LMA”).

For each type of labeled instrument, we require clarity about the instruments’:

1. stated use of proceeds;
2. process for project evaluation and selection;
3. process for management of proceeds; and
4. commitment to ongoing reporting.

Green bonds issued prior to the launch of the ICMA's Green Bond Principles in 2014, are subject only to criteria one (use of proceeds).

Inadequate information on the issuer’s labeled bond program and adherence to the four eligibility criteria would result in a bond being considered “Under Review”. If, after six months of being “Under Review”, we still lacks sufficient information to determine bond eligibility, the bond will be considered permanently ineligible for assessment.

The primary difference between the respective MSCI ESG Research methodologies³ and the respective principles set out by ICMA and LMA is in the assessment of use of proceeds. Our methodologies contain more explicit eligibility and ineligibility criteria.

Figure 1: Labeled Bond & Loan Principles

Instrument:	Bonds	Loans
Administered by	ICMA	LMA
Green	Green Bond Principles ⁴	Green Loan Principles ⁵
Social	Social Bond Principles ⁶	Social Loan Principles ⁷
Sustainability	Sustainability Bond Guidelines ⁸	n/a ⁹

1 Use of proceeds

We reviewed external market standards and norms to determine the use of proceeds categories and within these categories the eligible and ineligible use of proceeds. These are set out in Appendix 1.

To meet the minimum use of proceeds requirements under our labeled bonds and loans methodologies, bonds and loans are required to allocate 100% of proceeds to projects with a positive benefit, with at least 90% of the proceeds allocated to the eligible use of proceeds categories defined by MSCI ESG Research and zero amounts allocated to use of proceeds categories identified by MSCI ESG Research as leading to ineligibility.

³ The “green” component of this methodology is called the MSCI Green Bond and Green Loan Assessment Methodology, the “social” component is called the MSCI Social Bond and Social Loan Assessment Methodology and the “sustainability” component is called the MSCI Sustainability Bond and Sustainability Loan Assessment Methodology.

⁴ International Capital Market Association (ICMA), The Green Bond Principles (GBP) 2021. June 2021.

⁵ The Green Loan Principles refer to the Green Bond Principles administered by ICMA, and hence have similar definitions of Principle 1, i.e., eligible Use of Proceeds as the Green Bond Principles

⁶ International Capital Markets (ICMA), The Social Bond Principles (GBP) 2021. Updated June, 2022

⁷The Social Loan Principles refer to the Social Bond Principles administered by ICMA, and hence have similar definitions of Principle 1, i.e. eligible Use of Proceeds as the Social Bond Principles

⁸ International Capital Market Association (ICMA), The Sustainability Bond Guidelines (SBG) 2021, June 2021.

⁹ As of February 2023, LMA has not published Sustainability Loan Principles.

Figure 2: Use of proceeds requirements (all three must be met)

% of Proceeds	Green	Social	Sustainability
100%	Should have positive environmental benefits, i.e., intended to facilitate sustainable economic growth with more efficient resource management and reduced greenhouse gas (GHG) and toxic emissions.	Should have positive social benefits i.e., intended to address essential needs of a defined target demographic to facilitate economic and social inclusion.	Should have both positive environmental and social benefits.
>90%	Allocated to one or more of the seven eligible green categories defined by MSCI ESG Research (Alternative Energy; Pollution Prevention and Control; Sustainable Water; Green Building; Climate Adaptation; Other Environmental). ¹⁰	1. Allocated to one or more of the eight eligible social need categories defined by MSCI ESG Research (Food Security; Healthcare; Real Estate; Access to Finance; Education; Basic Infrastructure; Employment Generation; Other Social). ¹¹ 2. Proceeds must benefit an eligible target demographic.	Allocated to one or more of the eligible green categories <u>and</u> to one or more of the eligible social need categories (while also meeting the targeted demographic requirement).
Nil	Funding to thermal coal extraction or coal-based energy generation, agriculture for tobacco or manufacturing of tobacco-based products, or manufacturing of controversial weapons (including cluster munitions, landmines, biological / chemical weapons, depleted uranium weapons, blinding laser weapons, incendiary weapons, and/or non-detectable fragments).		

^{10, 11} For detailed criteria, please refer to Appendix 1.

2 Process for project evaluation and selection

The labeled bond issuer or labeled loan borrower must clearly delineate:

- for green bonds and loans, the environmental objectives of the projects being funded, for social bonds and loans, the social objectives of the projects being funded and for sustainability bonds and loans, the environmental and social objectives of the projects being funded;
- the specific criteria and process for determining eligible projects or investments in the bond or loan-related documentation which can include but is not limited to the relevant labeled bond or loan framework, investor presentation or website; and
- the processes by which it identifies and manages perceived environmental and social risks associated with relevant projects or investments.

3 Management of proceeds

Loans

For labeled loans, a formal process to track allocation of proceeds raised to the eligible use of proceeds must be disclosed in the documentation, to maintain the transparency of the loan.

Where a labeled loan takes the form of one or more tranches of a loan facility, each tranche must be clearly designated, with the proceeds of individual tranches credited to a separate account or tracked by the borrower in an appropriate manner.

Bonds

For labeled bonds, a formal process to apply proceeds raised or an amount equal to proceeds raised to the eligible use of proceeds must be disclosed in the bond prospectus or supporting documentation.

Eligible mechanisms to apply proceeds raised or an amount equal to proceeds raised include:

- creation of a separate legal entity;
- creation of a sub-portfolio linked to the issuer’s investment operations for eligible projects; or
- other auditable mechanism whereby the balance of tracked proceeds is reduced periodically by amounts matching investments made in eligible projects during that period.

The issuer should make known to investors the intended types of temporary placement for the balance of unallocated proceeds.

The proceeds of labeled bonds and loans can be managed per bond (bond by bond approach) or on an aggregated basis for multiple labeled bonds of the same type (e.g., portfolio approach towards all green bonds of the issuer).

4 Ongoing reporting

Requirements for issuers / borrowers

At issuance, the labeled bond issuer or labeled loan borrower must either report on projects or state its commitment to report within one year of issuance.

The labeled bond issuer or labeled loan borrower must further report at minimum on an annual basis thereafter for the life of the bond or loan, or until proceeds have been fully disbursed, whichever is earlier.

Post full allocation of proceeds, labeled bond issuers or labeled loan borrowers must report on a systematic, regular basis in case of any material developments that impact funding to eligible projects.

Reporting must include one or more of the following:

- a list of specific projects/investments, including amount disbursed to each individual project; or
- aggregate project/investment categories, including amount disbursed to each project type.

Labeled bond issuers and labeled loan borrowers can report on an individual bond level or an aggregated portfolio approach.

MSCI ESG Research assessment process

For labeled bonds or labeled loans within our standard coverage universe,¹² we review adherence to the annual reporting requirements, including the confirmation of whether the use of proceeds continues to meet the eligibility criteria.

- **Use of proceeds:** We evaluate annually the amounts disbursed to each project or project type and assess whether the proceeds continue to meet the requirements set out in Figure 2, above. Where the reported use of proceeds deviates from the

¹² This includes all bonds that are part of the Bloomberg MSCI Green Bond Index. It also includes bonds and loans for which MSCI ESG Research is contractually bound to provide a Second Party Opinion on annual labeled bond or labeled loan reporting.

use of proceeds requirements in Figure 2, the bond or loan will no longer be considered to meet the labeled bond or loan criteria as per our assessment.

- **Availability of reporting:** Starting one year from issuance of the labeled bond or initiation of the labeled loan or one year since the previous annual reporting date, MSCI ESG Research reviews reporting, where available. If the required reporting is not available three months after the reporting due date, the labeled bond or labeled loan is assessed as “On Watch”. If the required reporting is not available six months after the reporting due date, the bond or loan will no longer be considered to meet the labeled bond or loan criteria as per our assessment.

Figure 3: Availability of reporting

Months*	Reporting Status
12	Annual Report due for publication
15 ¹³	If reporting not available, assessed as “On Watch” by MSCI ESG Research
18	If reporting still not available, labeled Bond/Loan no longer considered to meet the labeled bond or loan criteria due to lack of transparency, as per MSCI ESG Research’s assessment.

*Since of issuance of the bond or initiation of the loan or since the previous annual reporting date

¹³ This allows time for contact with the issuer or borrower in case any questions or issues are raised. This is necessary since labeled bond and labeled loan reporting is not yet standardized, and reports are not always available through standard financial reporting channels.

Appendix I: Use of proceeds categories

Green

Category	Eligible	Ineligible
Alternative energy	<p>Investments in products, services, manufacturing or infrastructure projects that support the development or delivery of renewable energy and alternative fuels, including:</p> <ul style="list-style-type: none"> • Generation, transmission, and distribution of energy from renewable sources including wind, solar, geothermal, biomass¹⁴, small-scale hydro (25 MW)¹⁵, large-scale hydro (subject to additional sustainability criteria, as noted below), waste-to-energy, and wave and tidal energy. • Fuels, technology, and infrastructure for the production and distribution of cleaner hybrid fuels, green hydrogen, fuel cells, and alternative fuels, including biodiesel, biogas, and cellulosic ethanol. • Due to their potential negative environmental and social externalities (e.g., potential damage to biodiversity due to construction of an embankment or potential displacement of local communities due to the same) large-scale hydroelectric projects are only considered as “green” if they satisfy one of the following international sustainability best practices: <ul style="list-style-type: none"> ○ Hydropower Sustainability Assessment Protocol – a published assessment report and score of ‘3’ or above (i.e., in line with “Good Practices”) on all relevant pillars¹⁶; or 	<ul style="list-style-type: none"> • Funding to mining or extractive technologies or processes

¹⁴ Biomass needs to be sustainably sourced i.e., sourced from FSC (Forest Stewardship Council), PEFC (Programme for the Endorsement of Forest Certification), SBP (Sustainable Biomass Program) or RSB (Roundtable on Sustainable Biomaterials) certified sources.

¹⁵ Small hydro is formally defined as including projects that fall below the thresholds set by the International Commission on Large Dams (ICOLD), which require that dams be below 15 meters in height (Source: “Constitution Status”, ICOLD/CIGB, July 2011). MSCI ESG Research defines dams under 25MW in capacity qualify as “small”, as capacity is used as a proxy for size where detailed information is not available. Large hydro is defined as all projects exceeding the small hydro thresholds.

¹⁶ “Hydropower Sustainability Assessment Protocol, Background Document”, International Hydropower Association, May 2020.

Category	Eligible	Ineligible
	<ul style="list-style-type: none"> ○ International Finance Corporation (IFC) Performance Standards - a stated commitment before or at issuance of the bond or loan to meet the requirements outlined by all eight IFC Performance Standards¹⁷. 	
Energy efficiency	<p>Investments in products, services, infrastructure, or technologies that proactively address the growing global demand for energy while minimizing effects on the environment, including:</p> <ul style="list-style-type: none"> • Technologies and systems that promote efficiency of industrial operations (e.g., turbines, motors, and engines), industrial automation and controls, and optimization systems (e.g., cloud computing, data optimization systems). • Infrastructure, technology, and systems that increase the efficiency of power management, power distribution (including electric district heating and cooling systems), power storage (e.g., batteries) and demand-side management (e.g., wireless sensors, advanced meters, smart grid). • Pumped storage hydroelectric projects that meet the large hydropower sustainability criteria indicated above. • Technologies and systems focused on reducing fuel consumption of transport vehicles and industrial operations (e.g., hybrid/electric vehicles, bicycles). • Sustainable transportation infrastructure including urban mass transit, efficiency improvements of public transportation fleets, freight rail and related infrastructure (provided the rail is not dedicated to fossil fuel transport), electric vehicle charging, electric bicycle charging infrastructure, improved traffic systems. • Heating, ventilation and air conditioning (HVAC) equipment and systems, architectural glass, efficient lighting, insulation, building automation and controls, electric heat pumps and devices and systems designed to be utilized in the design and construction of environmentally sustainable buildings. 	<ul style="list-style-type: none"> • Corporate operational energy efficiency efforts, such as efficiency gains in manufacturing, transporting, or distributing standard products or services, where proceeds are not directly used for energy efficiency improvements or retrofits. • Energy efficiency in fossil fuel-based energy generation, except for natural gas-based co-generation.
Pollution prevention & control	<ul style="list-style-type: none"> • Products, services, or projects that support pollution prevention, waste minimization, or recycling as a means of alleviating the burden of unsustainable waste generation, including: • Technologies, systems, and projects that aim to reduce air pollution (e.g., environmental IT, conventional pollution control systems and direct air carbon capture and storage). 	<ul style="list-style-type: none"> • Landfill or incineration waste treatment projects without a specific waste-to-energy component.

¹⁷ “Performance Standards on Environmental and Social Sustainability” International Finance Corporation. January 1, 2012.

Category	Eligible	Ineligible
	<ul style="list-style-type: none"> Projects to salvage, use, reuse, and recycle post-consumer waste products, including composting of organic waste. Waste treatment and environmental remediation projects, including land treatment and brownfield cleanup, soil washing, chemical oxidation, bioremediation. Note that this is only valid where the issuer itself or any of its subsidiaries (majority or minority owned) or partner firms are not responsible for the contamination that has occurred. Sustainable alternative materials such as raw materials, low VOC paints and adhesives used in the construction of green buildings. 	
Sustainable water	<p>Products, services, and projects that attempt to resolve water scarcity and water quality issues, including minimizing and monitoring current water use and demand increases, improving the quality of water supply, and improving the availability and reliability of water, such as:</p> <ul style="list-style-type: none"> Infrastructure and engineering projects that develop new or repair existing water and sanitation pipelines, including equipment and technology providers, resulting in improved quality and/or water use efficiency. Note that all large dams (i.e., above 15 meters in height) for water storage need to have a stated commitment to meet the requirements outlined by all eight IFC Performance Standards¹⁸. Technologies and products that reduce, reuse, or recycle water as a means of conservation (e.g., smart metering devices, low-flow equipment, and rainwater harvesting systems). Advanced materials, equipment, technologies, and services that filter or chemically treat wastewater for consumer or industrial use, including desalination. Investments in protection of land, forests, and other vegetation in the upper watershed as a means to improve the quality of water bodies and groundwater recharge areas. 	<ul style="list-style-type: none"> Distribution of water, including drinking water, without measurable improvements to water quality, water efficiency, or climate change resilience components.
Green building	<p>Design, construction, redevelopment, retrofitting, or acquisition of green-certified properties – subject to local green building criteria, including:</p> <ul style="list-style-type: none"> Properties that are certified as green based on the local country’s environmental performance standard (e.g., based on Energy Star, NABERS [>3], or equivalent) or environmental design standards (e.g., LEED Certified, BREEAM, NZEB, Passive house or local equivalent). 	

¹⁸ “Performance Standards on Environmental and Social Sustainability” International Finance Corporation. January 01, 2012.

Category	Eligible	Ineligible
	<ul style="list-style-type: none"> • Properties that rank in the top 15% on energy efficiency measures relative to same-sector properties within the local market (e.g., top 15% of buildings on energy efficiency in a specific city, district, state or country). The issuer must demonstrate that the buildings fall within the top 15% in energy efficiency in the market. • Mortgage-backed securities and bonds that fund real estate properties that achieve a minimum 30% improvement in energy efficiency compared to baseline performance prior to the renovations and other capital improvements funded through the use of proceeds 	
Climate adaptation	<p>Projects that reduce the vulnerability of social or environmental systems to the effects of risks related to climate change by maintaining or increasing adaptive capacity, reducing sensitivity to climate change or increasing climate resilience, including:</p> <ul style="list-style-type: none"> • Flood protection (e.g., flood defenses, waterway management, pumping stations and drainage improvement); • Food security and stress-resilient agricultural systems; • Reforestation and watershed management; • Climate resiliency services (e.g., modernization of meteorological systems and catastrophe risk insurance). 	
Other environmental	<p>This category includes environmental activities and projects that are not covered in the six categories described above.</p> <p>These activities and projects include, but are not limited to:</p> <ul style="list-style-type: none"> • the protection and conservation of biodiversity; • sustainable forestry and afforestation projects; and • sustainable agricultural projects. <p>Note that funding to research and development for the categories described above is eligible.</p>	

Social

Category	Eligible	Ineligible
Food security	<ul style="list-style-type: none"> • Products, services or infrastructure projects that support the delivery of basic food, as defined by Choices International Foundation. • Assistance provided to improve agricultural efficiency, agricultural supply chain and prevent food wastage. 	<ul style="list-style-type: none"> • Delivery of confectionery items, tobacco, alcohol and gourmet food.
Healthcare	<p>Products, services or infrastructure projects that support the development or delivery of the following, based on need of the target population, patient or consumer:</p> <ul style="list-style-type: none"> • Medical infrastructure like clinics, dispensaries and hospitals. • Medical equipment. • Pharmaceutical products. • Training of hospital staff and welfare workers. 	<ul style="list-style-type: none"> • Beauty products and high-end cosmetic procedures, controversial clinical trials (e.g., clinical trials that do not commit to the World Medical Association Declaration of Helsinki - Ethical Principles for Medical Research Involving Human Subjects, or adhere to the International Conference on Harmonization (ICH) Good Clinical Practice), and excludes clinical trials that fail to include informed consent in ethical clinical trial procedures).
Affordable real estate	<p>Products, services or infrastructure projects that support the development or delivery of:</p> <ul style="list-style-type: none"> • Affordable or social housing units for sale or rent, including apartments, standalone houses or commercial real estate for micro, small and medium enterprises (MSMEs). • Funding to social housing associations designated by the government. 	<ul style="list-style-type: none"> • Holiday homes, luxury homes and commercial spaces for corporate or luxury use.
Access to finance	<ul style="list-style-type: none"> • Products, services or infrastructure projects that support the development or delivery of finance to MSME businesses. • Funding to social enterprises, as defined by national or regional regulations. • Microfinance to individuals or communities for promoting entrepreneurship or education. Microfinance to small offices/home offices is also eligible. 	<ul style="list-style-type: none"> • Predatory lending practices like payday loans, installment loans, pawn loans, title loans, tax refund anticipation loans and doorstep loans.
Education	<p>Products, services or infrastructure projects that support the development or delivery of:</p>	<ul style="list-style-type: none"> • All non-educational content and any product or service that does not

Category	Eligible	Ineligible
	<ul style="list-style-type: none"> • Primary school, secondary school, college- and university-related products and services, including residential facilities for such establishments. • Technical/vocational training centers and programs. • Support for professional certification programs. • Financial literacy programs. • Training for teachers and related staff. 	<p>contain educational content used in a school or college environment. For example, exclusions include general literature, illustrated books, newspapers and magazines, TV programs, software product-related training courses and employee training.</p>
Basic infrastructure	<p>Products, services or infrastructure projects that support the development or delivery of basic infrastructure such as:</p> <ul style="list-style-type: none"> • Public roads and bridges. • Public transport infrastructure like public buses, subways, etc. • Drinking water distribution and sanitation. • Electricity distribution infrastructure. • Digital infrastructure. 	<ul style="list-style-type: none"> • Roads, airports, ports for luxury use such as cruises and digital home infrastructure like modems and cell phones.
Employment generation	<ul style="list-style-type: none"> • Employment generation initiatives by government or not-for-profit sectors. This includes support provided to companies for job creation and employee retention. • Support for MSME businesses as vendors or business partners. • Training initiatives to increase employability. 	<ul style="list-style-type: none"> • Excludes corporations that provide employment to serve their business needs, casinos, for-profit prisons, or weapons manufacturing.
Other social	<p>This includes categories not covered above, particularly regarding government spending, such as:</p> <ul style="list-style-type: none"> • Payment of Social Security. • Replacement income to people who have lost their jobs. • Provision of health insurance to the populace. 	<ul style="list-style-type: none"> • Generic categories like “socio-economic advancement.”

Target demographics

Eligible target demographics are:

- Underserved persons, owing to a lack of access to essential goods and services. This includes rural communities that do not have access to basic infrastructure.
- Unemployed.
- People and communities displaced by natural disasters.
- Low- or middle-income persons, families or households.
- Least Developed Countries, as defined by the United Nations.
- Low-income countries as defined by the World Bank.
- Micro, small and medium enterprises (MSMEs) as classified by the local or national regulations.
- The elderly (over 65 years of age), including retirees.
- People with disabilities.
- Migrants and/or displaced persons.
- Racial, ethnic and other minorities or marginalized genders.
- Marginalized farmers, or farmers that lack access to markets.
- Other excluded and/or marginalized populations and/or communities.
- In cases where government entities are developing infrastructure for healthcare or education that is accessible to the entire population of the region, the target population can be the general public.

Appendix II: Chronology of methodology updates

Green

This section provides a chronology of major methodology updates for the MSCI Green Bond Assessment Methodology, which was launched in 2014. The MSCI Green Loan Assessment Methodology was designed based on the MSCI Green Bond Assessment Methodology and launched in 2021.

February 2023:

The following updates were made to the methodology from February 01, 2023 onwards, and were implemented on a forward looking basis:

Use of proceeds:

- i. **100% funding to projects with environmental benefits:** Prior to February 01, 2023, 90% of the bond or loan use of proceeds needed to meet the MSCI Green Bond and Green Loan Assessment Methodology criteria. The remaining 10% proceeds could be allocated to ineligible categories, including social categories with no environmental benefit. Post February 01, 2023, 100% of bond or loan proceeds need to fund projects with positive environmental benefit (e.g. energy efficiency gains, water efficiency gains, GHG emission reductions). Of these, at least 90% of proceeds should fall within the eligible categories defined in the Methodology. Self-labeled green bonds or green loans with any proceeds funding social projects with no environmental benefit will not meet the use of proceeds criteria.
- ii. **Explicit exclusion criteria:** Post February 01, 2023, any funding by bond or loan proceeds to thermal coal extraction or energy generation, agriculture for tobacco or manufacturing of tobacco-based products, or manufacturing of controversial weapons (including cluster munitions, landmines, biological / chemical weapons, depleted uranium weapons, blinding laser weapons, incendiary weapons, and/or non-detectable fragments) is ineligible as per the Methodology. A green bond or green loan using any amount of proceeds to fund any of these categories is deemed ineligible.

Process for project evaluation and selection:

- i. **Sustainability objectives and risks of the proceeds:** Post February 01, 2023, in line with the Green Bond Principles and Green Loan Principles, green bond issuers or green loan borrowers must disclose the environmental sustainability objectives of the projects being funded by the green bond or green loan. Green bond issuers and green loan borrowers must also provide information on the process they follow to identify and manage perceived environmental and social risks (if any) associated with their financed projects.

Management of proceeds:

- i. **Temporary placement of unallocated proceeds:** Post February 01, 2023, in line with the Green Bond Principles, green bond issuers must make known to investors the intended types of temporary placement for balance of unallocated bond proceeds.

August 2021

As of August 2021, MSCI ESG Research updated the green bond methodology for the following:

Management of proceeds:

- i. **Amount equal to net proceeds raised:** Prior to August 2021, the actual proceeds raised by a green bond needed to be allocated to green projects. In line with the Green Bond Principles, MSCI ESG Research modified this requirement to mandate that an amount equal to net proceeds raised should be allocated to eligible projects.

April 2021

As of April 2021, MSCI ESG Research updated the green bond methodology for the following:

Use of proceeds:

- i. **Freight rail infrastructure:** Prior to April 2021, the development of rail infrastructure for freight was considered ineligible. In April 2021, a methodological decision was taken to consider freight rail and related infrastructure as eligible for inclusion, subject to the rail infrastructure not being dedicated to fossil fuel transportation. This change was made because the development of rail infrastructure for freight will promote a modal shift in transportation from more energy intensive air-based and road-based freight transport.

December 2019

As of December 2019, MSCI ESG Research updated the green bond methodology for the following:

Use of proceeds:

- i. **Green mortgage-backed securities:** Prior to December 2019, these were assessed as not meeting methodology requirements. Post December 2019, green mortgage-backed securities funding mortgages that aim to achieve or have achieved a minimum 30% improvement in energy efficiency compared to baseline performance of the building before the renovation are included in the methodology. Similarly, green use of proceeds bonds funding mortgages that aim to achieve or have achieved a minimum 30% improvement in energy efficiency compared to baseline performance of the building before the renovation are included in the methodology.
- ii. **Pure play bonds:** Prior to December 2019, bonds by pure play issuers were assessed as meeting the methodology subject to them meeting only pillars 1 and 4 i.e. use of proceeds and commitment to ongoing reporting respectively. A pure play issuer is defined as a legal entity with greater than 90% of activities (as measured by revenues) within one or more of the eligible categories. Post Dec 2019, such bonds need to meet all four pillars to meet assessment criteria.
- iii. **Biomass based power generation:** Prior to December 2019, bonds funding all types of biomass-based power generation were assessed as meeting the methodology. Post December 2019, biomass needs to sustainably sourced, i.e., sourced from FSC (Forest Stewardship Council), PEFC (Programme for the Endorsement of Forest Certification), SBP (Sustainable Biomass Program) or RSB (Roundtable on Sustainable Biomaterials) certified sources.
- iv. **Large dams** (i.e., dams above 15 meters in height) for storage for sustainable water projects: Prior to December 2019, such dams were considered to meet methodology requirements. Post December 2019, such dams need to adhere to the eight IFC Performance Standards in order to meet the requirements of the methodology.
- v. **Energy efficiency projects for fossil fuel-based energy generation:** These projects (except for natural gas-based cogeneration) were not included in the methodology, and it was made explicit in December 2019 that they will not be considered as meeting methodology requirements.

June 2016

As of June 2016, MSCI ESG Research updated the methodology for the following:

Use of proceeds:

- i. **Large hydropower:** Prior to June 2016, large hydropower was not included in the methodology, and MSCI ESG Research modified the methodology to include it, subject to additional criteria mentioned in Appendix I: Use of proceeds categories.
- ii. **Pumped storage hydropower:** Prior to June 2016, pumped storage hydropower was not included in the methodology, and MSCI ESG Research modified the methodology to include it, subject to the same additional criteria for large hydropower, mentioned in Appendix I: Use of proceeds categories.
- iii. MSCI ESG Research created a new Use of Proceeds category i.e., **Climate Adaptation** detailed in Appendix I: Use of proceeds categories.

September 2014

As of September 2014, MSCI ESG Research developed this methodology in line with the Green Bond Principles by International Capital Market Association

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