GREEN, SOCIAL AND SUSTAINABILITY BONDS IN DEVELOPING COUNTRIES: THE CASE FOR INCREASED DONOR CO-ORDINATION

June 2023
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Please cite this paper as OECD (2023), Green, social and sustainability bonds in developing countries: The case for increased donor co-ordination OECD Publishing, Paris.

Comments, questions and other inquiries are welcome and may be sent to the OECD Private Finance for Sustainable Development Team dcdpf4sd@oecd.org.

This document is also available on O.N.E Members and Partners under the reference: DCD(2023)24.

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Abstract

This report provides an overview of the engagement of development co-operation providers in support of the green, social and sustainability (GSS) bond market in developing countries. Based on extensive consultations with stakeholders as well as data provided by the Luxembourg stock exchange via the LGX DataHub, the report explores how donor institutions can collectively support GSS bond issuances in developing countries, while also strengthening impact and the quality of associated reporting and measurement. It highlights five major policy areas in which donors can support the growth of the GSS bond market: Investment, Insurance, (Market)-Infrastructure, Issuance and Impact. For these, the report presents detailed recommendations as well as provides three over-arching recommendations for increased donor co-ordination.
Foreword

The Group of Twenty (G20) Development Working Group (DWG) under Italy’s Presidency requested that Italy’s Cassa Depositi e Prestiti (CDP) and the OECD analyse the green, social, sustainability and sustainability-linked (GSSS) bond market in developing countries (Dembele, Schwarz and Horrocks, 2021[1]). The report highlighted the significant potential presented by the GSSS bond market to raise long-term financing for Sustainable Development Goals (SDG)-related projects and attract institutional investment at scale, while also pointing to existing gaps and challenges. The report provided context for the subsequent G20 High-Level Principles on scaling-up sustainability-related financial instruments in developing countries (G20-Italia, 2021[2]). Wide-ranging in scope, the Principles provide guidance for policymakers to support the continued growth of the GSSS bond market. The subsequent OECD report on Green, Social, Sustainability and Sustainability-linked bonds in Developing Countries; How Can Donors Support Public Sector Issuances? (OECD, 2022[3]) then built on the G20 high-level policy work, using data provided by the Luxembourg Stock Exchange LGX DataHub. The report assesses the role of donors in supporting GSSS issuances of the public sector in developing countries.

Building on this evidence, this report explores how donors could collectively ensure increased green, social and sustainability (GSS) bond issuances in developing countries, while also strengthening quality of associated reporting and impact measurement. Based on extensive consultations with stakeholders, including a number of workshops but also one-on-one interviews and data provided by the Luxembourg stock exchange via the LGX DataHub, it provides policy recommendations on how different development institutions can effectively step up their support to GSS bond markets and support developing countries’ sustainable pathways. Unlike prior publications, this report does not cover sustainability-linked bonds (SLB) and instead focuses on the particularities of GSS bonds as use-of-proceeds debt instruments. SLBs are the focus of another, forthcoming OECD report.
Acknowledgements

This report was prepared by the OECD Development Co-operation Directorate, headed by Director Pilar Garrido under the strategic guidance of Haje Schütte, Deputy Director and Head of the Financing for Sustainable Development Division. The Ministry of Foreign and European Affairs of Luxembourg provided essential financial support, expertise and insights. The paper was authored by Paul Horrocks, Alissa Krüger and Emma Raiteri.

The authors would like to thank Jieun Kim, Catriona Marshall and Thomas Hos (OECD); Alexander Vasa, Gianleo Frisari and Angela Pizon (IDB); Peter Hallbom (Sida); Karim Karaki (ECDPM); Alexander Krauss and Tomomitsu Maruta (EIB); Imtiaz Ul Haq (IFC); Chiara Caprioli (Luxembourg Stock Exchange); Torsten Ehlers (IMF); Rahul Ghosh (Moody’s); Hauke Maas (GIZ); Sean Kidney and Manshu Deng (Climate Bonds Initiative); and Sergei Strigo (Amundi) for peer-reviewing the paper.

The authors would also like to thank Wiebke Bartz-Zuccala, Priscilla Boiardi and Esme Stout (OECD) and David Vilalta (PhD candidate at Columbia University) for their valuable inputs and comments.

The analysis underlying this document is based on a consultative process including expert interviews and evidence gathering workshops. The authors would like to thank all experts consulted from the following institutions: African Development Bank (AfDB), Agence française de développement (AFD), Amundi, Asian Development Bank (ADB), Blue like an Orange, Cabo Verde stock exchange, Climate Bonds Initiative, the Currency Exchange Fund (TCX), Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ), the European Commission, European Investment Bank (EIB), Kreditanstalt für Wiederaufbau (KfW), Inter-American Development Bank (IDB), International Finance Corporation (IFC), International Monetary Fund (IMF), the Luxembourg Stock Exchange, Moody’s, Nigeria Stock Exchange, ODI, PIMCO, Private Infrastructure Development Group (PIDG), Swedish International Development Cooperation Agency (Sida), Thailand Debt Management Office, Trade and Development Bank, and the Treasury of the Philippines.
Table of contents

Abstract 3
Foreword 4
Acknowledgements 5
Abbreviations and acronyms 8
Executive summary 10

1 Green, social and sustainability bonds have demonstrated significant potential for financing sustainable development 12
   1.1. Large disparities exist in green, social and sustainability bond issuances in developing countries 16
   1.2. Debt sustainability and local currency issuances are crucial aspects of the green, social and sustainability bond market in developing countries 21

2 Connecting the dots between green, social and sustainability bonds and blended finance 25
   2.1. The mobilisation effect of green, social and sustainability bonds 27

3 How can donors collectively support green, social and sustainability bond issuances? 29
   3.1. Investment 31
   3.2. Insurance 34
   3.3. Issuance 37
   3.4. (Market)-Infrastructure 40
   3.5. Impact 43

4 Recommendations for donors to support green, social and sustainability bond issuances in developing countries more effectively 52

References 56

Annex A. Overview of donor initiatives with specific green, social and sustainability bond focus 66
   Notes 68

GREEN, SOCIAL AND SUSTAINABILITY BONDS IN DEVELOPING COUNTRIES © OECD 2023
### Abbreviations and acronyms

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Full Form</th>
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<tbody>
<tr>
<td>ADB</td>
<td>Asian Development Bank</td>
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<td>AFD</td>
<td>Agence française de développement</td>
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<td>AfDB</td>
<td>African Development Bank</td>
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<td>ASEAN</td>
<td>Association of Southeast Asian Nations</td>
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<td>BMZ</td>
<td>Federal Ministry of Economic Cooperation and Development (Germany)</td>
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<td>BOAD</td>
<td>Banque Ouest Africaine de Développement</td>
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<td>CBI</td>
<td>Climate Bonds Initiative</td>
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<td>DAC</td>
<td>Development Assistance Committee</td>
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<td>DFC</td>
<td>U.S. International Development Finance Corporation</td>
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<td>DFI</td>
<td>Development finance institution</td>
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<td>DSA</td>
<td>Debt Sustainability Analysis</td>
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<td>EEA</td>
<td>European Economic Area</td>
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<td>EBRD</td>
<td>European Bank for Reconstruction and Development</td>
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<td>ESG</td>
<td>Environmental, social and governance</td>
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<td>EU</td>
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<td>EUGBS</td>
<td>EU Green Bond Standard</td>
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<td>FMO</td>
<td>Nederlandse Financierings-Maatschappij voor Ontwikkelingslanden</td>
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<td>G20</td>
<td>Group of Twenty</td>
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<td>GIZ</td>
<td>Deutsche Gesellschaft für International Zusammenarbeit</td>
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<td>GSS</td>
<td>Green, social and sustainability</td>
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<td>GSSS</td>
<td>Green, social, sustainability and sustainability-linked</td>
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<td>GBTP</td>
<td>Green Bond Transparency Platform</td>
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<td>GGBI</td>
<td>Global Green Bond Initiative</td>
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<td>IDB</td>
<td>Inter-American Development Bank</td>
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<td>ICMA</td>
<td>International Capital Market Association</td>
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<td>IFC</td>
<td>International Finance Corporation</td>
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<td>Acronym</td>
<td>Description</td>
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<td>IMF</td>
<td>International Monetary Fund</td>
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<td>IPSF</td>
<td>International Platform on Sustainable Finance</td>
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<td>IS-FSD</td>
<td>OECD-UNDP Impact Standards for Financing Sustainable Development</td>
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<td>KPI</td>
<td>Key performance indicator</td>
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<td>LDC</td>
<td>Least developed country</td>
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<td>LIC</td>
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<td>LMIC</td>
<td>Lower middle-income country</td>
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<td>MIGA</td>
<td>Multilateral Investment Guarantee Agency</td>
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<td>MDB</td>
<td>Multilateral development bank</td>
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<td>NDB</td>
<td>National development bank</td>
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<td>ODA</td>
<td>Official development assistance</td>
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<td>PPF</td>
<td>Project preparation facility</td>
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<td>SLB</td>
<td>Sustainability-linked bond</td>
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<td>Sida</td>
<td>Swedish International Development Cooperation Agency</td>
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<td>SIDS</td>
<td>Small island developing states</td>
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<td>SSA</td>
<td>Sovereigns, Supranational and Agencies</td>
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<td>TCX</td>
<td>The Currency Exchange Fund</td>
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<td>UMIC</td>
<td>Upper middle-income country</td>
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<td>UN</td>
<td>United Nations</td>
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GREEN, SOCIAL AND SUSTAINABILITY BONDS IN DEVELOPING COUNTRIES © OECD 2023
Executive summary

Current levels of financing are insufficient to deliver the Sustainable Development Goals (SDG), and official development assistance (ODA) is not able to cover the sizeable needs. The long-term challenges of development and tackling climate change require significant pools of capital. Debt capital markets, due to their size and reporting capabilities, can play a particularly important role in providing this level of financing volumes. Green, social and sustainability (GSS) bonds as innovative debt instruments can contribute greatly to this mobilisation challenge by linking scale with impact. GSS bonds are labelled bonds which have an underlying use-of-proceeds mechanism that allows for greater transparency on what the funds are used for. Currently, institutional investors allocate only a small fraction of their funds to investments in developing countries (OECD, 2021[4]). This is due to a variety of reasons including – but not limited to – mandate requirements, limited currency transferability, lack of liquidity of bonds and regulatory constraints. GSS bonds can be useful instrument for developing country issuers to signal to the market a commitment to social or green objectives, to access a larger and/or diversifying their investor base, to improve reputation and in some cases, to achieve more favourable financing conditions. Moreover, developing country issuers often face challenges related to the lack of bankable projects, limited familiarity with reporting requirements and international investors’ requirements, as well as weak macro-fundamentals and financial markets.

OECD Development Assistance Committee (DAC) members, referred to also as donors hereafter, could help overcome some of these challenges and ensure the necessary scale, financial terms, and quality of impact reporting for a GSS bond issuance are reached. They are well-suited actors to support GSS bond market development in developing countries: they have a specific mandate for developmental impact, paired with a higher risk tolerance than the private sector, and the ability through blended finance approaches and the balance sheets of their development finance institutions (DFIs) to help the scaling of innovative financing tools. GSS bonds can address both global public goods, such as climate change mitigation or biodiversity through a green bond, more local priorities such as building educational infrastructure through a social bond or even combine environmental and social objectives within a sustainability bond.

Debt sustainability is becoming increasingly important in light of tightening financing conditions. With the United States (US) Federal reserve raising rates, attracting investors to developing countries debt issuances will become more difficult. Under such risk-averse market conditions, blended finance instruments may be more actively used to encourage issuance. On the other hand, in times of higher spreads, increased debt sustainability risks and higher global interest rates, GSS bonds present an opportunity for developing country issuers to broaden and diversify their investor base. GSS bond pricing premiums have also shown some resilience compared to traditional bonds (CBI, 2023[5]).

However, organisations in developing countries often lack the capacity to issue a traditional bond, let alone more complex GSS bonds. Countries’ economic and financial market conditions need to be taken into consideration, and fundamental capacity building to strengthen market infrastructure and macroeconomic stability might be needed before considering GSS bond issuances in some cases. This report, therefore,
mainly focuses on developing countries with relatively established market access and capital market development levels.

Many OECD DAC members have already started supporting developing countries in different policy areas that are playing an instrumental role for the development of the GSS bond market (see Annex). Relevant policy areas can be grouped along “five Is”: Investment, Insurance, Issuance, (Market)-Infrastructure and Impact. The policy area “Investment” highlights ways in which donor institutions can support GSS bonds of developing country issuers directly, for example through anchor investments. “Insurance” points to risk-sharing mechanisms that donors can choose to provide to GSS bonds in the form of guarantees or political risk insurance. “Issuance” revolves around supporting the originator of the bond in the issuance process itself and “(Market)-Infrastructure” looks at approaches to support the broader institutional landscape necessary for a functioning GSS bond market. Lastly, “Impact” covers considerations on GSS bond Taxonomies and Standards, as well as ensuring reliability, clarity and accountability of impact measurement and reporting.

At present, donors tend to act separately. To deliver scale and for a comprehensive market development approach, donors need to bring together not only their funding budgets but also align and systematically target their instruments and approaches.

The report makes the following recommendations for increased donor co-ordination:

1. **Co-ordinate on supporting large-scale blended finance instruments for GSS bonds** through approaches such as investing in first loss mitigation in the form of funded junior, mezzanine tranches in large, fixed-income funds or through joint guarantee programmes. Such joint funds or programmes can leverage significant synergies, and reduce transaction costs.

2. **Promote the comparability and interoperability of Taxonomies and Standards and encourage harmonisation of high-quality impact measurement and reporting on GSS bonds.** Support consolidation of impact measurement and reporting by developing consensus on what is best practice, while leaving room for local considerations where necessary.

3. **Develop a strategic co-ordination mechanism for GSS bonds** to facilitate co-ordination on impact and on blended finance instruments that aim for scale. A GSS Bond task force could convene donors, relevant developing country stakeholders as well as private bond investors to strategically co-ordinate activities and initiatives. Key areas where co-ordination is currently needed include impact measurement and reporting, technical assistance approaches, anchor investments and guarantees. The platform could ensure knowledge sharing and dissemination of best practices and identify regions where there is a particular need for joint approaches. The OECD Community of Practice on Private Finance for Sustainable Development could serve as a forum for such discussions.

Fifteen more granular recommendations within each policy area can be found in Sections 3 and 4.
Green, social and sustainability bonds have demonstrated significant potential for financing sustainable development

The Sustainable Development Goal (SDG) financing gap in developing countries is estimated at a staggering USD 3.9 trillion, compounded by the effects of the pandemic and the war in Ukraine (OECD, 2022[6]). Official development assistance (ODA) stood at USD 185.9 billion in 2021, only representing a fraction of the amount needed to fill this gap (OECD, 2023[7]). Therefore, a variety of financing approaches will be necessary to support a closing of this gap and facilitate a green transition more broadly. The bond market – considering its size and rise of ESG-related activities – could and should be used more effectively to support sustainable development and the transitioning of economies towards a green pathway. Generally, bonds can be considered as long-term, stable debt financing and due to the size of the bond market, bond instruments can fund both a large number and a considerable size of projects. Meanwhile, bond investors have shown increasing appetite for exposure to environmental, social and governance (ESG) and SDG-aligned projects and portfolios.

The overall size of the global bond market stands at approximately USD 128.3 trillion (ICMA, 2023[8]), of which green, social and sustainability (GSS) bonds only represent a fraction. Annual GSS bond issuances stood at EUR 702 billion compared to USD 8.3 trillion (EUR 7.9 trillion¹) overall bond issuance in 2022 (Refinitiv, 2023[9]). GSS bonds differ from traditional bonds in their (more constrained) fungibility, as they map the use-of-proceeds to projects that are pursuing sustainable, social or environmental goals (see Box 1.1 for further definitions). They have seen significant growth in the past years, increasing by an average annual rate of 72% from 2014-2021. In 2022, challenging market conditions for bonds overall also affected the GSS bond market resulting in a decrease in issuances; however, the market downside was less pronounced than in the overall bond market (Moody’s, 2022[10]). As countries transition towards sustainable pathways, the pace of labelled bonds issuances is expected to increase again (Moody’s, 2023[11]).

Why should donors enter the GSS bond space and not leave it to markets and private sector actors? Delivering the SDGs and decarbonising economies requires finance at scale, which labelled bonds, used as a synonym for GSS bonds throughout the report, can help deliver. This report identifies five policy areas where donors can support GSS bond market development in developing countries (“the five Is”): Investment, Insurance, Issuance, (Market)-Infrastructure and Impact. These are discussed in more detail in section 3. The sub-section on “Investment” examines how development institutions can help fund the GSS bonds of developing country issuers directly. The one on “Insurance” highlights risk-sharing mechanisms that donors can choose to provide to GSS bonds in the form of guarantees or political risk insurance. The “Issuance” sub-section focuses on supporting the originator of the bond in the issuance process. “(Market)-Infrastructure” examines support needed for the broader institutional landscape necessary for a functioning GSS bond market. Lastly, the “Impact” sub-section covers considerations on
ensuring impact measurement and reporting on the GSS bonds is reliable, clear and accountable, and on GSS bond Taxonomies and Standards.

Box 1.1. Definitions employed throughout the report

**Green, Social and Sustainability (GSS) bonds** are fixed-income debt instruments with a use-of-proceed mechanism with a focus on activities or assets with a sustainable purpose.

**Green bonds** are defined as bond instruments that employ the use-of-proceeds (or an equivalent amount) to (re-) finance eligible green projects that intend to deliver a positive environmental impact (ICMA, 2021[12]). Included in this definition are blue, climate and transition bonds, amongst others.

**Social bonds** dedicate the use of proceeds of bond to (re-) finance social projects (ICMA, 2021[13]), for example advancing affordable housing and access to essential services such as healthcare. This definition includes gender bonds and disability bonds, amongst others.

**Sustainability bonds** finance or re-finance a combination of green and social projects (ICMA, 2021[14]).

**Types of bonds that are not covered within the GSS bond definition**: Bonds that do not have a use-of-proceed mechanism such as impact bonds and SLBs (see Box 1.3 for further details on SLBs).

**Donor institutions** are institutions with a development mandate that are financed by one or more members of the OECD Development Assistance Committee (DAC).

**Development finance institutions** (DFIs) refer to bilateral or multilateral development banks or subsidiaries set up to support private sector development in developing countries (OECD, n.d.[15]).

**Development banks** refer to bilateral or multilateral banks with a development mandate set up by one or more states.


Currently, those donors that are working on GSS bond market development are typically doing so individually. Some joint-up initiatives exist, but obstacles are greater than the commonalities and there are currently limited joint blended finance approaches such as guarantees or first loss instruments. The GSS bond market represents a scalable response to the challenge of financing the SDGs but developing country issuers face several roadblocks in effectively issuing (see section 3 for more details) which is why an equally sizeable response is needed by donors.

Bonds are traditionally held by institutional investors; although more risk-averse, they tend to have a more long-term vision, providing stable low-cost financing (Natixis, 2022[16]). Bonds can be traded on secondary markets, providing enhanced liquidity to investor compared to other debt instruments such as loans which cannot be traded as easily. Increasingly, institutional investors are going further afield for diversification, returns, and opportunity, and a growing number are venturing into ESG investing (Natixis, 2023[17]). A significant share (59%) report a planned increase in their ESG investments as part of an effort to align assets with organisational values, but about half (48%) fear that this increased focus on ESG will reduce opportunities in emerging markets. From an issuer perspective, there are a several potential benefits of issuing GSS bonds. This includes a more diversified and larger investor base as well as reputational...
advantages of showing a commitment to ESG. Some issuers might also achieve a pricing benefit compared to a vanilla bond, although this is not consistently found across issuer type and characteristics (see Box 1.2 on the “greenium” or “socialium”).

**Box 1.2. “Greenium” or “Socialium” for developing country issuers**

When a GSS bond is issued with a higher price than a non-labelled bond of the same issuer and therefore places inside the yield curve of the issuer’s own outstanding debt, a new issue concession exists and is called a ‘greenium’ or ‘socialium’ (Climate Bonds Initiative, 2021[18]). For example, twin bonds issuances[1] of a labelled and vanilla bond, as employed by the German and Danish government in 2021 and 2022 respectively, suggested a small, statistically significant ‘greenium’ for European countries (Ando et al., 2022[19]). It is important to note that literature on pricing premiums is largely concentrated on green bond issuances in more advanced markets, as data on issuances in emerging markets and developing countries and social/sustainability bonds is more limited.

There is no evidence that a reliable, sizeable ‘greenium’ exists across issuer type, regions and financial characteristics (Zettelmeyer et al., 2022[20]) and most recently there have been suggestions it might in fact be slowly disappearing as the market matures (Duguid, 2022[21]). Academic literature on social and sustainability bonds is sparser in general due to comparatively fewer issuances to date. Emerging evidence so far shows either a to-date non-existent (Jain, 2022[22]) or very small sustainability or social premium (Torricelli and Pellati, 2022[23]).

However, there is evidence that a more sizable ‘greenium’ can be achieved in bond issuances by sovereign issuers from emerging markets and developing countries than in advanced markets (Ando et al., 2022[19]) and for sovereign issuers from countries that are highly vulnerable to climate change (Zettelmeyer et al., 2022[20]). Additionally, credibility of the issuer and the bond seems to matter. The appointment of external reviewers has been shown to affect green bond pricing advantageously for the issuer (Simeth, 2022[24]). These findings could be encouraging to issuers from ODA-eligible countries that are considering issuing GSS bonds.

Notes: 1. Twin bond issuances that allow for more direct comparison are rare in developing countries, resulting in less datapoints on the existence of a pricing benefit. Colombia became the first developing country sovereign to issue a green twin bond in 2021. (Ministerio de Hacienda y Crédito Público, 2021[25].)  
Source: Climate Bonds Initiative (2021[18]), Green Bond Pricing in the Primary Market: July – December 2021, 
https://www.climatebonds.net/files/reports/cbi_pricing_h2_2021_02g.pdf; Ando et al. (2022[19]), Sovereign Climate Debt Instruments: An Overview of the Green and Catastrophe Bond Markets, 
https://cepr.org/publications/books-and-reports/geneva-25-climate-and-debt; Duguid (2022[21]), Rising green bond issuance erodes premiums, 
https://www.ft.com/content/32dbf37c-8f5f-436b-88f3-66736c864a7b; Jain (2022[22]), Thematic Bonds: Financing Net-Zero Transition in Emerging Market and Developing Economies, 
https://iris.unimore.it/ir/retrieve/o31e1250-85ef-987f-e053-3705fe0a95a/CEFIN-WP85.pdf; Simeth (2022[24]), The value of external reviews in the secondary green bond market, 

For conventional bonds, sovereigns are often amongst the first bond issuers in a local market, stepping in as a kind of market maker by providing a benchmark. This was often not the case for GSS bonds, where issuances of local government, public enterprises and corporations preceded sovereign issuances globally (Cheng, Ehlers and Packer, 2022[26]). This trend continues when looking at specific developing country markets, for example South Africa and Namibia where municipalities and corporations have issued GSS bonds, but the sovereign has yet to follow suite. There is increasing interest from emerging markets and developing country sovereigns in becoming issuers of labelled bonds. A recent survey by the World Bank
found that out of 32 countries surveyed, 75% of Debt Management Offices intend to issue labelled bonds (World Bank Group, 2022[27]).

For the GSS bond market to develop at scale and emerge into a viable long-term market for funding to support the SDGs, both corporate and sovereign issuances are necessary and complementary. Corporate GSS issuance do not typically involve the social element that many sovereign GSS bonds issuances include; in 2022 only 22% issued GSS bond amounts by corporates or financial institutions were social or sustainability bonds, compared to over 50% by public sector entities). On the other hand, economies to new and sustainable activities requires both financial size and impact that governments alone do not have the capacity to deliver. Moreover, many of the corporates that need access to financing are energy and utility corporations which typically require large financing volumes necessary to transition activities towards sustainable pathways, such as funding of renewable energy projects. Corporates GSS bond issuance is therefore a key part of the transition journey for economies.

Box 1.3. Sustainability-linked bonds

Sustainability-linked bonds (SLBs) differ from GSS bonds in that they do not rely on a use-of-proceed tracking approach. This allows for proceeds to be used for general funding needs. The structural and/or financial characteristics of these bonds can change depending on whether their issuer achieves previously defined sustainability or environmental, social and governance objectives (ICMA, 2020[28]). An example is a SLB bond for which the coupon rate increases in the eventuality that the issuer does not meet its corporate greenhouse gas emission reduction targets.

SLBs have so far been pre-dominantly issued by non-financial corporates (84%). More recently, sovereigns have entered the market with first Chile and then Uruguay issuing the first sovereign SLBs. In 2022, Chile raised USD 2 billion through its ground-breaking SLB, which included two key performance indicators (KPIs) related to the country’s decarbonisation goals under the Paris Agreement. The first target is related to a reduction of greenhouse gas emissions, while the second aims for higher electricity production derived from non-conventional renewable energy sources by 2032. The bond received strong investor demand, reaching USD 8.1 billion in orders (GFL - Green Finance for Latin America and the Caribbean, 2022[29]). Uruguay’s SLB also included mechanisms tied to reaching their Nationally Determined Contribution and a reward mechanism in case of overperformance.

SLBs have the potential to play a significant role for developing country issuers. They do not require use-of-proceed tracking, which implies lower costs and less operational set-up. That said, important questions remain regarding ensuring the right level of ambition for the relevant KPIs and adequate size of associated penalties such as coupon step-ups. Additional OECD work on SLBs is forthcoming.

1.1. Large disparities exist in green, social and sustainability bond issuances in developing countries

The GSS bond market is considerably smaller in size in ODA-eligible countries (also referred to as developing countries throughout the report) compared to the overall global market. In 2022, 13% of the EUR 702 billion overall GSS bond market was issued by entities in developing countries (further reducing to around 5% when not including China). However, GSS bonds grew at a similar pace in developing countries as the overall market, almost doubling year-on-year until 2021. This shows that overall market expansion also extended to developing country issuers, though starting from a much smaller base in absolute terms.

Figure 1.1. Green, social and sustainability bonds issued amounts by country income group (EUR billion)

Looking at the overall market, GSS bond issuances was highly concentrated in high-income countries as shown by Figure 1.1. In the last two years, 73% of issued amounts originated in high-income countries; a concentration which has stayed relatively static over time. This trend might be even further accentuated than the data shows, as offshore issuances are not identifiable in the data, e.g., some companies might be domiciled in one country, but the proceeds of the bonds are eventually used in other countries. Even within developing countries as a group, most amounts were issued in upper middle-income countries (UMIC). The data highlights that while GSS issuance is occurring, it is not happening where financing needs are significant, particularly from entities in low-income (LIC) or lower middle-income (LMIC) countries. It is important to note that GSS bonds are not suitable for all types of country contexts (see further down below on debt sustainability and sub-section 3.4 on market infrastructure).
**Box 1.4. LGX DataHub descriptive statistics**

The Luxembourg Green Exchange (LGX) is dedicated to sustainable finance, with the aim of reorienting capital towards sustainable investment. The LGX DataHub – referenced throughout this report – provides users with granular and structured pre- and post-issuance data on green, social, sustainability and sustainability-linked bonds. It is a tool which enables investors and asset managers to compare different products and their characteristics. Such transparency also helps drive expectations and harmonisation regarding impact reporting.

This paper uses the dataset from LGX DataHub as of April 2023 with the following scope:

- Total number of issuances: 10,822
- Includes green, social and sustainability bonds
- Timeframe: 2010 – April 2023
- Total number of issuers: 2,572
- Developing countries defined as ODA-eligible countries based on the DAC List of ODA-eligible countries (as of March 2023)
- Type of Issuer: Corporates, Financial Institutions and Sovereigns, Supranationals and Agencies (SSA)

In terms of type of labelled bonds issued in developing countries, there is a pronounced progression towards sustainability bonds from developing country issuers (excluding China) as shown in Figure 1.2. This differs from overall global market trends, where over 60% of issued amounts continue to be labelled as green bonds in 2022. This growth could be explained by post-COVID-19 investment needs related to poverty alleviation and social services (Asian Development Bank, 2021[31]). The overall dominance of green bonds is also reflected in the eligible project categories that are most cited in allocation reporting. Across all country income groups and in supranational issuances, renewable energies and green buildings are the most cited.
A significant disparity can be observed in terms of issued amounts across regions – the region with highest value of GSS bond issuance is Europe and Central Asia issuing over 70 times more in value than sub-Saharan Africa in 2022 (see Figure 1.3). As can be seen from the figure, South Asia, Sub-Saharan Africa, the Middle East, and North Africa make up a very small part of the overall GSS bond market. Green bonds dominate in the overall much larger labelled bond markets of Europe, East Asia & Pacific and North America. In Latin America and the Caribbean, the majority of bonds are issued under a sustainability label.
Sub-Saharan African countries face significant strain – coming from the considerable need for economic growth aggravated by the pandemic, significant debt sustainability concerns, predicted future population growth as well as growing pressure from climate change. According to the International Monetary Fund (IMF), within 10 to 15 years, more than half of the world’s job market entrants will come from Sub-Saharan Africa (IMF, 2022[32]). It is also estimated that about half of Africa’s potential greenhouse gas emitting industries by 2050 are yet to be established, hence there is an opportunity to avoid the building up of carbon intensive industry by directly moving to low-carbon technology and processes (Jayaram et al., 2021[33]). Significant investment will be required to support this transition and overall population growth. Specifically, the IMF highlights the need to explore innovative solutions that improve the risk-return profile of private funding for clean energy projects, including through blended finance, guarantees, and credit enhancements, along with other actions to prepare bankable projects and lower entry costs for potential investors (IMF, 2022[32]).

The SDG financing gaps in Africa overall are significant. At the same time, Africa holds important opportunities for revenue. According to the World Risk Index a significant portion of Africa is highly exposed to climate change-induced natural disasters. While only about 30% of African countries have high to very high exposures, nearly 80% of the continent falls within the highest two groups of the sphere of vulnerability (Bündnis Entwicklung Hilft; Ruhr University Bochum, 2022[34]). On the flip side, Africa harbours a large potential for generating renewable energy and could become a leader in renewables generation (Carbon Tracker, 2021[35]). African countries are also already key regional priorities for many donors looking to mobilise the private sector. (OECD, 2023[36])

Despite these significant opportunities, the region has one of the lowest issuances of GSS bonds (see Figure 1.3). This is partially explained by the fact that many Sub-Saharan African countries do not have a well-functioning capital market and only thirteen Sub-Saharan African countries have international capital...
market access (IMF, 2022[37]). Capital market development, including the development of a GSS bond market, facilitates the diversification of the financial sector complementing the banking sector. In its Agenda 2063, the African Union recognises this by prioritising the development of capital markets on the continent in order to strengthen domestic resource mobilisation and double its contribution to development financing. It is important to note that GSS bonds will not be the right type of instruments in all contexts, particularly in situations with insufficient financial development or unsustainable debt burden. In contexts with limited fiscal space, GSS bonds might rather play a role in the medium to longer term (see market infrastructure in section 3.3 for capital market development considerations). As highlighted above, sub-Saharan Africa faces considerable constraints due to the majority of subpar sovereign credit ratings in the region which removes the majority of countries from the radar of institutional investors. Of the 32 African countries that have received a sovereign credit rating from one of the three major credit rating agencies, only two (Botswana and Mauritius) have investment grade status as of 2023 (UNDP, 2023[38]).

In 2022, GSS bond issuances in sub-Saharan Africa only made up 0.7% of the global labelled bond market. Despite this, the issuance of GSS bonds in sub-Saharan Africa has evolved over the course of the last years but can be broadly characterised as patchy and limited to a small number of countries (see Figure 1.4). Since 2014, only issuers from nine different sub-Saharan African countries have entered the GSS bond market.

Figure 1.4. Green, social and sustainability bond issuances by African entities, by issuer type (EUR billion)

Notes: Does not include supranational issuances
Source: Authors’ calculations based on Luxembourg Green Exchange (2023[30]), Luxembourg Green Exchange, https://lgxhub-premium.bourse.lu/

GSS bond issuances in Africa has been driven predominantly by corporate issuances (Figure 1.4), with only very limited public sector participation. In 2022, there has been an increase of issuances by financial institutions, mainly driven by South African institutions issuing green bonds. Most issuances by Sub-Saharan African entities to date were green bonds of a relatively small size, though there are some standout issuances of a larger size, for example in Egypt in 2020 (USD 750 million). Social and sustainability
bonds are also on the rise in the region since 2021, for example the sizeable sustainability bond issued by Benin in 2021. Regional development banks such as the African Development Bank (AfDB) and BOAD have also been actively issuing GSS bonds, with their proceeds funding projects in the region. Some of the bonds were issued by Indian companies domiciled in Mauritius, reflecting the fact that offshore issuances are difficult to identify, and the bond proceeds may not actually be used in Africa in practice

South Africa stands out as the largest sub-Saharan African issuer with a diverse issuer profile of corporates and sub-sovereign\(^4\), so far issuing exclusively in local currency. The picture for local currency issuances in the rest of Africa is mainly dominated by small scale and patchy deal flow. Currently, besides Kenya and South Africa, there have been local currency GSS bond issuances in Mauritius, Namibia, Nigeria, and Tanzania. For example, the bank Windhoek issued a sustainability bond in 2021 in Namibian Dollar equivalent to USD 5.7 million to finance eligible projects in sectors such as socio-economic advancements and climate change adaptation. The Acorn Project issued the first ever green bond in Kenya financing the building of student accommodation and priced in Kenyan Shillings. The project raised KES 4.3 billion (USD 41.5 million), thanks to first credit guarantee provided to an East African green bond issuance in local currency of 50 percent of the interest and principal provided by GuarantCo (funded by several donors) (GuarantCo, 2019[99]). The provision of the guarantee lead to an uplift of around 1 notch to B1, above the sovereign rating of Kenya B2 (Moody's, 2022[60]), demonstrating how donor support can facilitate credit uplift ensuring a successful bond issuance.

**Asia and Latin America have in turn seen significant GSS bond market growth**

While there was a much higher volume of GSS bond issuances in Asia and Latin America than in Africa overall, the majority was not issued in regional developing countries. In the Latin American and Caribbean GSS bond market for example, only a quarter of issued amounts on average came from entities in developing countries from 2018-2021. In East Asia and the Pacific, this number is even lower at an average of 8% across the same time period, when not including China. There is a particularly high volume of green bond issuances from China; it is the second largest and the fastest growing green bond market in the world (CBI, 2022[41]).

South-East Asian countries issued a combined EUR 16.8 billion in GSS bonds in 2022 with continuous market growth since 2017. The GSS bond market in Thailand, for example, has developed rapidly since the Thai Securities and Exchange Commission allowed the issuance of green bonds and sustainability bonds in 2018 and 2019; the Government of Thailand issued its first sustainability bond in 2020. Interestingly, 97% of GSS bond issued amounts to-date have been in Thai baht, showing strong liquidity in the Thai bond market. A particular type of country where there is a need for donor focus are Small Island Developing States (SIDS), which face vulnerability to natural disasters caused by climate change. There have been some examples of SIDS issuing blue bonds (AOSIS, 2022[42]), but significantly more needs to be done based on financing needs and exposure to climate change.

Latin America has seen strong market growth and significant uptake by sovereign issuers in recent years. Four sovereigns have issued a GSS bond (Chile, Ecuador, Colombia, Mexico) with several others like Brazil, Costa Rica and the Dominican Republic signalling wanting to issue as well (Khadbai, 2022[43]). Chile stands out as the first Latin American sovereign to issue a green bond and several repeat, as well as sustainability bond issuances since.

**1.2. Debt sustainability and local currency issuances are crucial aspects of the green, social and sustainability bond market in developing countries**

Despite their potential significant positive effects in terms of tracking green and social projects and attracting new and diversified pools of capital, GSS bonds remain debt instruments at their core. This
imply that for public sector issuances in particular, debt sustainability concerns and overall risk setting of the country need to be examined before considering a GSS bond issuance. The IMF has signalled the probability of increased debt distress for developing countries in the face of rising interest rates (IMF, 2023[44]). Around 60% of low-income developing countries are either in or facing a high risk of debt distress (IMF, 2022[45]), while simultaneously facing existential detrimental effects of climate change and biodiversity loss. In fact, this in turn negatively impacts medium-term economic growth prospects, thus creating a vicious cycle. Positive developments for debt sustainability in low-income countries include increased transparency around debt levels thanks to efforts such as G20 Debt Service Suspension Initiative and the Common Framework for debt treatment beyond the DSSI. The OECD also launched the OECD Debt Transparency Initiative to collect, analyse and report on transaction data from private sector lending to public sector institutions in low-income countries (OECD, 2021[46]).

If GSS bonds are to contribute to sustainable financial market functioning, they should avoid adding to unsustainable public debt levels and not be used for funding activities outside of their designated use of proceeds. Another factor to consider when supporting GSS bonds is being careful of not diverting investor demand away from traditional sovereign bond issuances. Rather, the focus should be on bringing in new investors or increased interest from existing investors. This is particularly important for developing countries public debt management, as traditional bond issuance funds critical public sector needs yet may have a limited investor base. Most outstanding debt in debt distressed countries is general purpose and in hard currency. According to the OECD Debt Transparency Initiative, the level of ESG debt outstanding of public debt by low-income developing countries is only 9.2% of total outstanding debt (OECD, 2022[47]). Based on assessment of GSS bond issuances from the LGX DataHub, there have only been GSS bonds issuances of entities in three countries classified as high risk of or in debt distress[5], of which none were from public sector issuers.

GSS bonds could also be an effective way of refinancing existing debt. Refinancing implies accessing more preferential terms of financing and can play a role in moving existing financing towards sustainable goals while not adding to the debt burden. In certain markets, there has been a shift towards a mix of financing and re-financing for GSS bonds. The move away from a purely financing approach is apparent in both the number of issuance but also the size of issued amounts that now includes re-financing as an option. This could contribute to greening existing projects and portfolios, particularly for utility and energy providers that are moving towards renewable activities. Still, it also raises questions related to impact and additionality of the bonds. If a green bond is used to refinance an existing project that was previously financed using a conventional bond, in practice it doesn’t generate additional capital for a green cause. Depending on the share of GSS bond issuances tied to refinancing, it is possible that the actual additional contributions of GSS bonds to green, social or sustainable positive impact has been overestimated (Bongaerts and Schoenmaker, 2020[48]; Fatica and Panzica, 2021[49]). As such, there is a clear need for strong impact measurement and reporting (discussed in sub-section 3.5. on Impact), to avoid greenwashing by issuers.

There have been several examples of GSS bonds being used as an instrument in a debt-for-nature swap approach (see Box 1.5). Under certain circumstances, these swaps can be a useful tool, for example for middle-income countries that can only seldomly access concessional funding and are not yet faced with debt restructuring (Georgieva, Chamon and Thakoor, 2022[50]). Debt-for-nature swaps could be more beneficial than conditional grants in the case when this renders climate commitment senior to debt service and potentially increase the willingness of creditors to provide debt relief (Chamon et al., 2022[51]). At the same time, debt-for-nature swaps do pose several technical, financial and governance challenges in their implementation (Banque de France, 2023[52]). It is, for example challenging and lengthy to negotiate the swaps, and difficult to measure environmental outcomes. It is also important to note that in the case of insolvency of a country, these swaps cannot act as a substitution for debt restrucutings as they are unlikely to be large enough to restore solvency and do not offer fungibility of funds due to the underlying use-of-proceed mechanism. Additionally, in situations of debt distress, countries’ fiscal spending needs are
overwhelmingly large. Commitment to specific sustainability goals can therefore be impossible or even undesirable, which would in turn defeat the purpose of using GSS bonds to refinance existing debt. However, there is scope to encourage countries and corporates that are currently in default to explore issuing GSS bonds as part of the restructuring process, which could potentially give access to additional financing during the restructuring.

Box 1.5. Debt-for-Nature Swaps involving GSS bond issuance

There have been a small number of cases in recent years that combined sovereign debt relief with a GSS bonds structure in so-called debt-for-nature swaps. The swaps have the potential to lower public debt levels while also having nature positive outcomes.

**Development Finance partners:** TNC, US DFC, IDB

**Private Sector Partners:** Institutional Investors

**Challenge:** Countries simultaneously facing challenges in protecting biodiversity or nature reserves, high vulnerability to the effects of climate change and high debt burdens.

**Approach:** In 2021, the environmental group the Nature Conservancy (TNC) issued a blue bond risk with an enhanced credit rating supported by political risk insurance provided by the US Development Finance Corporation (DFC). The proceeds of the blue bond were then extended to the Belize government in the form of a blue loan, which it used to repurchase its own debt at 55 cents on the dollar. The blue component constitutes financing a marine conservation fund with approximately USD 4 million annually and setting aside a further USD 23.5 million only accessible after 2041 (Credit Suisse, 2021[53]).

More recently, in September 2022, the government of Barbados used a similar approach to refinance part of a sovereign bond. Barbados took on a Blue loan backed by USD 150 million in guarantees by both IDB (USD 100 million) and the Nature Conservancy (USD 50 million) which funded a buyback of existing debt on more favourable terms. (IDB, 2022[54]) About half of the loan (USD 73.25 million) was funded by the issuance of blue bonds. Similar to Belize, the fiscal savings of the debt conversion will be used to fund a conservation fund with around USD 50 million over the next 15 years. (Credit Suisse, 2021[53]) The loan includes a state-contingent debt component that suspends debt servicing in the event of a future pandemic.

In May 2023, Ecuador underwent the to-date largest debt-for-nature swap, replacing USD 1.6 billion for an USD 656 million loan funded by a blue bond (Jones and Campos, 2023[55]).


GSS bonds issued in local currency remain limited in developing countries

The development of local capital markets is an established Principle of the OECD blended finance principles (OECD, 2018[58]), and efforts are increasingly made to help achieve this through encouraging local currency issuance. Local currency issuance benefits the issuer of a developing country issuer, as they do not have to address foreign exchange movements as the currency of financing matches their revenues streams. As highlighted in the graph below, GSS bonds have been issued for the most part in...
hard currencies. This is due to a variety of factors, such as much more limited demand from international investors for local currency denominated instruments, as currency risk hedging can be challenging and costly, along with other factors such as constrained liquidity of such bonds which raises risk and therefore costs.

Figure 1.5. Green, social and sustainability bond issuances by type of currency (% of issued amounts)

Note: China is not included as ODA-eligible in this graph. Hard currencies defined as USD, EUR, JPY, GBP, CHF, CAD, AUD. Source: Authors’ calculations based on Luxembourg Green Exchange (2023[30]), Luxembourg Green Exchange, https://lgxhub-premium.bourse.lu/

As Figure 1.5 illustrates, entities in developing countries issue only a slightly higher share of amounts under a labelled bond in local currencies than overall market participants (29% compared to 14%). This is despite many developing country issuers not having revenue streams in hard currencies and therefore potentially being subject to large foreign currency risks. However, there is evidence that emerging market economy sovereigns are increasingly able to issue bonds abroad in their respective local currency (BIS, 2023[57]). As monetary policy tightens further and the USD appreciates against developing country currencies, GSS bond issuance may become increasingly difficult for many developing country issuers. This is an area where donors together can play a bigger role, particularly as local currency issuance is typically smaller in size and receives a lower credit rating than issuances in hard currency, thereby potentially requiring more blended finance (see sub-section 3.2 for further details on donor engagement in local currency issuances).
2 Connecting the dots between green, social and sustainability bonds and blended finance

Blended finance refers to the strategic use of development finance for the mobilisation of additional finance towards sustainable development in developing countries (Figure 2.1) (OECD, 2018[58]). In doing so, scarce development resources are being deployed in a manner that shifts the risk-return relationship of investment opportunities with the aim to incentivize commercial investors to invest. Development finance is hence one way of unlocking further commercial finance, i.e., finance that seeks market-rate risk-weighted returns, stemming from private entities or public entities such as public pension funds or sovereign wealth funds.

Figure 2.1. The concept of blended finance

Whether donor support to GSS bonds can be considered as blended finance instruments depends on the involvement of development actors in unlocking commercial investment, in this case from bond holders. When examining the five policy areas for donor engagement ("the five Is", also see section 3 for further details and examples), GSS bonds would be considered blended finance in the case of:

- **Investment**: Anchor investments of donors and their development finance actors in GSS bond issuances can provide a risk cushion and hence confidence to others or to more senior commercial bond investors. Donors could invest in the first loss piece that is catered last by cash flows generated from underlying assets whereas senior tranches of the bond issuances are receiving principal and interest payments first. Moreover, development actor investments in more senior tranches can also have signalling effects for other investors, as was the case with OPIC’s investment in the senior bonds of a securitised portfolio of loans to microfinance and SME-focused financial institutions in emerging markets (OECD, 2021[59]).

- **Insurance**: Donors and their development finance actors can engage through credit enhancement by taking on credit or political risk of GSS bond issuances. Examples are IDB’s partial credit guarantee of USD 300 million to Ecuador’s first social sovereign bond in 2020 combined with technical assistance provided by Spain’s General Cooperation Fund and the joint risk insurance from the Multilateral Investment Guarantee Agency (MIGA) and the European Bank for Reconstruction and Development (EBRD) of a green and social bond issuance of the Elazig hospital in Türkiye. (EBRD, 2016[60])

- **Issuance**: As such, a stand-alone bond issuance by public sector or corporate actor operating in a developing country would not be considered blended finance due to the missing causal involvement of development finance in the unlocking of commercial bondholders. Donors and their development finance actors can support corporate and institutional issuers to issue GSS bonds through technical assistance, including with project preparation or on organisational and financial structures. Grants and technical assistance are not stand-alone blended finance instruments but can unlock commercial finance within a specific transaction boundary, in which case this support can be considered blended finance. It is important to note that the causal, direct mobilisation effect of grants and technical assistance remains challenging to measure (see next section).

- Development actors such as MDBs and DFIs can act as GSS bond issuers themselves and thereby link their funding side with the portfolio of projects in developing countries and emerging markets. The mobilisation of private finance hence takes place on the liability side of the balance sheet, i.e., commercial investors proving debt funding to MDBs and DFIs to expand their operations.

There are also other types of support to the GSS bond market by development institutions that can be catalytic but would not be considered blended finance:

- **(Market)-Infrastructure**: for example, technical assistance to market regulators that leads to an improved investment climate that draws in increased levels of commercial finance.

- **Impact**: support in local Taxonomy development – as done by the World Bank and the International Finance Corporation (IFC) for Colombia’s pioneering green Taxonomy (World Bank, 2022[61]), or the Climate Bonds Initiative, IDB’s and others for Chile’s local taxonomy (Climate Bonds Initiative, 2022[62]). This ultimately helps create greater clarity for investors, and thus greater interest in the local market, however, it is generally not associated with a transaction radius.

Infographic 2.1. illustrates the relationship between donors and GSS bonds as blended finance. Donors engage with issuers, investors, and the related market infrastructure more broadly across the five areas ("the five Is", also see section 3).
The use of GSS bonds is very much aligned with policy makers’ goals to mobilise the private sector (UN SDG, 2015[63]) and the delivery of the SDGs. The OECD DAC Blended Finance Principle 3, specifically in sub principle 3C, underlines that the relationship between blended finance and a sound investment climate is mutually reinforcing and supplementary. In this context, blended finance could be used through specific instruments, such as a local currency guarantee or structures such as a Public Private Partnership to support local currency issuance. At the same time, blended finance can help create new capital markets and support existing ones by providing capital to projects in difficult environments but also by facilitating further reforms and changing perception of risks (OECD, 2020[64]). Public and private investors are deploying blended finance (instruments) and are actively working towards being more transparent, both on the financial and on the impact sides. The OECD UNDP Impact Standards-Financing for Sustainable Development (IS-FSD) are an example of how public and private institutions can make financial decisions and manage blended finance instruments (including GSS bonds) to ensure optimal impact (OECD, 2021[65]). The IS-FSD provide a framework for donors, development finance institutions and their private sector partners to make financial decisions and manage projects in ways that generate a positive impact on sustainable development and improves the transparency of development results.

2.1. The mobilisation effect of green, social and sustainability bonds

As the mobilisation of private finance by development finance actors has gained an important role in the context of financing the SDGs, the OECD is measuring the amounts mobilised by development finance interventions. In 2020, USD 51.3 billion have been mobilised from the private sector by development finance interventions (OECD, 2023[7]). The underlying instrument-based measurement approach covers guarantees, syndicated loans, shares in collective investment vehicles (CIVs), direct investment in companies and SPVs, credit lines and simple co-financing mechanisms. While there is not a specific methodology to measure the mobilisation effect of bonds, or GSS bonds in particular, it can be captured through the following existing methodologies:
• **Insurance**: Donors’ and their development finance institutions’ activities with respect to credit enhancement through for example the use of guarantees. The mobilisation effect of these activities can be indirectly captured via the *guarantee* mobilisation tracking.

• **Investment**: Direct investment in bond issuances of companies and special purpose vehicles can capture structured bond issuance by projects, as well as the mobilisation effect of donors and their development finance actors taking a subordinated role that increases investor confidence. Moreover, *collective investment vehicles* may capture the capitalization of bond funds such as the Green Bond Cornerstone Fund which purchases green bonds from financial institutions in emerging markets. In doing so, it creates the necessary market demand for these types of issuances in these countries (EIB, 2023[66]).

Approaches within insurance and investment can be more directly attributed to mobilisation effects; whereas the other three policy areas (Impact, (Market)-Infrastructure, and Issuance) are more difficult to capture, despite also having catalytic effects. Despite the data efforts on GSS bonds, this may already be captured implicitly in the current statistical collection exercise. A clear figure on the mobilisation of private finance by donor interventions on bonds is pending.
3 How can donors collectively support green, social and sustainability bond issuances?

Donors have a unique role to play in supporting developing countries to advance their access to the GSS bond market. Their collective support ideally should be well-targeted, co-ordinated, and context-specific to the individual market conditions of each country. Successfully supporting such a market is not straightforward, as many exogenous factors such as macro-economic, political, and geopolitical conditions affect market development and are beyond donors' sphere of influence. Indeed, GSS bond issuers in developing countries face several significant, often interrelated obstacles. These can be technical and related to the project itself, but also tied to the broader political and systemic context. Infographic 3.1. summarises some of these key challenges. As discussed in section 1, these challenges mean that developing countries remain largely excluded from the GSS bond market, despite significant financing needs. At the same time, it is important to recognise that these challenges – and others – mean that many developing countries do not have the capacity to issue any type of bond. The recommendations presented in this report, therefore, focus mostly on countries with a degree of market access and a relatively developed capital market.

Infographic 3.1. Key challenges to green, social and sustainability bond issuances in developing countries

- **Weakened macro-fundamentals**
  - Rising debt sustainability concerns
  - Economic growth aspects affected by pandemic
  - Capital flight due to higher interest rate environment

- **Weak financial markets**
  - Challenges to meet credit rating requirements to tap into international markets
  - Low capital market development levels

- **Missing technical capacity**
  - Lack of awareness around GSS bonds and costs/benefits of their issuance
  - Lack of familiarity with financial structuring required for successful GSS bond issuances
  - Low issuances in developing countries limit opportunities for peer-learning

- **Lack of bankable projects**
  - Project sizes not large enough for GSS bond financing
  - Lack of resources and expertise to identify and prepare pipelines of sustainable projects
  - Weak regulatory environment can aggravate project risks

- **Dilemma between interoperability and adaptation to local contexts**
  - Sophistication of internationally recognised Standards and Taxonomies can dissuade local issuers
  - Limited expertise to create local Standards and Taxonomies

- **Limited familiarity with international investors**
  - Lack of networks to target investors with preferences for ESG debt
  - Weak familiarity with reporting requirements demanded by investors, and labelling or listing options

Even in countries with relatively developed capital markets, issuers face numerous challenges which donors can play an important role in overcoming. Indeed, donors have a plethora of approaches and facilities at their disposal to allocate ODA and other official finance to (see Table A.1. Overview of donor initiatives with a specific green, social and sustainability bond focus in the Annex for examples of such initiatives). Currently, donors working towards furthering the GSS bond market are typically doing this individually. There are some joint-up initiatives, but collective efforts amongst donor institutions and with the private sector do not exist at the scale needed to move from ad-hoc issuances to a GSS bond market that would draw in institutional investors to invest at scale in the countries with the greatest needs.

To facilitate a more strategic and portfolio approach, it is helpful to group the different types of support along “the five Is”. This report builds on prior work by extending the focus to corporate issuances, laying out more systematically the development and non-development actors involved at each level and ways in which development finance actors can improve co-ordination. Lastly, to further highlight the fundamental importance of the actual impact of GSS bonds, a fifth “I” for Impact is added to the framework developed in the OECD report to public sector issuances (OECD, 2022[3]) resulting in “the five Is” (see Infographic 3.2.), as policy areas where donors can meaningfully contribute to GSS bond market development in developing countries. The report offers three recommendations for each policy area and highlights which type of development institution would be part of the primary implementers of each recommendation based on mandates and institutional and financial capacity (section 4). Collectively the “five Is” are important areas but they are not listed in terms of priority or sequencing.

**Infographic 3.2. “The five Is” framework: policy areas where donors can support green, social and sustainability bond issuances**

**EXAMPLES OF DONOR SUPPORT PER POLICY AREA**

**INVESTMENT**
- Anchor investments
- Convening of developing country issuers and investors to facilitate networking

**INSURANCE**
- (Partial) guarantees
- Political risk insurance

**ISSUANCE**
- Technical Assistance for project preparation and development
- Capacity building on issuance process

**INFRASTRUCTURE**
- Technical Assistance for debt management offices
- Support development of local ecosystem of local second-party opinion providers and certifiers

**IMPACT**
- Technical Assistance for the development of Taxonomies, Standards and Frameworks
- Capacity building in data collection and analysis

“the five Is”

Source: Adapted from OECD (2022[3]), ‘Green, social, sustainability and sustainability-linked bonds in developing countries: How can donors support public sector issuances?’, https://www.oecd.org/dac/green-social-sustainability-and-sustainability-linked-bonds.pdf

Within each area (or “I”) of potential support, donors are part of a complex ecosystem of public and private sector stakeholders and actors. While actors naturally differ according to local institutional set-ups, there are several actors that can be identified as generally relevant in a majority of country contexts. Infographic
3.3. maps out examples of donor initiatives, as well as the stakeholders most typically relevant to each policy area (or each "I"). Some stakeholders are relevant to initiatives in more than one area, and Issuance, Insurance and (Market) -Infrastructure tend to be the most complex in terms of number of stakeholders engaged.

Infographic 3.3. Ecosystem map of typical green, social and sustainability bond market

DONOR INITIATIVE EXAMPLES

<table>
<thead>
<tr>
<th>INVESTMENT</th>
<th>INSURANCE</th>
<th>ISSUANCE</th>
<th>(Market)</th>
<th>IMPACT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anchor investments</td>
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<td></td>
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<tr>
<td>Investment vehicles</td>
<td>E.g. EGO Fund, LA Green Fund</td>
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<tr>
<td>Political risk insurance</td>
<td>E.g. MIGA</td>
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<td>Peer exchange and training</td>
<td>E.g. IFC SBIN</td>
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<tr>
<td>Local external reviewer ecosystem</td>
<td>E.g. Nigeria Green Bond Market Development Programme</td>
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<tr>
<td>Creation of local repo markets</td>
<td>E.g. Liquidity and Sustainability Facility</td>
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<tr>
<td>Impact Reporting</td>
<td>E.g. Green Bond Transparency Platform</td>
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<tr>
<td>Taxonomy Development</td>
<td>E.g. projects by AfD, GIZ, IDB</td>
<td></td>
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RELEVANT STAKEHOLDERS

Note: The donor initiatives and relevant stakeholders listed here are examples.

3.1. Investment

Development finance actors can play a significant role with respect to supporting GSS bond markets by investing in labelled bond issuances by different types of issuers in developing countries. Anchor investment by development finance actors can establish confidence in the fund or bond issuance beyond the financial aspects e.g., by taking up junior of mezzanine traches at concessional or market-rates, but also though their widely recognized knowledge of the market and due-diligence processes. Such investments can signal to other market participants credibility both in terms of issuer and ESG profile of the bond. Besides the provision of credit enhancement via for example credit or partial credit guarantees (see section Insurance) this can be an entry point of how development finance interventions can unlock commercial investment.

First-loss blended finance has proven to be effective at mobilising private sector participation (OECD, 2020[7]). The concept of so-called anchor, cornerstone, junior or subordinated investments undertaken by development finance actors in mobilising commercial finance that would otherwise not have been channelled to development outcomes has been established as an instrument of blended finance (OECD, 2018[8]). In doing so, development actors that have either a development mandate – such as aid agencies – or a dual development/profitability mandate – such as DFIs – adjust the risk-return relationship of a single
transaction in a way that commercial investors that seek risk-weighted market rate returns are willing to invest.

In the case of such structured transactions, different types of risks and return tranches are introduced, including high (low) risk in the junior (senior) bonds issuance tranche. The waterfall characteristics of such products enable the junior tranche bond holders to serve as a risk cushion for any defaults on repayments of principal and interest, as flows would be channelled to senior bond holders first and junior bond holders last. Development finance actors that invest in such junior position often in addition do not demand market-level return rates, which could be prohibitively high given the significant risk associated with GSS bonds issuances in new and unexplored markets (see also (OECD, 2018[58]) and (OECD, 2021[59])).

Such first loss/anchor investor structures are a feature of structured funds, which enables diversification of investment on a portfolio basis. An example is the IFC Amundi Planet Emerging Green One (EGO) fund, which itself invests in green bond issuances by financial institutions in developing countries. As a collective investment vehicle, the fund pools official and commercial finance. IFC, EBRD, EIB Proparco stepped in as anchor investors, and pension funds, insurance companies and asset managers as senior investors in the vehicle (IFC, 2018[68]). In 2021, IFC and Amundi announced a similar structure with the USD 2 billion Build-Back-Better Emerging Market (BEST) Fund. BEST is expected to receive an unfunded guarantee by the International Development Association’s Private Sector Window Blended Finance Facility and is set up to invest in GSSS bonds of corporate, financial and sub-sovereign issuers. So far, there has not been a similar structured fund that also invests in sovereign GSS bond issuances.

In the GSS bond spectrum, the typical sequencing of an anchor investment role in unlocking commercial finance for sustainable development purposes may be preceded by development finance actors’ engagement in working with the issuers. For example, supporting setting up or applying the respective GSS bonds framework (see also Impact and Issuance sub-section) and launching the GSS bonds instrument as a (re)-financing mechanism for the respective entity in the form of a private placement, i.e., a bond issuance that is not publicly traded but held by one or more targeted investors. This first-time private issuance of a bond can serve as a test to build the institutional capacity, knowledge and ambition to raise future funds on public capital makers and avoid significant cost associated with public listing. Development finance actors such as MDBs and DFIs can provide targeted technical assistance to such transaction as well as in investing in them. Consultations for this report highlighted a particular value in pairing technical assistance with anchor investment approaches. Well-targeted technical assistance can support the issuance process considerably while also providing investors quality assurance and softening risk perception of the transaction.

Such engagement can be undertaken with a view towards repeat transactions that would be publicly issued and at the same time would require less so-called anchor investments by development finance actors over time (Infographic 3.4.). An example is Emerging Africa Infrastructure Fund (EAIF)’s engagement as a largest single bond investor in a privately placed corporate green bond issuance with the ambition to scale green student accommodation in Kenya. The ambition of the local currency private listing is to build the local green bond market and mobilise local as well as international investors (Bartz-Zuccala et al., 2022[69]; GuarantCo, 2020[70]).
The transitory nature of development finance actors in stepping in to address market failures with the help of – often concessional – development capital to build stand-alone private finance markets is at the core of the blended finance concept (OECD, 2018[58]). Scarce and finite development finance can enable the creation of GSS bond markets via the investment dimension by boosting investor confidence in issuers, including for those investors that are new to GSS bonds and/or developing countries. However, in cases where only DFIs or development banks invest in a labelled bond issuance, careful analysis of whether there is market appetite should be considered to avoid potential crowding out effects of other private sector investors in the issuance. Over time, less and less development finance in terms of amounts but also level of concessionality may be needed to unlock more and more private institutional bond holders via public market transactions. Ultimately, development finance interventions may become redundant, both at the individual transaction level as well as possibly collectively at the markets level, e.g., with respect to the corporate GSS bond market in a specific country.

Many donors and their DFIs have been exploring ways to systematically purchase GSS bonds from developing countries (OECD, 2022[3]). Some of the key challenges the donor community faces include the ambiguous ODA-eligibility rules of these instruments. While concessional loans to the private sector have been included in the ODA definition for decades, it is unclear how this guidance relates to other debt instruments, such as bonds. Since 2022, donors have been reviewing ODA rules for private sector instruments (PSI), with bonds in particular discussed in the first half of 2023. Ideally, the review will yield clear rules on measuring donor effort in purchasing bonds as ODA, which will in turn help DFIs and similar vehicles scale up their investments using these instruments.

**Investment Recommendations**

To intervene effectively in the investment dimension of the GSS bond markets, donors should:

- **Scale-up investment, where most effective** — identify effective financial structures that strategically use development finance to unlock private bondholders, foster their replicability and then aim for scale. An important step would be to finalise the OECD DAC PSI review to clarify rules on ODA-eligibility of donor investment in GSS bonds.
• **Understand the local GSS bond market** – develop a thorough understanding of the maturity of the respective market to operate effectively in line with the blended finance principles, focusing on additionality in crowding in institutional investment. When providing anchor investments in GSS bond issuances, donors should be clear that this is the most effective use of development finance, also with a view on the effect of developing the local GSS bond market and mobilising private investors.

• **Consult with the private sector early on when designing programmes** – work early on with issuers and possible investors to encourage participation. This should be done through understanding the risk-return preferences of each side to effectively calibrate volumes, terms, and risk parameters of donor interventions in e.g., structured issuances or vehicles.

### 3.2. Insurance

Donors have a variety of tools at their disposal to enhance the risk-return profile of GSS bonds. One approach is extending (partial-) credit guarantees and political risk guarantees. Guarantees have shown to be very effective instrument for mobilising private finance (Garbacz, Vilalta and Moller, 2021[71]) and have mobilised more private finance for sustainable development than any other financial instrument from 2012-2020 (OECD, 2023[72]). They can provide vital support to the credit rating of GSS bond issuers and fulfil a signalling role that boosts interest in certain markets or types of issuers. From a donor perspective, the extension of a guarantee can be an efficient way of leveraging donors’ balance sheets (depending on how they are accounted for, see examples underneath). At the same time, donors need to scrutinize structures and frameworks of the GSS bond when they extend a guarantee to ensure proper allocation of proceeds and sound development impact. Consultations have yielded that there have been a limited number of guarantees from development institutions for GSS bond issuances so far. This could be due in part to the complexity of the instrument, lack of adequate skill sets and organizational frameworks within many development institutions.

A guarantee is a mechanism where a third party (often a development institution) enters an agreement to fulfil the obligations of a borrower to a lender in case of non-repayment. The guarantee can cover different reasons for non-payment such as technical default, political instability or other risks related to the issuer. Guarantees that protect investors from non-repayment due to issues related to the issuing entity itself are generally referred to as (partial-) credit guarantees, whereas insurance against government risks such as change of laws and regulation, breach of contract, expropriation, convertibility restrictions and war or civil unrest are referred to as political risk insurance/guarantees. As they both insure the creditor or investor (partially) from potential losses, they are here categorized as insurances more broadly. Consultations for this report pointed to cases where institutional investors that had engaged in a guaranteed transaction subsequently underwent a learning curve. After a first successful transaction, they went on to gradually require lower or no guarantee coverage for a certain type of bond issuance over time by gaining confidence in their own risk appraisal abilities.

The use of guarantees should be determined based on maximizing additionality, addressing market failure with minimum concessionality and tailored to the type of bond market that the intervention is targeting, in line with the OECD DAC Blended Finance Principle 2 (OECD, 2018[69]). This includes Principles, including whether the guarantee can provide a credit uplift to the GSS bond into an investment grade category and subsequently mobilise private investors. Guarantees may not be that effective or efficient where the issuing entity has a very low credit rating requiring significant guarantee support to reach investment grade ratings. The use of guarantees should therefore be determined based on a number of factors, including the mobilisation effect compared to other options such as anchor investments. These mobilisation differences should be tested before deciding on a particular instrument or combination of both. In the past there have also been examples of combinations of guarantees and junior or mezzanine investment in order to help encourage issuance and reach scale. An example of such a combined approach is Egypt’s first corporate...
green bond issuances which received anchor investments from EBRD, DFC, FMO and KfW as well as guarantees by both MIGA and EBRD.

There is an important distinction between funded and unfunded guarantees. The former requires part of the guaranteed amount to be set aside in an escrow account (the European Fund for Sustainable Development (EFSD) for example keeps 50% of the guaranteed amount in reserves), whereas the latter only keeps in reserve the expected loss from a guarantee. Funded guarantee programmes lower balance sheet risks for a donor, whereas unfunded guarantees can leverage more substantial private finance compared to provisions kept in reserve (Garbacz, Vilalta and Moller, 2021[71]). For unfunded guarantees, solid methodological approaches and risk appraisal capacity become even more important. Sida’s guarantee programme is an examples of unfunded guarantees: it only requires very limited amounts of the institution’s own resources since Sida charges a fee (which can be subsidised if needed and gets paid into a guarantee account) to cover the risk for the duration of a guarantee depending on expected loss (Sida, 2017[72]). In case of defaults, payments are then drawn from the account. Deploying guarantees requires specific financial and risk-management expertise which may be unavailable within donor institutions.

To date, there are very few examples of donor or their development finance institutions guaranteeing a GSS bond. One reason why there have been very few guarantees to date is that guarantees have not been defined within ODA-accounting guidelines, therefore decreasing donors’ ability to use them (Garbacz, Vilalta and Moller, 2021[71]). In 2022, donors launched their review of ODA directives on private sector instruments, including credit guarantees. While the ultimate outcomes of the review are yet to be seen, the DAC approved new rules for credit guarantees in ODA in April 2023.

Donor institutions that are providing guarantees in general fall into three categories:

- bilateral aid agencies
- DFIs and MDBs
- specialised guarantee providers with a development mandate

**Bilateral aid agencies:** Only a handful of bilateral aid agencies are currently extending guarantees and none so far has been able to provide guarantees directly to sovereign counterparts (Willems and Zoltani, 2022[73]). Even the most experienced and active bilateral aid agencies amongst DAC donors in guarantee extension, USAID/DFC and Sida, have only guaranteed a relatively small number of labelled bonds. This is despite the fact that some donor agencies in theory have the possibility to guarantee bonds in more risky contexts, sectors or local currency because unlike DFIs and MDBs, they are not bound by their own credit rating.

**DFIs and MDBs:** DFIs and MDBs are well-placed for guarantee extension as they have high inhouse financial and development expertise. A few bilateral DFIs offer guarantees as instruments but many do not have full-fledged guarantee programmes. All large MDBs in principle offer (partial) credit and political risk guarantees to both corporate and sovereign bond issuers and tend to be able to extend much larger size guarantees than bilateral DFIs. Even though guarantees are offered by MDBs, they have seen very limited uptake (Humphrey, 2018[74]; Puerta et al., 2023[75]). Reasons for this can be found within MDB internal policies and in pricing incentives from a borrower perspective. The Independent Evaluation Group from the World Bank for example, found that “World Bank staff do not have incentives to engage and mobilize private actors in World Bank projects and scale up Private Capital Mobilization” (IEG - World Bank Group, 2021[76]). There therefore is a risk for staff to favour more traditional lending instruments such as loans over more operationally complex instruments such as guarantees that require third party involvement, unless there is strong initiative and demand from the client.

There are two major internal policy hurdles to increasing MDB guarantee extension, which can disincentivize the use of MDB guarantees from a borrower perspective. One hurdle is that pricing structures of MDB guarantees are in most cases equivalent to MDB loans, as guarantees weigh as heavily on MDB balance sheets as loans despite having a lower call rate than loans in arrears (Humphrey and Prizzon,
A second hurdle is that guarantees also count against recipient countries' MDB lending envelopes as heavily as MDB loans (Humphrey and Prizzon, 2014[77]). In addition, setting up a guarantee compared to a MDB loan implies facing the organisational costs of engaging with investors. External reviewers and impact verification often required for guaranteeing a GSS bond increases operational costs even further. Some MDBs have started to set aside sub windows that make exceptions for guarantees, for example allowing policy-based guarantees to only count against the lending envelope on a 1:4 basis (Landers and Aboneeaj, 2022[78]) (Humphrey and Prizzon, 2014[77]). Additionally, careful debt sustainability screening are crucial for MDB guarantees, as evidenced by the complications arising from the restructuring of a sovereign bond partially guaranteed by the World Bank due to the MDB Preferred Creditor Status (Weidemaier, Panizza and Gulati, 2022[79]).

Incentive structures such as these may dissuade donors from moving from more established financing instruments towards the potential of the GSS bond market. MDBs' and DFIs' governance structure and risk policy fall under the supervision of their respective board of directors and shareholders. To increase the uptake of guarantees more generally but in particular for GSS bonds, donors as shareholders of DFIs and MDBs could consider discussing pricing and internal incentive structures for the employment of guarantees with the respective management of the institutions.

**Specialized guarantee organisations:** In addition to aid agencies, DFIs and MDBs, there are a number of specialised guarantee organisations that inter alia extend guarantees to bond issuances: MIGA (as part of the World Bank Group), GuarantCo, InfraCredit, the African Guarantee Fund and the Development Guarantee Group. These are generally funded by bilateral or multilateral development institutions and have a development mandate (OECD, 2021[80]). None of these institutions have a particular strategic focus on GSS bonds, but most have supported at least one labelled bond issuance with a partial credit guarantee in the past. One of the largest and most recent multilateral guarantee initiatives is the European Fund for Sustainable Development (EFSD+), which was recently approved to reach up to EUR 6 billion in guarantees implemented and combined with efforts by European DFIs and national development banks. The EFSD+ guarantee also backs resources in the EU Global Green Bond Initiative (GGBI).

Besides specialised guarantee organisations, only very limited guarantees have been extended jointly by different bilateral or multilateral development co-operation providers. Such joint approaches can strengthen the attractiveness of the guarantee program for investors and investees alike but would require donor institutions to work together more closely amongst one another. Benefits of joined-up approaches include reaching sufficient scale and leveraging synergies in the considerable set-up costs of guarantees as sophisticated financial instruments. In fact, many bond issuances are so large in size that the amount required to provide a tangible credit uplift exceeds the capacity of many individual bilateral donor institutions. An example of a (multilateral) joined-up guarantee approach to GSS bonds are MIGA and EBRD who signed a Memorandum of Understanding in 2019 which includes greater co-operation on guarantees. They recently jointly guaranteed Egypt's first private green bond (European Bank for Reconstruction and Development, 2022[81]) and previously a social and green bond in Türkiye (EBRD, 2016[80]).

At the same time, setting up guarantees can be quite costly in terms of staffing required, particularly human resources with technical expertise and the required time to set-up processes. Sida for example, when reviewing a Ugandan local currency bond guarantee in 2016, concluded that the intervention was a "good example to reflect the amount of efforts involved in terms of time and human resources on the bilateral donor side" (IMF; World Bank Group, 2016[82]). Joining forces with other donors can lower these costs while aiming for larger scale if donors can harmonize approaches and jointly conduct appraisal processes. Feedback from consultations also highlighted the need for as much simplicity and standardisation in the use of guarantees from development co-operation providers as possible, including the establishment of templates, to ensure harmonised approaches and ultimately enhanced ease in using guarantees.
**Insurance Recommendations**

To intervene effectively in the insurance dimension of the GSS bond markets, donors can undertake the following actions:

- **Scale-up guarantees, where they have catalytic effects** – increase general uptake of guarantees for GSS bonds by donor institutions, as they have shown to be effective tools to mobilise private finance. However, ensure that guarantees offer the most effective use of development finance compared to other instruments.

- **Increase institutional capacity of donor institutions to provide guarantees** – donor institutions with limited familiarity with guarantees should develop institutional technical capacity to build up programmes most suited to their development finance system. More joint guarantees between different development institutions should be the ambition, to leverage synergies and reach scale. To do so, increased harmonisation of processes and requirements across guarantee programmes would be beneficial.

- **Encourage uptake of existing MBD and DFI guarantees for GSS bond issuances by examining the institutions’ internal policies** – analyse whether guarantees as an instrument are appropriately incentivized compared to traditional lending instruments within MDBs’ and DFIs' organizational structure and balance sheet treatment.

### 3.3. Issuance

For a (potential) GSS bond issuer in a developing country context, lack of technical capacity, limited project pipelines and insufficient project size are recognised as key impediments (Climate Bonds Initiative for the Global Center on Adaptation, EBRD, 2021[3]). Figure 3.1 illustrates readiness of issuers stylistically in the case of green bonds for climate resilience, however, the stages apply for issuers of other type of labelled bonds as well. Donors can support issuers through (i) pre-investment project preparation or (ii) by advising on organizational and financing structures. The former includes helping to build up robust pipelines including through early-stage project development and project feasibility studies. The latter refers to supporting the set-up of internal processes to identify and monitor eligible projects, legal and transaction structuring advice.
Lack of reliable pipelines is often cited as a key hurdle for increased private sector investment in developing countries (OECD, 2023[7]). To counter pipeline concerns, multiple donor institutions have been setting up different project preparation facilities (PPF) mainly for infrastructure projects. These facilities typically provide technical support to public sector organizations and to the structuring, feasibility studies and transaction structure of a project. Considering reporting structures, eligible project criteria and other considerations required for a successful GSS bond issuance early in the lifecycle of a project can facilitate issuance down the line considerably. Not all PPFs systematically integrate GSS bonds early on as a financing option in their programme, which is why there is scope for further systematic inclusion of GSS bonds. Importantly, in a lot of developing country contexts and for greenfield projects, a substantial initial equity investment is often necessary to take a project from concept to bankability. This is relevant as many projects in low-income countries never reach financial closure: in Africa for example, around 80% of infrastructure projects never go beyond the feasibility and business plan stage (Lakmeeharan et al., 2020[84]). Several PPFs have been making this initial high risk equity investment that help cover initial project cost such as feasibility studies, but not at the scale needed. To build up stronger project pipelines that can then at a later stage move to debt capital and GSS bonds, an upscaling of these riskier types of equity investments could be beneficial.

Establishing a project pipeline suitable for a GSS bond issuance either requires large scale projects or an aggregation of projects to reach the necessary size. Many projects seeking GSS bond finance in developing countries (particularly in Sub-Saharan Africa) are too small to reach the scale needed to attract institutional investors. This limited size also impedes them to be included into an ESG index for which size is a determining factor (Jain, 2022[22]), which could unlock much larger investor demand. In many low-income contexts, projects of an adequate size are either very scarce or not attainable due to country and
market size. For smaller developing countries with limited project pipeline of green or social projects, it could be useful to choose sustainability bonds as an option to reach sufficient scale by combining green and social projects. Aggregating smaller projects and bundling them in an issuance can also be a way to alleviate the size constraint. Such project aggregation could in theory also be done across country borders, however, this can be very challenging due to differing Standards, Taxonomies and currency exchange risks involved. To increase regional aggregation, the most straightforward way would be to increase GSS bond issuance through existing regional institutions such as regional development banks, who then distribute the proceeds of the bonds to projects across the region. So far, there have only been very few regional issuances, mostly by regional development banks that have a high-grade credit rating and are supported by donor funding such as the West African Development Bank (BOAD) and Development Bank of Latin America. For example, there was a regional green bond issued by Corporación Interamericana para el Financiamiento de Infraestructura. The regional infrastructure lender issued a green bond in 2022 based on a portfolio in eighteen Latin American and Caribbean Countries (Symbiotics Group, 2022[85]). Donors could support such regional transactions in two ways. Firstly, by supporting the regional institutions that undertake them in their role as shareholders. Secondly, by supporting the alignment of country-specific Taxonomies and Standards within one region (also see section 3.5 on Impact).

Donors can also support issuers in putting in place internal strategies and having a coherent internal work process, for example reporting timelines and annual assessment reporting. This can be a key requirement for a government debt office that is working for example with a number of line ministries in pulling together suitable projects and then ensuring reporting on their progression. Sovereign issuers will also typically need to establish working committees with project evaluators, national resource planning ministries, market regulators and budgetary bureaus. Corporate issuers as well need to set up internal reporting lines and organizational structures before issuing a GSS bond. Donors can help support issuers in these organizational hurdles through technical assistance. Similarly, many first-time GSS bond issuers are not familiar with the financial structuring required for a successful bond issuance. Based on consultations for this report, in many regions, issuance is currently ad-hoc with no discernible issuance strategy. Such a strategy for example includes strategic choices of the target amount of debt looking to be raised and other considerations such as tenor of the bond, the weighing of different listing options such as private placement or public listing, which stock exchange to issue in, currency choice (see more on local currency in section 3.4) and dual listing options. Dual listings, where a GSS bond is issued on two or more stock exchanges simultaneously, can improve the bond’s visibility to international investors, increase liquidity while also enhancing impact information particularly as disclosure requirements are higher in some markets than others (Luxembourg Stock Exchange, 2023[86]). The IFC Green Bond Technical Assistance Program offers training and best practice sharing to executives from financial institutions on GSS bond issuances. Some donor agencies have also started co-operating with multilateral development banks in their support of issuers themselves as highlighted by the Australian Department of Foreign Affairs and Trade–IFC Fiji Partnership, which supported the government of Fiji in its first sovereign green bond issuance (Australian Government: Department of Foreign Affairs and Trade, 2019[87]).

Different development co-operation providers are currently offering such technical assistance and consultations have yielded a need for increased co-ordination on their approaches. Similar to Taxonomy and Standard development (see sub-section 3.5 on Impact), a certain alignment on how to best support issuers through technical assistance can help address confusion in the market and encourage learning from best practice. To help address this issue, the EU Commission is setting up a comprehensive technical assistance hub for Green Bonds within the auspices of its Global Green Bond Initiative.
Issuance Recommendations

To support the issuance of GSS bonds, donors should:

- **Support building-up of solid project pipelines** – development co-operation providers should scale-up support to the very early and more risky project preparation stages in order to build up much needed project pipelines, for example in the form of early-stage equity investments.

- **Encourage project aggregation in country contexts or sectors with small scale projects** – by supporting regional issuances from existing regional institutions such as regional development banks through effectively capitalizing and encouraging GSS issuances by national development banks (NDB) in their role as shareholders.

- **Pursue holistic support programmes with a view towards repeat issuances** – covering pre-investment, during investment and post-issuance support. Such support should include necessary knowledge and capacity to set up internal co-ordination mechanisms, weigh different financing options, develop the necessary impact criteria and KPIs, and maintain them over the lifecycle of the bond.

3.4. (Market)-Infrastructure

The market infrastructure needed for GSS bonds issuances remains insufficiently mature in many ODA-eligible countries. A wide range of financial organizations are required, such as stock exchanges and trading platforms, clearing houses, credit risk assessment, custodians, and fiduciaries. Additionally, in order to create a favourable investment climate, legislative requirements as well as sound taxation and accounting frameworks, enforcement, protection of creditor rights, and bankruptcy and competition law are crucial (Dembele, Schwarz and Horrocks, 2021[1]). Overall, fundamental macroeconomic and policy stability are the building blocks to allow for the creation of a well-functioning general bond market (Amundi and IFC, 2022[88]). As noted above, development co-operation providers cannot influence the whole range of moving parts required for a functional (GSS) bond market. However, targeted and co-ordinated support on some entry levers can be conducive to market development for GSS bonds in particular.

GSS bonds as tradable debt instruments are reliant on a certain level of maturity of financial development. Literature suggests that at early stages in financial development, banks as lending institutions are preferred due to their offering of simpler contracts tied to collateralized or safer investments with shorter maturities (World Bank, 2019[89]). After a certain degree of trust is established in the banking system, a wider set of instruments such as bonds or equity instruments might be offered. The establishment of a labelled bond market then adds an additional level of complexity and is therefore usually introduced after a traditional bond market has gained some maturity. Donors therefore need to adapt their approaches to the maturity level of market development in different countries and ensure that key elements and local actors are in place before moving to support a GSS bond market.

Strengthening peer-exchange platforms for regulators and the banking system is one entry point for donor support. Creating platforms for key actors to exchange on innovative approaches can play an important part in informing and convincing national stakeholders on the GSS bonds process. These platforms can also provide hands-on information, while supporting harmonization of Taxonomies and Standards to a certain degree. The Sustainable Banking and Finance Network (SBFN) hosted by IFC, for example, brings together financial sector regulators and industry associations on different sustainable finance topics, including on GSS bonds issuances. For example, this could include technical assistance with best practice examples of sovereigns who have created additional tax or collateral incentives to issue green or sustainability bonds, such as in the case of tax benefits provided by Brazil for certain sustainable infrastructure investments developed by the Brazilian Financial Innovation Lab (Knoch and Van der Plasken, 2020[90]). Systematically including training on GSS bonds into both multilateral and bilateral
technical assistance to relevant government agencies would also help raise awareness of the opportunities that GSS bonds present and pre-requisites required before starting a labelled bond program. For example, MDBs and the IMF conduct regular technical assistance training for both corporate and sovereign counterparts in their partner countries (such as the IMF Debt Management Facility or IDB CapilAC and meeting of DMOs). These could systematically include components on the technical requirements and pros and cons of GSS bonds issuances. Such an approach raises the technical know-how and broader awareness for policy makers of GSS bonds.

In most developing countries there is also a lack of qualified, local external reviewers for GSS bonds. ICMA identifies three types of external reviews – second party opinion, verification, and bond rating (ICMA, 2022[91]) – and the ICMA Principles[10] recommend an external review of the bond at both the pre-issuance and post-issuance phase. In some cases, external reviews are required in order to label a bond under a specified Standard. For example, the preliminary agreement on the EU Green Bond Standard (EUGBS) proposes to require external review of European green bonds and establishes a registration system and supervisory framework for all external reviewers (European Parliament, 2023[92]). For issuers, external reviews are important as they serve as signalling tools to investors (Simeth, 2022[24]). Still, external reviews are also costly – meaning that issuers may be unwilling or unable to seek more than one form of external review (Kaminski and Majowski, 2016[93]) – therefore presenting a hurdle to GSS bond issuances which are transparent regarding their impact. A local ecosystem of external reviewers with the necessary expertise on GSS bonds can develop an in-depth understanding of local Standards and Taxonomies and regulation as well as market dynamics, while also potentially offering lower cost alternatives compared to international external review providers. Donors could support the build-up of such an ecosystem, for example by providing capacity building to different types of local external reviewers and verify or certify their approaches. The aim of this is to increase investor trust in local reviewers by ensuring coherence and robustness in their methodologies. For example, the development of Nigeria-based licensed verifiers to support issuers is one of the key focus areas of the Nigerian Green Bond Market Development Programme (Climate Bonds Initiative, FSD Africa and FMDQ Group PLC, 2022[94]).

Robust market infrastructure for bonds issuances also includes the availability of functioning repo and secondary markets, which do not exist in many developing countries. Secondary markets are important as they ensure liquidity to investors, support market-based price discovery and provide significant benefits for the economy (Mortaza and Bin Shadat, 2016[95]). A lack of market liquidity, the market’s ability to facilitate the purchase or sale of an asset without causing a significant change in the asset’s price, is still a stumbling block for many institutional investors looking to invest in developing countries. Repo markets allow for the exchange of short-term secured loans (so called repurchase agreements), which allows financial institutions to earn interest on cash without taking excessive risk and supplies short-term liquidity to the market. The announcement at COP27 of the Liquidity and Sustainability Facility brings the possibility of liquid secondary markets in Africa closer to reality (UN ECA, 2022[96]).

Besides the support to market infrastructure in developing countries themselves, OECD countries’ own regulatory framework and financial institutions can play an important role in furthering investments in GSS bonds in ODA-eligible countries (see Box 3.1 for further details).
Box 3.1. Leveraging of OECD countries’ domestic financial architecture and institutions

OECD governments can also make use of major levers in their own financial systems through regulation and dialogue with their local investors community.

In terms of regulation, pension funds and insurance companies are often subject to significant regulation on capital adequacy and risk exposure. In some cases, pension funds are forbidden to invest in certain geographies or markets. For example, Finnish company pensions funds are not allowed to invest in non-OECD/EEA countries (OECD, 2021[4]). Loosening restrictions on investments abroad without violating prudent management principles would be in line with OECD Principles of Private Pension regulation that suggest to allow investments abroad with pension providers with respective safeguards (OECD, 2016[97]).

DFIs located in OECD financial systems can play a strong market building role in their own capital markets by strengthening strategic issuances of GSS as part of their funding models. They can serve as conduits to investing in developing countries by providing institutional investor portfolio access to the developing world. Thanks to the growing investor interest in ESG investments and GSS bonds, this may allow DFIs to broaden and deepen their investor base. Many DFIs are already actively issuing GSS bonds, for example AFD, FMO and KfW, into their own financial markets. These types of approaches of raising low-cost debt through a national or local entity, often with a high DFI credit rating, and on-lending to developing countries can be an efficient form of mobilising investors in OECD countries. Additional to becoming active issuers themselves, DFIs with a strong presence in their national capital markets can also help familiarize national institutional investors with requirements and opportunities of investing in GSS bonds in developing countries.

The development of local currency bond markets in developing countries can strengthen the stability of local financial systems by lowering currency and maturity mismatches (Park, Shin and Tian, 2018[98]) and support the sustainability of domestic debt markets. Supporting the deepening or creation of these markets can therefore be one tool for donors to support macro-economic stability. At the same time, GSS bonds offered in respective local currency can be a way to access funding from local institutional investors within developing countries, by offering them an alternative to investing abroad. Nevertheless, in many developing country contexts, domestic capital markets are relatively shallow making mobilisation at scale more challenging than in hard currency bond markets abroad. In early stages of market development or if the secondary market is illiquid, increasing the share of foreign investors in local currency bonds should be done only carefully, as it can increase market volatility in challenging market conditions (IMF; World Bank Group, 2020[99]).

As noted in section 1, the majority of GSS bonds issued in developing countries continue to be denoted in hard currencies, which presents challenges in terms of debt service predictability for issuers. More could be done by donors to strengthen local capital markets, while recognizing the role that hard currency financing can play in facilitating access to larger scale international capital markets. Development finance institutions should seek to increase programmes specifically targeted at furthering local currency bonds, despite the significant challenges in terms of currency hedging costs this poses. Guaranteeing a developing country bond issuance in local currency will require covering significant hedging costs and therefore even more effort from a DFI. Some DFIs face specific mandate limitations on local currency risks.
Donors, therefore, need to weigh up hard currency mobilisation in the short-term versus often longer-term local currency capital market development, recognising that financing the SDGs will not be achievable with local currency capital alone. As noted in Section 3.2 on investment and insurances, development institutions have so far only extended guarantees in local currency in exceptional cases. A notable initiative backed by donor support is the Currency Exchange Fund (TCX), which is offering local currency hedging options for emerging or frontier market bonds issuers.

Another avenue for development co-operation providers to support local currency bond markets is through providing capacity building to domestic institutional investors and local supervisory bodies of institutional investors. Such targeted support can help local actors implement adequate criteria for engaging in local currency issuances and could, for example, support countries in integrating ESG risks into domestic pension fund regulation. An example for such an integration is Mexico which mandates the integration of ESG and climate risks into pension fund investment analysis since 2022 (Banco de México, 2020[100]).

(***Market***)-Infrastructure Recommendations

To support the market infrastructure needed for GSS bond issuance, key recommendations for donors are:

- **Build-up organizational capacity in key institutions for GSS bond market functioning** – this includes raising awareness within relevant government agencies and regulators of the opportunities that GSS bonds represent as well as targeted support to regulation supporting functioning repo and secondary markets. For example, through peer-exchange platforms for regulators.

- **Support the development of local external reviewers and certify their approaches** – with the aim of building up local market infrastructure with an immediate understanding of local regulation and specificities, which would ultimately also reduce costs for local issuers and increase investor trust. **Scale up support to local currency bond markets** – as they strengthen the stability of local financial systems. Such support could include more blended finance programmes specifically targeting local currency transactions and on the other hand technical assistance to local supervisory bodies of institutional investors in implementing high-quality criteria for investing in local currency issuances.

### 3.5. Impact

Donor engagement in GSS bonds should be driven by a strong development rationale, in line with OECD blended finance Principle 1 (OECD, 2018[56]). For both issuers and investors, the OECD-UNDP Impact Standards for Financing Sustainable Development are also a useful tool in guiding impact management practices to maximise positive contributions towards the SDGs (OECD, UNDP, 2021[101]). Issuing GSS bonds should ultimately translate into positive results for sustainable development. As such, transparency and disclosure are important: they underpin the integrity of the market and create an opportunity for mutual learning from different stakeholders involved with GSS bonds. Demonstrating the social and environmental impact of a project is also crucial as it will ultimately attract more capital to similar projects in support of sustainable development. From an issuer’s point of view, measuring and disclosing information in a targeted and comparable manner gives greater credibility to their transparency and impact commitments, and thus attracts new investors. For investors, having access to high-quality, harmonised and transparent reporting helps compare investment opportunities, reduce costs and report on their own ESG reporting requirements. Indeed, disclosure of relevant information has been identified as one of the reasons driving investor interest for green bonds (Allen, 2019[102]). To foster transparency in the market, GSS bond issuers are currently encouraged – but not obliged – to align with the provisions of the ICMA Principles, and therefore produce an initial bond Framework on the characteristics of the GSS bond (ICMA, 2022[103]).
Aligning with ICMA includes additional types of reporting recommendations: “allocation reporting” on how the proceeds have been allocated, and “impact reporting” on the social and environmental impacts achieved by the allocated projects.

Disclosing information transparently and reporting on impact are important – but are characterised by a lack of harmonisation. The meaning of “impact” – already debated in the sustainable development discourse – is also complex in the context of GSS bonds. It is important to note that in the private sector, the term impact is often used more loosely, corresponding to the OECD definition of development results – defined as the “outputs, outcomes or impacts of development interventions, with each element contributing to the next” (OECD, 2023[104]). To address the complexities of the term, the report uses the OECD/DAC Network on Development Evaluation definition of impact throughout: “the extent to which the intervention has generated or is expected to generate significant positive or negative, intended or unintended, higher-level effects” (OECD, 2019[105]). As will be discussed, granular information on projects being financed is scarce, and any explicitly stated issuer commitments to using proceeds for sustainable activities are low (making it difficult to demonstrate a causal link). Measuring impact is also challenging, and different metrics are used to do so.

**Finding the right balance between interoperability and suitability to local contexts is fundamental when developing Taxonomies and Standards**

Standards, Principles and Taxonomies are essential building blocks for creating harmonised, trusted and accountable GSS bond markets with positive impact (see further definitions and clarifications of terms in Box 3.2). When Frameworks are created by GSS bond issuers, they typically reflect an alignment with voluntary Principles – most commonly the ICMA Principles recognised globally as market best practice. Where regional Standards exist, these will provide further guidance which issuers must follow. Indeed, different regional or thematic GSS bond Standards are being developed, generally using the ICMA Principles as a starting point (ICMA, 2022[106]). Examples of bond Standards include the Climate Bonds Standard, the EU Green Bond Standard, and the ASEAN Green Bond Standard. Standards are often accompanied by Taxonomies that clarify which activities are eligible to be allocated by the issuance. Numerous developing markets or regions are also developing their own Taxonomies, many using the EU Taxonomy as a model (Climate Bonds Initiative, 2022[107]). The Climate Bonds Taxonomy stands out as an exception as it is global in scope and identifies more broadly assets and projects needed to deliver a low carbon economy consistent with the 1.5°C temperature rise limit set by the COP21 Paris Agreement (Climate Bonds Initiative, 2023[108]). In comparatively developed sustainable finance markets – such as the EU – there is a convergence toward a single green bond Standard and Taxonomy (see Box 3.3).

There is therefore a role for development co-operation providers to support the development of Taxonomies and Standards that are aligned with global best practices, interoperable among each other, and suitable to local contexts. GSS bond Standards are currently concentrated on green bonds, so policy support should also go towards developing social bond Standards in order to foster their issuance and create a more level playing field among all types of GSS bonds (OECD, 2023[109]). Given the pronounced progression towards sustainability bonds from issuers in developing countries (see Figure 1.2), it is also important to develop sustainability bond Standards. This will be crucial in countering greenwashing and promoting the transparency, disclosure and integrity of this part of the market.
It is important to have local or regional Standards because they create local ownership and link the specific development needs of individual countries. Local Standards and Frameworks help build credibility among both local and international investors when it comes to GSS bonds specifically. For example, Chile’s significantly grown GSS bond market is partly due to its development of a template green bond Framework and Taxonomy and the clarity these provide (Jain, 2022[22]). At the same time, it is important to ensure that local Standards are built in line with high-level Principles and interoperable among each other. This gives investors a sense of familiarity and thus increases confidence.

What type of approaches can donors use to support the development of local Standards that are both interoperable and adapted to local contexts? Platforms for sharing best practices and examples are an important tool – and various examples are mentioned throughout this sub-section. Technical Assistance
programmes are another important cornerstone of donor support. For example, IFC’s Green Bond Technical Assistance Program supports countries in issuing green bond policy guidelines (Openaid, 2023[111]). The EU’s newly launched Global Green Bond Initiative (GGBI) brings together a consortium of European DFIs to support the development of green bond markets in partner countries through anchor investments accompanied with targeted technical assistance to help issuers develop credible green bond frameworks (European Union, 2023[112]). Aid agencies typically have long-lasting and well-developed presence in country networks and can therefore be particularly well-placed to connect the dots between international Principles, best practices and the necessary local adaptation. Several donors are already actively supporting impact Framework development, for example the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) is delivering technical assistance to different Vietnamese line ministries and the central bank on developing a Taxonomy for green credits and bonds. Aid agencies, MDBs and DFIs, are particularly well-placed to measure the impact of projects and integrate harmonised impact measurement into projects from the onset. However, to date there has been very limited co-ordination on the impact dimension of GSS bond space between donors and the investor community. The ICMA Executive Steering Committee as a forum is an important step toward increased co-ordination – but focuses on all matters related to the ICMA Principles and therefore does not cover donor activity co-ordination and guidance specifically.

A local Taxonomy strengthens the credibility of a GSS bond Standard, but it is not a prerequisite for it to exist. Still, local or regional Taxonomies can be very important because what is considered “green”, “social” or “sustainable” may differ between a developing and developed country context. This is due to many reasons. For example, countries have different development paths, and in order for these to be sustainable they require policies tailored to their specific context. The ability of the public sector to play an active role in creating rigorous Taxonomies or Standards and regulating their implementation will also vary from country to country. As such, locally adapted Taxonomies show which activities are eligible for sustainable finance – here specifically by GSS bonds – based on context-specific considerations for different countries or regions. They also make sure that issuers in developing countries are not overburdened with expectations that do not reflect their realities – as this can become a hurdle to them issuing bonds and accessing finance. Further, the creation of local Taxonomies has shown to make it easier for corporates and financial institutions to issue labelled bonds – even if the sovereign itself has not issued labelled bonds (Jain, 2022[22]).

The creation of local Taxonomies is therefore a welcome development – but it is important for them to be comparable, interoperable and harmonised with regional and global approaches. This creates a familiarity for international investors and consequently facilitates cross-border sustainable investment flows. For example, the Latin America and Caribbean region stands out due to an effort to develop a common regional framework for sustainable finance Taxonomies (UNDP, 2022[113]). Global initiatives also exist: the Sustainable Banking and Finance Network is developing a framework for mapping and benchmarking sustainable finance Taxonomies, and through this determine best practices in emerging market Taxonomy development (Sustainable Banking and Finance Network, 2022[114]). The International Platform on Sustainable Finance (IPSF) promotes the exchange of information between members on sustainable finance regulatory measures, with the aim of sharing best practices and comparing different initiatives. The IPSF has been working on a Common Ground Taxonomy that focuses on the comparability and interoperability of taxonomies (European Commission, 2022[115]). There have also been efforts of the G20 in this area – including a recommendation on improving the comparability and interoperability of sustainable investment alignment approaches such as Taxonomies and Standards from 2022 (G20 Sustainable Finance Working Group, 2022[116]). Donor support is therefore welcome in harmonizing the structure of local Taxonomies, while leaving room for adaptation to suit the local context.
The EU stands out both as the largest regional GSS bond market and in the comprehensiveness of its approach to sustainable finance. The EU has been developing a Taxonomy and a green bond Standard and is also launching the Global Green Bond Initiative (GGBI), which aims to support the development of green bond markets outside of the EU.

The EU Taxonomy is a green classification system which establishes a list of environmentally sustainable economic activities which “make a substantial contribution to at least one of the EU’s climate and environmental objectives, while at the same time not significantly harming any of these objectives and meeting minimum social safeguards” (European Commission, 2021[117]).

The link between the EU Taxonomy and green bonds is established via the EU Green Bond Standard (EUGBS). Compliance with the EUGBS is not mandatory for green bond issuers within or outside the EU, but those choosing to issue under the “EUGBS” label will have to follow its requirements. It builds strongly on the ICMA Principles, with the key distinguishing factor being that assets financed with proceeds from a European green bond must be aligned with the EU Taxonomy. As such, the EUGBS seeks to create an enabling environment with a waterfall effect on issuers and investors more broadly:

- The EUGBS disclosure requirements are made available to all issuers in template formats – encouraging issuers whose bond cannot qualify for the EUGBS labelling to subject themselves to ambitious transparency requirements and consequently gain greater investor trust (European Parliament, 2023[92]).
- As compliance with the EUGBS becomes increasingly common in the EU, it is likely that investors will demand similar standards for bond issuances outside of the EU too. As such, and as the most advanced and widely adopted of their kind, the EU Taxonomy and EUGBS also serve as a basis for the development of Taxonomies and Standards in other countries or regions. This encourages them to be interoperable and leaves room for local adaptation.
- The impact of the EUGBS goes beyond green bonds, too. If EUGBS issuers reliably and verifiably demonstrate which of their activities are green, there will be greater pressure to report on green aspects for the rest of their activities as well (Environmental Finance, 2022[118]).

It is possible that the sophistication of the EUGBS label may be dissuasive to potential issuers in developing countries – even despite explicit efforts to avoid this. As investors begin demanding alignment with the EUBGS, the ambition of the disclosure requirements or the need to demonstrate alignment with the EU Taxonomy may not reflect the realities in developing countries. Indeed, further voluntary update of the EUGBS has been closely linked to the resolution of usability issues in the EU Taxonomy (ICMA, 2023[119]).

Finally, the EU’s efforts to support green bonds outside of its borders are concretised in the EU Global Green Bond Initiative: a proposal to bring together Team Europe members and a consortium of European DFIs to support the development of green bond markets in partner countries. With such a co-ordinated approach, the GBBI seeks to address the challenge on both issuer and investor side via two pillars:

i. Building local issuers’ capacity and know how through technical assistance

ii. Crowding-in private investors by providing confidence and de-risking mechanisms through a Green Bond investment vehicle (European Union, 2023[112]).
Commitments and enforceability regarding use-of-proceeds are fundamental in increasing the credibility of GSS bonds

To be credible, labelled bonds should include (i) an identification of the projects the proceeds will be used for (which need to have positive environmental, social or sustainable impact) (ii) an expressed commitment to use proceeds for the identified projects and (iii) a mechanism to enforce this commitment. In practice, however, one or all of these elements are often lacking – and are, therefore, something that donors should actively encourage and demand. Regarding use-of-proceeds commitments, a recent study looking at over 1,000 green bonds found that only 63.10% of the documents underlying the issuance include “promissory language indicating that the issuer will use proceeds on ESG-related projects and activities” (Curtis, Mark and Gulati, 2023[120]). For sovereign bonds, the number drops further to 40%. Controversial industries – such as coal plants in China12 (Stanway, 2019[121]) or the Hong Kong airport (Ng, 2022[122]) – have also been criticised for issuing green bonds for projects without sufficient underlying green rationale.

Relatedly, an unresolved issue for GSS bonds is determining what the consequences should be if the proceeds have shown to not been employed for their designated uses. To date, not only is regulation on the enforcement of GSS bonds lacking, but the bond Frameworks themselves also do not include any explicit legal mechanisms to enforce appropriate use-of-proceeds. Regarding the regulatory element, the EU GBS is a fitting example: all proceeds of an EU GBS need to be invested in activities aligned with the EU taxonomy (with a small initial flexibility pocket) (European Parliament, 2023[83]), yet the consequences of non-compliance are not clear. Looking at a select sample of 150 sovereign, quasi-sovereign and supranational green bond Frameworks, Zettelmeyer at al. found that most ‘use of proceeds’ sections were too broad and vague to be legally enforceable (2022[20]). These elements raise concerns about GSS bonds being used for greenwashing, social-washing and sustainability-washing (Fatica and Panzica, 2021[49]; Reclaim Finance, n.d.[123]). To encourage stronger commitments for use-of-proceeds as well as clearer language on enforceability regarding use-of-proceeds, donors should therefore pair their support with demands that these be included in GSS bond Frameworks.

Harmonisation in impact measurement and reporting continues to be challenging

Despite the importance of impact measurement and impact reporting, there is limited consistency in how it is done, and quality varies widely. A 2021 study by Environmental Finance found that 75% of green bond issuers view current impact reporting practices as “inadequate” (Environmental Finance, 2021[124]). The challenge regarding impact measurement and reporting is dual. First, it is necessary to find the right balance between the need to be rigorous and realistic in terms of what can be measured and reported. Significant resources, both human and financial, are needed to measure and report on impact – and many issuers, especially in developing countries, do not have access to these. The second challenge is then to ensure that impact measurement and reporting practices for GSS bonds are harmonised.
To address these challenges, a first area of focus should be identifying and agreeing on common metrics and KPIs used to measure and report on social and environmental impact. The impacts of green bond issuances tend to be more measurable than social or sustainability bonds, yet even here metrics, methodologies, and formats used by issuers vary considerably (Environmental Finance, 2021[124]). Data reported on IDB’s Green Bond Transparency Platform (GBTP) for green and sustainability bond issuers in Latin America and the Caribbean, shows 160 different key performance indicators were reported (Green Bond Transparency Platform, 2023[110]). Social outcomes are even more difficult to measure and track, and no social taxonomy currently exists. This lack of common metrics makes comparability between projects and bonds very challenging. It is important for donors – and governments more widely – to come together to agree on what they expect of reporting and encourage the use of common metrics and KPIs that reflect what investors want and understand, but also what issuers are realistically able to measure. Given the large number of possible different indicators, it is suggested to focus on a limited number of key indicators that demonstrate substantial contribution to environmental or social objectives, where possible. The ICMA Principles are a good starting point for this, as they identify broad categories of eligible projects and suggested metrics for these. Similarly, Taxonomies – as they become increasingly interoperable and comparable – can help identify sustainable activities.

Another effort towards KPI and methodology harmonisation comes from platforms such as the GBTP and the Nasdaq Sustainable Bond Network (NSBN). The GBTP is a space for voluntary collection of impact reports and provides issuers and investors guidance on what to report on and how to do so. The platform publishes detailed reports on monetary disbursements and KPIs per project, as well as methodologies on how these are calculated. The GBTP allows certified external reviewers to upload their conclusions (in the ICMA external review form, for easier comparability) – thus allowing investors to compare the conclusions of different reviewers. By making these different methodologies and KPIs publicly available, the platform seeks to encourage harmonisation (Vasa, Vartanyan and Netto, 2022[125]). While legally the GBTP cannot give advice to issuers on what to report on, IDB is part of a working group on KPIs and methodologies within ICMA, which uses the GBTP as a data benchmark on current practices to help further develop guidance on KPIs and methodology to increase the comparability of reports. Donors could consider supporting an extension of the coverage of the GBTP platform to a global level as many investors invest globally and having a common platform would drive reporting harmonisation and increase investor confidence.

Data quality should be an additional area of focus: currently, even when data is available and reported, its quality varies significantly. Over 50% of green bond funds say poor data and impact reporting deter them from making further investments (Environmental Finance, 2021[124]). The ICMA Principles suggest consistency in methods of calculation, the provision of additional technical reports and/or data verification protocols, and independent assessment from recognised experts (where possible) (ICMA, 2022[125]). Donors should encourage these best practices to be followed and adapted to local contexts if necessary. With greater experience in collecting and analysing data, donors can provide capacity building in these areas, and as such harmonise the way data is collected and published. The development and endorsement of qualified, local external reviewers – as recommended in the previous section on market infrastructure – is also important in ensuring that high-quality data is used in producing rigorous impact reports.
Figure 3.2. Alignment to reporting Standards or Principles

Breakdown showing whether green, social and sustainability bond issuers align to a Standard or Principle, and what specific Standard or Principle those declaring align to.

Note: The data is directly extracted from issuer frameworks, reports and external reviews. Issuers can declare alignment to multiple Standards or Principles.
Source: Authors’ calculations based on Luxembourg Green Exchange (2023), Luxembourg Green Exchange, https://lgxhub-premium.bourse.lu/

An additional challenge comes from the fact that the numerous Standards and Principles have different expectations regarding the content and format of issuers’ impact and allocation reporting. As seen in Figure 3.2, a majority of issuers (94.6%) declare alignment to a specific Standard or Principle – with the most common being the ICMA Principles (60.2%) and the EU Taxonomy (13.4%). The fact that the EU Taxonomy – which does not set guidelines on reporting for GSS bonds specifically – and the Loan Market Association principles – which relate to loans rather than bonds – are commonly cited points to the confusion that exists in the market. The relatively widespread alignment with the ICMA Principles is an important starting point, although differences also exist between types of issuers. An IMF study, for example, found the adherence of emerging market sustainable debt issuance adhering to the ICMA Principles at less than half of the total issuances – although this is improving (Goel, Gautam and Natalucci, 2022).

In principle, the existence of different Standards and Principles is important, but a certain harmonisation regarding their expectations on reporting would enhance comparability of reports. In supporting in the development of Standards and Principles that are adapted to local contexts, this is something that donors should encourage. For example, key recommendations of the ICMA Principles are that a Framework document be shared ahead of the bond issuance and that issuers report annually until full allocation of the bond, and as necessary subsequently should there be any material developments (ICMA, 2022). The EUGBS has different, more prescriptive requirements: it demands a pre-issuance Framework, yearly allocation reports, a post-issuance review once all proceeds have been allocated, and at least one report on the overall impact of the bond (European Commission, 2021). Different approaches like these may allow bond issuers to pick the Principle or Standard most suitable for them – which becomes an issue in developing country contexts where investors are especially interested in reliable and transparent standards in place. Issuer impact reporting is currently not necessarily aligned with financial reporting timeframes, adding a further complicating element for both issuers producing the reports and investors consulting them (Calvi, 2023).
**Impact Recommendations**

To effectively support the impact dimension of the GSS bond markets, donors should:

- **Support the development of Taxonomies, Standards and Frameworks that are both adapted to local contexts as well as interoperable and comparable** – meaning that they reflect local development needs while also aligning with global best practice (such as the ICMA Principles as an important first starting point and the EU Taxonomy). Existing international fora working on the comparability and interoperability of sustainable investment alignment approaches – such as the G20 Sustainable Finance Working Group – should be leveraged as platforms for liaison.

- **Co-ordinate on the KPIs used to measure and demonstrate impact** – especially in an increasingly thematic-heavy market. Donors can provide capacity building in the collection and analysis of high-quality data to encourage harmonisation and encourage focusing on a limited set of common KPIs. Social impact metrics have been identified as a significant policy gap area – so co-ordinated efforts are particularly needed in this area. A global sharing platform – such as the IDB GBTP scaled globally and extended to social and sustainability bonds – would be a welcome initiative to drive such co-ordination and harmonisation.

- **Pair donor support with expectations on commitments regarding use-of-proceeds and alignment with Standards and Taxonomies** – to drive stronger commitments and greater quality reporting and frequency. For example, donors can require alignment with specified Standards as a pre-requisite for inclusion into own funding or risk sharing programmes.
4 Recommendations for donors to support green, social and sustainability bond issuances in developing countries more effectively

Targeted efforts of the donor community could help make significant strides in achieving a more widespread usage of GSS bonds to finance sustainable projects in ODA-eligible countries. The GSS bond market represents a significant pool of financial resources. If the donor community were to act in a well-concerted manner, more developing country issuers would be able to tap into the market for much needed funding for development priorities. A joined-up donor effort could be an important opportunity to bridge the financing gap needed to meet the SDGs. GSS bonds, however, are not silver bullets and will not work in all markets and contexts, depending very much on existing market infrastructure, regulatory frameworks, and market liquidity amongst other factors. They should, therefore, be considered as part of a toolbox rather than a one-size-fits-all or one-shot solution. Moreover, where blended finance instruments such as anchor investments or guarantees are used, the transaction should make use of the most suitable financing in terms of additionality, mobilisation effects and local capital debt market development. Supporting issuances in local currency can be particularly beneficial in building up resilient capital debt markets.

The report presents more detailed recommendations for each individual policy area (“the five Is”) as summarised in Table 4.1.
### Table 4.1. Recommendations for individual policy areas

The following recommendations are made for each of the “five Is”, as elaborated in section 3.

<table>
<thead>
<tr>
<th>Policy Areas</th>
<th>Recommendations</th>
<th>Primary donor institutions involved</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Investment</strong></td>
<td><strong>1.1 Scale-up investment, where most effective</strong> – identify effective financial structures that strategically use development finance to unlock private bondholders, foster their replicability and then aim for scale. Finalise the OECD DAC PSI review to clarify rules on ODA-eligibility of donor investment in GSS bonds.</td>
<td>DFIs, MDBs, DAC members</td>
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<tr>
<td><strong>1.2 Understand the local GSS bond market</strong> – develop a thorough understanding of the maturity of the respective market to operate effectively in line with the OECD DAC Blended Finance Principles, focusing on additionality in crowding in investment. When stepping in as an anchor investor for GSS bond issuances, donors should be clear that this is the most effective use of development finance, also with a view on the effect of developing the local GSS bond market and mobilising private investors.</td>
<td>DAC members, MDBs, DFIs</td>
<td></td>
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<tr>
<td><strong>1.3 Consult with the private sector early on when designing investment programmes</strong> – work early on with issuers and possible investors to encourage participation. This should be done through understanding the risk-return preferences of each side to effectively calibrate volumes, terms, and risk parameters of donor interventions in e.g., structured issuances or vehicles.</td>
<td>DFIs, MDBs</td>
<td></td>
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<tr>
<td><strong>Insurance</strong></td>
<td><strong>2.1 Scale-up guarantees, where they have catalytic effects</strong> – increase general uptake of guarantees for GSS bonds by donor institutions, as they have shown to be effective tools to mobilise private finance. However, ensure that guarantees offer the most effective use of development finance compared to other instruments.</td>
<td>DFIs, MDBs, aid agencies, specialised guarantee providers with a development mandate</td>
</tr>
<tr>
<td><strong>2.2 Increase institutional capacity of donor institutions to provide guarantees</strong> – donor institutions with limited familiarity with guarantees should develop institutional technical capacity to build up programmes most suited to their development finance system. More joint guarantees between different development institutions should be the ambition, to leverage synergies and reach scale. To do so, increased harmonisation of processes and requirements across guarantee programmes would be beneficial.</td>
<td>DFIs, aid agencies</td>
<td></td>
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<td><strong>2.3 Encourage uptake of MBD and DFI guarantees by examining their internal policies</strong> – analyse whether guarantees as an instrument are appropriately incentivised compared to traditional lending instruments, within MDBs’ and DFIs’ organizational structure and balance sheet treatment.</td>
<td>DAC members as shareholders/owners of MDBs and DFIs</td>
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<tr>
<td><strong>Issuance</strong></td>
<td><strong>3.1 Support building-up of solid project pipelines</strong> – development co-operation providers should scale-up support to the very early and more risky project preparation stages in order to build up much needed project pipelines, for example in the form of early-stage equity investments.</td>
<td>DFIs, aid agencies, MDBs</td>
</tr>
<tr>
<td><strong>3.2 Encourage project aggregation in country contexts or sectors with small scale projects</strong> by supporting regional issuances from existing regional institutions such as regional development banks through effectively capitalising and encouraging GSS issuances by NDBs in their role as shareholders.</td>
<td>Regional/national development banks, DAC members as shareholders</td>
<td></td>
</tr>
<tr>
<td><strong>3.3 Pursue holistic support programmes with a view towards repeat issuances</strong> – covering pre-investment, during investment and post-issuance support. Such support should include necessary knowledge and capacity to set up internal co-ordination mechanisms, weigh different financing options, develop the necessary impact criteria and KPIs, and maintain them over the lifecycle of the bond.</td>
<td>Aid agencies, DFIs, MDBs</td>
<td></td>
</tr>
<tr>
<td><strong>(Market-) Infrastructure</strong></td>
<td><strong>4.1 Build-up organisational capacity in key institutions for GSS bond market functioning</strong> – this includes raising awareness within relevant government agencies and regulators of the opportunities that GSS bonds represent as well as targeted support to regulation supporting functioning repo and secondary markets. For example, through peer-exchange platforms for regulators.</td>
<td>Aid agencies, DFIs, MDBs</td>
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Different types of donor institutions might have comparative advantages and/or most fitting mandates to implement the policy recommendations, as indicated by the column “Primary Donor Institution involved”. For example, recommendation 5.2 “co-ordinating on which KPIs to use to measure and demonstrate impact” would primarily be a task for OECD DAC member governments on a political level. Importantly, designating these primary or key development institutions does not imply that other types of donor institutions are not also fulfilling vital supportive functions. For the successful implementation of
recommendation 5.2 for example, DFIs and aid agencies can perform auxiliary functions in advising on which subset of KPIs have proven to be essential.

Additionally, the report highlights three overarching recommendations for OECD DAC members which, if implemented, would help co-ordinate efforts donor institutions are currently undertaking in a more coherent and ultimately more catalytic way:

1. **Co-ordinate on supporting large-scale blended finance instruments for GSS bonds** through approaches such as investing in first loss mitigation in the form of funded junior, mezzanine tranches in large, fixed-income funds or through joint guarantee programmes. Such joint funds or programmes can leverage significant synergies and reduce transaction costs.

2. **Promote the comparability and interoperability of Taxonomies and Standards and encourage harmonisation of high-quality impact measurement and reporting on GSS bonds.** Support consolidation of impact measurement and reporting by developing consensus on what is best practice, while leaving room for local considerations where necessary.

3. **Develop a strategic co-ordination mechanism for GSS bonds** to facilitate co-ordination on impact and on blended finance instruments that aim for scale. A GSS Bond task force could convene donors, developing country stakeholders as well as private bond investors to strategically co-ordinate activities and initiatives. Key areas where co-ordination is currently needed include impact measurement and reporting, technical assistance approaches, anchor investments and guarantees. The platform could ensure knowledge sharing and dissemination of best practices and identify regions where there is a particular need for joint approaches. The OECD Community of Practice on Private Finance for Sustainable Development could serve as a forum for such discussions.
References


Banco de México (2020), Climate and Environmental Risks and Opportunities in Mexico’s Financial System from Diagnosis to Action, https://www.banxico.org.mx/sistema-financiero/d%7B3A8C7F15-9FE1-9A2A-DCF7-6C6D11A0E1DB%7D.pdf.


BIS (2023), Overcoming original sin: insights from a new data set.
https://doi.org/10.2139/ssrn.3389762.

Bündnis Entwicklung Hilft; Ruhr University Bochum (2022), World Risks Index, [34]

Calvi, B. (2023), Key Fixed Income ESG Considerations for 2023, [129]

Carbon Tracker (2021), Renewables could power world by 2050 as prices collapse, replacing all fossil, [35]

CBI (2023), Green bond pricing in the primary market: July-December 2022, [5]
https://www.climatebonds.net/files/reports/cbi_pricing_h2_2022_01c.pdf.

CBI (2022), Sustainable Debt Global State of the Market, [41]

No. WP/22/162, International Monetary Fund, https://doi.org/10.5089/9798400215872.001.

Cheng, G., T. Ehlers and F. Packer (2022), Sovereigns and sustainable bonds: challenges and, [26]
https://www.bis.org/publ/qtrpdf/r_qt2209d.pdf.

Climate Bonds Initiative (2023), Standard: Climate Bonds Taxonomy, [108]

Climate Bonds Initiative (2022), Global green taxonomy development, alignment, and implementation, [107]

Climate Bonds Initiative (2022), Taxonomy Roadmap for Chile, [62]

Climate Bonds Initiative (2021), Green Bond Pricing in the Primary Market: July - December 2021, [18]
https://www.climatebonds.net/files/reports/cbi_pricing_h2_2021_02q.pdf.

Climate Bonds Initiative for the Global Center on Adaptation, EBRD (2021), Green Bonds for Climate Resilience, [83]


Credit Suisse (2021), Press Release: Credit Suisse finances The Nature Conservancy’s Blue Bond for marine conservation for Belize, [53]

Dembele, F., R. Schwarz and P. Horrocks (2021), Scaling up Green, Social, Sustainability and Sustainability-linked Bond Issuances in Developing Countries, OECD Publishing, Paris.


[49] [2] [116] [71] [50] [29] [110] [127] [74] [77] [8] [119]


Mortaza, M. and W. Bin Shadat (2016), Cost-Benefit Analysis of Establishing a Secondary Bond Market in Bangladesh, Bangladesh Priorities, Copenhagen Consensus Center, 2016. License: Creative Commons Attribution CC BY 4.0. [95]


OECD (2023), Draft report on green, social and sustainability bonds issued by multilateral development banks and its use for infrastructure financing. [109]


OECD (2021), Scaling up Green, Social, Sustainability and Sustainability-linked Bond Issuances in Developing Countries, https://www.oecd.org/officialdocuments/publicdisplaydocumentpdf/?cote=DCD(2021)20&docLanguage=En.


UNDP (2023), *Lowering the Cost of Borrowing in Africa*,
[38]

UNDP (2022), *Building a Common framework of sustainable finance taxonomies in Latin America and the Caribbean*,
[113]

Vasa, A., M. Vartanyan and M. Netto (2022), *A novel database for green bonds to support investment analysis and decision making, research, and regulatory decisions: The Green Bond Transparency Platform*,
[125]

https://www.ft.com/content/fa3fddbf-72a7-475d-81f3-22bb68caae6.
[79]

[73]

World Bank (2022), *Colombia: Leading the Path to Sustainability in Latin America*,
[61]

[89]

World Bank Group (2022), *Sovereign Green, Social and Sustainability Bonds: Unlocking the Potential for Emerging Markets and Developing Economies*,
[27]

[20]
Annex A. Overview of donor initiatives with specific green, social and sustainability bond focus

Table A.1. Overview of donor initiatives with a specific green, social and sustainability bond focus

<table>
<thead>
<tr>
<th>Name</th>
<th>Type of Initiative</th>
<th>Activities</th>
<th>Target Issuer Group</th>
<th>Regional Focus</th>
<th>Thematic Focus</th>
<th>Relevant Policy Area</th>
<th>Impact</th>
</tr>
</thead>
<tbody>
<tr>
<td>ADB Blue Bond Incubator</td>
<td>MDB</td>
<td>Technical Assistance to issuer</td>
<td>Corporates and public sector</td>
<td>Asia</td>
<td>Blue</td>
<td>Investment</td>
<td>x</td>
</tr>
<tr>
<td>African Local Currency Bonds Fund</td>
<td>Multilateral</td>
<td>Anchor investor and TA facility for issuers</td>
<td>Financials and corporates</td>
<td>Africa</td>
<td>Local Currency</td>
<td>Insurance</td>
<td>x</td>
</tr>
<tr>
<td>ASEAN Catalytic Green Finance Facility</td>
<td>Regional</td>
<td>Project Preparation, de-risking, Investor Roundtables,</td>
<td>Sovereigns</td>
<td>ASEAN</td>
<td>Green</td>
<td>Issuance</td>
<td>x</td>
</tr>
<tr>
<td>Build-Back-Better Emerging Markets Sustainable Transaction (&quot;BEST&quot;)</td>
<td>MDB/Private Sector</td>
<td>Anchor investments in developing countries, accompanied by technical assistance facility</td>
<td>Financials and corporates</td>
<td>Global</td>
<td>Social and sustainability</td>
<td>(Market)-Infrastructure</td>
<td>x</td>
</tr>
<tr>
<td>Climate bonds Initiative</td>
<td>Multi stakeholder Partnership</td>
<td>Climate Bonds Standard, Certification Scheme, Market Intelligence</td>
<td>Public and Private Sector</td>
<td>Global</td>
<td>Climate Change</td>
<td>Impact</td>
<td>x</td>
</tr>
<tr>
<td>DFC Political Risk Insurance</td>
<td>Bilateral Programme</td>
<td>Risk insurance of GSS bonds, for example Blue Bond in Belize</td>
<td>Public and Private</td>
<td>Global</td>
<td></td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>EU Global Green Bond Initiative</td>
<td>Multilateral</td>
<td>Investment in Green Bonds, Technical Assistance to Issuers</td>
<td>Global</td>
<td>Green</td>
<td></td>
<td>x x x x x</td>
<td></td>
</tr>
<tr>
<td>Green Guarantee Company</td>
<td>Private sector, (partially) funded by donors</td>
<td>Credit enhancements to Green Bonds</td>
<td>Public and Private</td>
<td>Global</td>
<td>Green</td>
<td>x</td>
<td></td>
</tr>
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<td>----------------------------------------</td>
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</tr>
<tr>
<td>GuarantCo Development Company</td>
<td>Guarantees in local currency</td>
<td>Financial Institutions and corporates</td>
<td>Africa</td>
<td>Local currency</td>
<td>x</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IDB Green bonds Transparency Platform</td>
<td>MDB</td>
<td>Database on investment and development impact performance</td>
<td>Public and Private Sector</td>
<td>Latin America</td>
<td>Green</td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>IDB Technical Assistance Programme</td>
<td>MDB</td>
<td>Technical Assistance to Issuers</td>
<td>Sovereigns</td>
<td>Latin America</td>
<td>Green, Sustainable</td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>IFC Amundi Planet Emerging Green One (EGO) Fund</td>
<td>Fund</td>
<td>Anchor investments in developing countries</td>
<td>Financial institutions</td>
<td>Global</td>
<td>Green</td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>IFC Green Bonds Technical Assistance Program (GB-TA)</td>
<td>MDB with bilateral support</td>
<td>Technical Assistance to first time issuers</td>
<td>Financial institutions</td>
<td>Global</td>
<td>Green and Social</td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>Infracredit Development Company</td>
<td>Local currency guarantees</td>
<td></td>
<td>Nigeria</td>
<td>Green</td>
<td>x</td>
<td></td>
<td></td>
</tr>
<tr>
<td>LAGreen Fund</td>
<td>Green bond fund, technical assistance to issuers</td>
<td>Non-sovereigns</td>
<td>Latin America</td>
<td>Green, Social, Sustainability</td>
<td>x</td>
<td>x</td>
<td>x</td>
</tr>
<tr>
<td>SBC Real Economy Green Investment Opportunities (REGIO) Fund</td>
<td>Fund</td>
<td>Anchor investments in developing countries</td>
<td>Corporates</td>
<td>Global</td>
<td>Green</td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>SIDA Guarantee Program Bilateral Programme</td>
<td>Guarantees</td>
<td>Non-sovereigns</td>
<td>Global</td>
<td></td>
<td></td>
<td>x</td>
<td></td>
</tr>
</tbody>
</table>

Note: The list is non-exhaustive.
Notes

1 Based on the average EUR-USD exchange rate for 2022.

2 The country of the issuing entities is determined based on where the issuing entity is domiciled. Offshore issuances are not captured, e.g., proceeds of the bonds might finance assets in other countries or regions.

3 This split changes towards 62% green bonds when issuances from Chinese entities are included.

4 The cities of Johannesburg and Cape Town both issued green bonds in 2014 and 2017 respectively.

5 Defined here as countries eligible for the IMF Poverty Reduction and Growth Trust.

6 Classified as having high risk of or being in debt distress by the IMF and World Bank Debt Sustainability Assessments (DSA) for Low-Income Countries or classified as unsustainable in the DSA for Market-Access Countries. Countries are Kenya, Marshall Islands, and Togo under LIC DSA and El Salvador under MAC DSA.

7 There have been cases where the end beneficiary was a sovereign, but with the involvement of third-party private sector enterprises.

8 Here included World Bank Group, IaDB, AfDB, ADB, EBRD, EIB.

9 According to ICMA (2022[91]), a second party opinion assesses the alignment of an issuer’s issuance Framework with the relevant Principles (see Box 3.2 for definitions of these terms). For GSS bonds, verification typically focuses on alignment with Standards and claims made by the issuer and may include an evaluation of social or environmental features of the asset. Finally, a bond rating assesses the bond against a defined benchmark – and although it is separate to a credit rating, it is typically carried out by rating agencies such as Moody’s or S&P.

10 The “ICMA Principles” is generally used to refer to the “Green Bond Principles, the Social Bond Principles, the Sustainability Bond Guidelines and any subsequent Principles or Guidelines to be published” (ICMA, 2020[132]).

11 The founding principles of this work were established by the EIB in co-operation with the China Green Finance Committee in 2017 via their joint white paper on the need for a common language in green finance (European Investment Bank, Green Finance Committee of China Society for Finance and Banking, 2017[131]).

12 Clean coal projects were removed from the updated China Green Bond Endorsed Projects Catalogue (2021 Edition).