

Second-Party Opinion

Shanghai Pudong Development Bank

Green Bond Framework



Evaluation Summary

Sustainalytics is of the opinion that Shanghai Pudong Development Bank (SPDB)'s Green Bond Framework is credible and impactful and aligns with the four core components of the Green Bond Principles 2018. This assessment is based on the following:



USE OF PROCEEDS The eligible categories for the use of proceeds – (i) Energy Conservation and Energy Efficiency, (ii) Renewable Energy, (iii) Clean Transportation, (iv) Sustainable Water and Wastewater Management, (v) Green Buildings, and (vi) Ecological Protection – are aligned with those recognized by the Green Bond Principles. Sustainalytics considers that the eligible projects will support efforts to decrease China's environmental footprint and advance UN Sustainable Development Goals (SDGs), especially SDG 6,7,9 and 11.



PROJECT EVALUATION / SELECTION SPDB's eligible projects will be evaluated and selected by the frontline credit department and the green financial products managers at all the branches of the bank. Final approval of shortlisted projects is conducted by the Investment Banking division of head office. SPDB will monitor the environmental benefits of the projects and check whether the project developments remain in line with the Framework on an ongoing basis. SPDB's project evaluation and selection process is in line with market practice.



MANAGEMENT OF PROCEEDS Proceed of the green bond will be recorded by the Bank's Investment Banking Division of the head office using an independent register (the "Register") and tracked through a formal internal process based on the eligibility criteria. Pending full allocation funds will be invested in money market instruments with good credit ratings and market liquidity. Sustainalytics views this process as in line with market practice.



REPORTING SPDB will provide an annual allocation report on the company's website as a separate report, including the total amount of proceeds allocated to eligible green assets and the amount of unallocated proceeds. Where feasible, SPDB commits to provide project examples. The impact reporting will include relevant environmental performance indicators. This process is in line with current market practice.

Evaluation date	27 September, 2019
Issuer Location	Shanghai, China

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Introduction

Shanghai Pudong Development Bank Co Ltd, (“SPDB”, “the Bank”, or “the Company”) is a joint-stock commercial bank which provides various financial services, such as corporate and personal banking, in China and overseas. SPDB was established in 1993 and is headquartered in Shanghai, China.

SPDB has developed the SPDB Green Bond Framework (the “Framework”) under which it intends to issue green bonds and use the proceeds to finance and refinance, in whole or in part, existing and future projects that will promote energy conservation and emission reduction in China while supporting the Bank’s strategy. The Framework defines eligibility criteria in six green areas:

1. Energy Conservation and Energy Efficiency
2. Renewable Energy
3. Clean Transportation
4. Sustainable Water and Wastewater Management
5. Green Buildings
6. Ecological Protection

SPDB engaged Sustainalytics to review the SPDB Green Bond Framework, dated September 2019, and provide a second-party opinion on the Framework’s environmental credentials and its alignment with Green Bond Principles 2018 (GBP).¹ This Framework has been published in a separate document.²

As part of this engagement, Sustainalytics exchanged information with various members of SPDB’s management team to understand the sustainability impact of their business processes and planned use of proceeds, as well as management of proceeds and reporting aspects of SPDB’s green bond. Sustainalytics also reviewed relevant public documents and non-public information.

This document contains Sustainalytics’ opinion of the SPDB Green Bond Framework and should be read in conjunction with that Framework.

¹ Green Bond Principles is administered by International Capital Market Association (ICMA) and is available at <https://www.icmagroup.org/green-social-and-sustainability-bonds/green-bond-principles-gbp/>

² SPDB’s Green Bond Framework is available on SPDB’s website at: <https://news.spdb.com.cn>

Sustainalytics' Opinion

Section 1: Sustainalytics' Opinion on SPDB Green Bond Framework

Summary

Sustainalytics is of the opinion that the SPDB Green Bond Framework is credible and impactful, and aligns with the four core components of Green Bond Principles 2018. Sustainalytics highlights the following elements of the SPDB Green Bond Framework:

- Use of Proceeds:
 - The use of proceeds categories of SPDB Green Bond Framework – (i) Energy Conservation and Energy Efficiency, (ii) Renewable Energy, (iii) Clean Transportation, (iv) Sustainable Water and Wastewater Management, (v) Green Buildings, and (vi) Ecological Protection – are recognized by Green Bond Principles 2018 as project categories having positive environmental benefits. SPDB's investments will promote energy conservation and emission reduction, hence supporting broader efforts to decrease the environmental footprint of China.
 - SPDB's Green Buildings eligibility criterion includes third-party certifications and labels, namely Chinese Green Building Evaluation Label 3 Star and LEED Gold or above. Sustainalytics has conducted an assessment on the standards and considers them to be robust and credible (see Appendix 1 for additional details on the certification schemes).
 - SPDB confirmed to Sustainalytics that it follows a maximum 3-year look-back period for the invested projects. The Bank also intends to disclose the portion of financing versus refinancing should the data be available.
 - Sustainalytics highlights that financing of fully electrified transportation with no direct carbon emissions such as electrified railway traffic, urban rail transit, public electric buses and electric taxis is considered to be in line with a low carbon trajectory.
 - SPDB intends to finance projects for industrial and building energy efficiency, mainly focusing on district heating and cooling, smart grid, and energy management centers. SPDB confirmed that the projects will provide 30% energy savings subject to availability of data. Sustainalytics welcomes SPDB's threshold on energy improvement, as well as the exclusion of efficiency upgrade projects that entail activities, assets and technologies related to fossil fuels, and encourages the Bank to disclose in its annual allocation report the details of the energy efficiency infrastructure projects and impact achieved through the financed projects.
 - SPDB intends to finance ecological protection and restoration projects including the construction of green landscapes, ecological green spaces, and the ecological function area of riverside. Sustainalytics acknowledges that ecological protection projects can provide environmental impact through the promotion of biodiversity and protection of natural habitats and encourages SPDB to report on the details of the ecological protection projects and impact achieved through the financed projects.
 - SPDB confirmed that all intended investments in renewable energy generation facilities will be exclusively for solar photovoltaic, solar heat utilization, wind, and small-scale³ hydro energy.
 - As part of the Sustainable Water and Wastewater Management use of proceeds, SPDB confirmed that flood control projects will only include projects related to river training and wastewater treatment.
- Project Evaluation and Selection:
 - SPDB practices a three-step project selection and evaluation process, which is in line with current market practices. SPDB confirmed that its project identification and evaluation process will be executed by the green financial product managers of all bank branches. Upon the approval of projects by the Investment Banking Division at SPDB's head office, selected projects will be monitored on a regular basis to ensure alignment with SPDB's Green Bond Framework.
- Management of Proceeds:
 - Green bond proceeds will be recorded through an independent register (the "Register") and tracked by the Bank's Investment Banking Division using the Bank's internal processes. Pending

³ Installed capacity with less than 20MW

full allocation funds will be invested in money market instruments with good credit ratings and market liquidity. This process is in line with current market practices.

- Reporting:
 - SPDB commits to provide annual allocation and impact reporting, which will be made available to investors on the Bank’s website as separate reports. The allocation report will include the total amount of proceeds allocated to Eligible Green Assets and the amount of unallocated proceeds. In addition, where feasible, project examples will be included in the report.
 - With regards to impact reporting, SPDB will disclose data on environmental impact indicators such as CO₂, or other greenhouse gas (GHG) avoided (tons), annual energy savings, installed capacity of renewable energy (MWh), and length of tracks built or maintained in the case of infrastructure.
 - Sustainalytics views SPDB’s reporting process to be in line with market practices.

Alignment with Green Bond Principles 2018

Sustainalytics has determined that the Framework aligns with the four core components of Green Bond Principles 2018. For detailed information please refer to Appendix 2: Green Bond/Green Bond Programme External Review Form.

Section 2: Sustainability Strategy of the Issuer

Contribution of framework to SPDB’s sustainability strategy

As a Chinese bank that has been enhancing its credit management granting to the low carbon and circular economy since 2008, SPDB has committed itself to promoting resource efficiency, renewable energy, reducing GHG emissions and facilitating ecological protection while advancing the Bank’s sustainability strategy through the following efforts:⁴

- As one of the first green bond issuers in China, SPDB commits to the development of green finance through enhancing its green credit portfolio. In 2018, SPDB disclosed its green credit balance as RMB 217 billion. Moreover, as part of its lending process, SPDB prioritizes enterprises which promote energy conservation and emission reduction activities.
- In 2018, SPDB adopted dedicated environmental policies for company-wide energy conservation and emission reduction. One of the main buildings of the Bank in Shanghai reduced 409.3 GWh of its use of electricity in 2018.
- As part of the Bank’s GHG reduction strategy, SPDB also supports low carbon transportation by providing financial services to the municipalities in Suzhou, Guanzhou, and Sanya for the purchase of electric buses.
- SPDB’s support for renewable energy development is demonstrated in its collaboration with Southern Power Grid Integrated Energy Co. Guanxi Branch for the development of renewable energy generation from tree barks and sugarcane waste.

Considering the above, Sustainalytics is of the opinion that SPDB’s green bond framework is aligned with the Bank’s strategies and will contribute to further advance SPDB’s commitment to sustainability.

Well positioned to address common environmental and social risks associated with the projects

While the eligible categories are recognized as impactful by the GBP, Sustainalytics also recognizes that the eligible categories might have potential environmental and social risks, such as workers’ health and safety, environmental impacts related to renewable energy infrastructure, air, water, and soil pollution from construction activities, biodiversity loss from land use change as well as risk related to community relations. Sustainalytics highlights the following measures that SPDB has taken to mitigate related risks:

- As a company-wide policy, SPDB enforces environmental and social risk management through its operational procedures from the initial review of client projects, approval process, to the review upon issuing the loans. Moreover, in 2018, the Bank conducted environmental and social assessments on its project financing portfolio and banned lending to projects that entail environmental risks.

⁴ SPD Bank Corporate Social Responsibility Report 2018. To be retrieved from https://news.spdb.com.cn/about_spd/social_responsibile_work/qyshzrxqbd/201905/P020190731559406523497.pdf

- As part of China's Green Credit Guidelines,⁵ banking institutions are obliged to identify, measure, monitor and prevent environmental and social risks associated with lending activities, particularly energy consumption, pollution, land use change, health, safety, ecological protection and climate change. According to the Guidelines, lenders must conduct an environmental and social compliance review and communicate with third parties through an adequate stakeholder participation mechanism.
- Under the Chinese regulations, project owners are obliged to conduct Environmental Impact Assessment for all projects. The financing of banks for projects is limited to those projects/businesses that fulfill/pass an Environmental Impact Assessment.^{6,7} According to the Chinese Environmental Impact Assessment Act, the company must hire an independent third-party and certified impact assessment agency following the public tender process. The regulation stipulates that the assessment must include the identification of key risk factors related to air, water, soil pollution or human health.

Based on the above, Sustainalytics is of the opinion that the Bank and Chinese regulation contribute to the mitigation of environmental and social risks commonly associated with eligible green projects in China.

Section 3: Impact of Use of Proceeds

All six use of proceeds categories are recognized as impactful by the Green Bond Principles 2018. Sustainalytics has focused on three as listed below where the impact is specifically relevant in the local context.

Importance of energy efficient infrastructure deployment and green buildings in China

SPDB intends to use part of the bond's proceeds to finance projects for industrial and buildings' energy efficiency improvement, including the establishment of energy management centers, energy-efficient infrastructure construction projects, as well as construction or renovation of existing buildings with recognized green building certifications, such as LEED and the Chinese Green Building Evaluation Label.

Although China has committed to achieve 60-65% carbon intensity reduction by 2050 against 2005 levels, the country remains the largest GHG emitter globally by being responsible for 27% of global emissions.⁸ Due to the rapidly growing urbanization rate in China,⁹ the energy consumption of the building sector increased by 20% between 2000-2014.¹⁰ As of 2018, the building sector accounts for nearly 20% of China's total energy consumption and 25% of GHG emissions.¹¹ Furthermore, energy use of buildings is expected to increase by more than 40% in the next 15 years, demonstrating the importance of fostering investments in energy efficiency infrastructure.¹² In order to reduce the carbon footprint attributed from the building sector, the Chinese government commits to build 50% of all new buildings under green building certifications¹³ and determined the promotion of energy efficiency as a key target in its 13th Five Year Plan (2016-2020).¹⁴

Based on the above, Sustainalytics is of the opinion that SPDB's use of proceeds for Energy Conservation and Energy Efficiency, as well as Green Buildings are impactful, contributing to reducing energy intensity in the building sector while advancing the government's energy-focused goals in China.

Impact of electric transportation in mitigating climate change in China

⁵ The Green Credit Guideline of China available at: http://www.gov.cn/gongbao/content/2012/content_2163593.htm

⁶ Environmental Impact Assessment in China, technical report available at: https://www.researchgate.net/publication/268503532_Environmental_Impact_Assessment_in_China

⁷ Law of the People's Republic of China on Evaluation of Environmental Effects available at: <https://www.elaw.org/ejalaw/china>

⁸ Global Carbon Project 2018 available at: https://www.globalcarbonproject.org/carbonbudget/18/files/GCP_CarbonBudget_2018.pdf

⁹ Information on urbanization of China available at: <https://ourworldindata.org/urbanization>

¹⁰ China' energy consumption in the building sector: A statistical yearbook-energy balance sheet based splitting method, article available at: <https://www.sciencedirect.com/science/article/pii/S0959652618306152>

¹¹ Press Release available at: <http://global.chinadaily.com.cn/a/201809/28/WS5badd5efa310eff303280115.html>

¹² Analysis of the Chinese Market for Building Energy Efficiency available at: https://www.pnnl.gov/main/publications/external/technical_reports/PNNL-22761.pdf

¹³ Press Release available at: <https://www.greenbiz.com/article/lessons-chinas-ambitious-green-building-movement>

¹⁴ China's 13th Five Year Plan available at: <http://en.ndrc.gov.cn/newsrelease/201612/P020161207645765233498.pdf>

SPDB intends to use part of the bond’s proceeds to finance electrified clean transportation projects, such as an electrified railway system, urban rail transit, public electric buses, electric taxis, and related infrastructure. In accordance with its commitment to reduce carbon intensity by 60-65% below 2005 levels by 2030,¹⁵ China set targets to develop a sustainable society and economy in its 13th Five Year Plan (2016-2020).¹⁶ The plan includes targets dedicated to clean transportation, such as promoting low-carbon transportation services, adopting the application of modern transportation equipment, increasing energy-efficiency in the transport sector, and encouraging market-based reform in the railway sector. In addition, as part of the plan, the government plans to construct 3,000 km of urban rail lines and to expand China’s high-speed rail network by 20%.

Given the importance of low-carbon transportation in China, Sustainalytics is of the opinion that SPDB’s use of proceeds on clean transportation plays an important role in contributing to China’s commitments in mitigating climate change.

Importance of renewable energy investment for reducing China’s reliance on coal

SPDB intends to use part of the bonds’ proceeds to finance renewable energy projects focusing on solar, wind, small hydro and biomass energy.

China was the world’s largest investor in renewable energy in 2017 by financing more than \$44 billion global clean-energy projects, which was a record for Chinese low-emissions-sector investment overseas.¹⁷ Moreover, China is regarded as leading the expansion of solar energy capacity around the world, representing 60% of global solar cell production and 46% of the global solar installation in 2017.¹⁸ China also was a global leader in installation of onshore wind power with 19 GW and hydropower with almost 13 GW in the same year.¹⁹ Although figures demonstrate China’s ambition to enhance renewable energy investments across the globe, the country remains heavily dependent on coal, which accounted for 59% of the country’s energy consumption in 2018.²⁰ In order to achieve 60-65% carbon intensity reduction by 2030 compared to 2005 levels, China aims to reduce its energy reliance on coal, from 64% to 55% of its total energy by 2020²¹, and increase the share of non-fossil fuel energy consumption to 15% of total energy mix by 2020, and to 20% by 2030.²²

Based on the above, Sustainalytics is of the opinion that SPDB’s use of proceeds for Renewable Energy will contribute to expanding renewable energy capacity while supporting the government’s carbon reduction targets in China.

Alignment with/contribution to SDGs

The Sustainable Development Goals (SDGs) were set in September 2015 and form an agenda for achieving sustainable development by the year 2030. This green bond advances the following SDG goals and targets:

Use of Proceeds Category	SDG	SDG target
Energy Conservation and Energy Efficiency	7. Affordable and Clean Energy	7.2 By 2030, increase substantially the share of renewable energy in the global energy mix
Renewable Energy		7.3 By 2030, double the global rate of improvement in energy efficiency

¹⁵ China, Climate Action Tracker <http://climateactiontracker.org/countries/china.html>

¹⁶ China’s 13th Five Year Plan available at: <http://en.ndrc.gov.cn/newsrelease/201612/P020161207645765233498.pdf>

¹⁷ <https://www.carbonbrief.org/china-leading-worlds-clean-energy-investment-says-report>

¹⁸ IEEFA, China Review 2018 available at: <http://ieefa.org/wp-content/uploads/2018/01/China-Review-2017.pdf>

¹⁹ IEA, Renewables 2017: Analysis and Forecasts to 2022

²⁰ Press Release available at: <https://www.reuters.com/article/us-china-energy/chinas-2018-coal-usage-rises-1-percent-but-share-of-energy-mix-falls-idUSKCN1QH0C4>

²¹ China energy efficiency improved in 2016; <http://www.climatechangenews.com/2017/01/30/china-energy-efficiency-improved-in-2016-reports-xinhua/>

²² China’s renewable energy reports record high installed capacity in 2017; http://www.xinhuanet.com/english/2018-02/28/c_137006456.htm

Clean Transportation	11. Sustainable Cities and Communities	11.2 By 2030, provide access to safe, affordable, accessible and sustainable transport systems for all, improving road safety, notably by expanding public transport, with special attention to the needs of those in vulnerable situations, women, children, persons with disabilities and older persons
Sustainable Water and Wastewater Management	6. Clean Water and Sanitation	6.3 By 2030, improve water quality by reducing pollution, eliminating dumping and minimizing release of hazardous chemicals and materials, halving the proportion of untreated wastewater and substantially increasing recycling and safe reuse globally
Green Buildings	9. Industry, innovation and infrastructure	9.4 By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes, with all countries acting in accordance with their respective capabilities.
Environmentally Sustainable Management of Living Natural Resources and Land Use	15. Life On Land	15.A Increase financial resources to conserve and sustainably use ecosystem and biodiversity. Mobilize and significantly increase financial resources from all sources to conserve and sustainably use biodiversity and ecosystems.



Conclusion

The SPDB Green Bond Framework aims to issue green bonds that will advance the energy transition and sustainable development in China. The Framework defines eligibility criteria for projects under the following categories: (i) Energy Conservation and Energy Efficiency, (ii) Renewable Energy, (iii) Clean Transportation, (iv) Sustainable Water and Wastewater Management, (v) Green Buildings, and (vi) Ecological Protection which will promote energy conservation and emission reduction.

Sustainalytics has conducted an assessment of the framework and considers SPDB’s processes for project selection and evaluation, management of proceeds, and reporting to be in alignment with market practices. Based on the above, Sustainalytics considers the SPDB Green Bond Framework to be credible, robust and in alignment with the requirements with the GBP.

Appendices

Appendix 1: Overview of Green Building Certification Schemes

	LEED ²³	Chinese Green Building Evaluation Label (China Three Star) ²⁴
Background	Leadership in Energy and Environmental Design (LEED) is a US Certification System for residential and commercial buildings used worldwide. LEED was developed by the non-profit U.S. Green Building Council (USGBC) and covers the design, construction, maintenance and operation of buildings.	The Chinese 3-Star Green Building Standard is a Certification System used in China for residential and public buildings (including commercial, hotel and government owned) that was introduced in 2006 by MOHURD (Ministry of Housing and Urban-Rural Development).
Certification Levels	Certified Silver Gold Platinum	1-Star 2-Star 3-Star
Areas of Assessment: Environmental Performance of the Building	<ul style="list-style-type: none"> • Energy and atmosphere • Sustainable Sites • Location and Transportation • Materials and resources • Water efficiency • Indoor environmental quality • Innovation in Design Regional Priority 	<ul style="list-style-type: none"> • Land savings and outdoor environment; Energy savings and utilization; • Water savings and utilization; • Material savings and utilization; • Indoor environment; • Operations and management.
Requirements	<p>Prerequisites (independent of level of certification) + Credits with associated points These points are then added together to obtain the LEED level of certification.</p> <p>There are several different rating systems within LEED. Each rating system is designed to apply to a specific sector (e.g. New Construction, Major Renovation, Core and Shell Development, Schools- /Retail-/Healthcare New Construction and Major Renovations, Existing Buildings: Operation and Maintenance).</p>	<p>Prerequisites The system functions on a checklist basis, with 1- Star buildings meeting 26 criteria, 2-Star an additional 43 items, and 3- Star on a further 14 items. Criteria and weighting differ for public and residential buildings. In public buildings, more weight is given to energy and material savings, while the standard for residential buildings places greater importance on urban land saving and outdoor environments.</p>
Performance Display		

²³ <https://new.usgbc.org/leed>

²⁴ <http://www.gbig.org/collections/14970>

Appendix 2: Green Bond / Green Bond Programme - External Review Form

Section 1. Basic Information

Issuer name:	Shanghai Pudong Development Bank Co Ltd
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Green Bond ISIN or Issuer Green Bond Framework Name, if applicable: <i>[specify as appropriate]</i>	SPDB Green Bond Framework
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Review provider's name:	Sustainalytics
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Completion date of this form:	27 September, 2019
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Publication date of review publication: <i>[where appropriate, specify if it is an update and add reference to earlier relevant review]</i>	
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Section 2. Review overview

SCOPE OF REVIEW

The following may be used or adapted, where appropriate, to summarize the scope of the review.

The review assessed the following elements and confirmed their alignment with the GBPs:

- | | |
|--|--|
| <input checked="" type="checkbox"/> Use of Proceeds | <input checked="" type="checkbox"/> Process for Project Evaluation and Selection |
| <input checked="" type="checkbox"/> Management of Proceeds | <input checked="" type="checkbox"/> Reporting |

ROLE(S) OF REVIEW PROVIDER

- | | |
|---|--|
| <input checked="" type="checkbox"/> Consultancy (incl. 2 nd opinion) | <input type="checkbox"/> Certification |
| <input type="checkbox"/> Verification | <input type="checkbox"/> Rating |
| <input type="checkbox"/> Other <i>(please specify)</i> : | |

Note: In case of multiple reviews / different providers, please provide separate forms for each review.

EXECUTIVE SUMMARY OF REVIEW and/or LINK TO FULL REVIEW *(if applicable)*

Please refer to Evaluation Summary above.

Section 3. Detailed review

Reviewers are encouraged to provide the information below to the extent possible and use the comment section to explain the scope of their review.

1. USE OF PROCEEDS

Overall comment on section *(if applicable)*:

The use of proceeds categories of SPDB Green Bond Framework – (i) Energy Conservation and Energy Efficiency, (ii) Renewable Energy, (iii) Clean Transportation, (iv) Sustainable Water and Wastewater Management, (v) Green Buildings, and (vi) Ecological Protection – are recognized by the Green Bond Principles 2018 as project categories having positive environmental benefits. SDPS’s investments will promote energy conservation and emission reduction, hence supporting broader efforts to decrease the environmental footprint of China.

SPDB’s Green Buildings eligibility criterion includes third-party certifications and labels, namely Chinese Green Building Evaluation Label 3 Star and LEED gold or above.

SPDB confirmed to Sustainalytics that it follows a maximum 3-year look-back period for the invested projects. The Company also intends to disclose the portion of financing versus refinancing should the data be available. SPDB intends to finance projects for industrial and building energy efficiency, mainly focusing on district heating and cooling, smart grid, and energy management centers. SPDB confirmed that the projects will provide 30% energy saving subject to availability of data.

SPDB intends to finance ecological protection and restoration projects including the construction of green landscapes, ecological green spaces, and ecological function area of riverside.

SPDB confirmed that all intended investments in renewable energy generation facilities will be exclusively for solar photovoltaic, solar heat utilization, wind, and small-scale hydro energy.

As part of the Sustainable Water and Wastewater Management use of proceeds, SDPB confirmed that flood control projects will only include projects related to river training and wastewater treatment.

Use of proceeds categories as per GBP:

- | | |
|--|---|
| <input checked="" type="checkbox"/> Renewable energy | <input checked="" type="checkbox"/> Energy efficiency |
| <input type="checkbox"/> Pollution prevention and control | <input checked="" type="checkbox"/> Environmentally sustainable management of living natural resources and land use |
| <input type="checkbox"/> Terrestrial and aquatic biodiversity conservation | <input checked="" type="checkbox"/> Clean transportation |
| <input checked="" type="checkbox"/> Sustainable water and wastewater management | <input type="checkbox"/> Climate change adaptation |
| <input type="checkbox"/> Eco-efficient and/or circular economy adapted products, production technologies and processes | <input checked="" type="checkbox"/> Green buildings |
| <input type="checkbox"/> Unknown at issuance but currently expected to conform with GBP categories, or other eligible areas not yet stated in GBPs | <input type="checkbox"/> Other <i>(please specify)</i> : |

If applicable please specify the environmental taxonomy, if other than GBPs:

2. PROCESS FOR PROJECT EVALUATION AND SELECTION

Overall comment on section (if applicable):

SPDB has a three-step project selection and evaluation process, which is in line with current market practices. SPDB confirmed that its project identification and evaluation process will be executed by the green financial product managers of various branches. Upon the approval of projects by investment banking division at SPDB's head office, selected projects will be monitored on a regular basis to ensure projects align with SPDB's Green Bond Framework.

Evaluation and selection

- | | |
|--|--|
| <input checked="" type="checkbox"/> Credentials on the issuer's environmental sustainability objectives | <input checked="" type="checkbox"/> Documented process to determine that projects fit within defined categories |
| <input checked="" type="checkbox"/> Defined and transparent criteria for projects eligible for Green Bond proceeds | <input type="checkbox"/> Documented process to identify and manage potential ESG risks associated with the project |
| <input type="checkbox"/> Summary criteria for project evaluation and selection publicly available | <input type="checkbox"/> Other <i>(please specify)</i> : |

Information on Responsibilities and Accountability

- | | |
|--|--|
| <input checked="" type="checkbox"/> Evaluation / Selection criteria subject to external advice or verification | <input type="checkbox"/> In-house assessment |
| <input type="checkbox"/> Other <i>(please specify)</i> : | |

3. MANAGEMENT OF PROCEEDS

Overall comment on section *(if applicable)*:

Green bond proceeds will be recorded through an independent register (the "Register") and tracked by the Company's Investment Banking Department using the Company's internal processes. Pending full allocation funds will be invested in money market instruments with good credit ratings and market liquidity. This process is in line with current market practice.

Tracking of proceeds:

- | |
|---|
| <input checked="" type="checkbox"/> Green Bond proceeds segregated or tracked by the issuer in an appropriate manner |
| <input checked="" type="checkbox"/> Disclosure of intended types of temporary investment instruments for unallocated proceeds |
| <input type="checkbox"/> Other <i>(please specify)</i> : |

Additional disclosure:

- | | |
|--|---|
| <input type="checkbox"/> Allocations to future investments only | <input checked="" type="checkbox"/> Allocations to both existing and future investments |
| <input type="checkbox"/> Allocation to individual disbursements | <input type="checkbox"/> Allocation to a portfolio of disbursements |
| <input type="checkbox"/> Disclosure of portfolio balance of unallocated proceeds | <input type="checkbox"/> Other (<i>please specify</i>): |

4. REPORTING

Overall comment on section (if applicable):

SPDB will provide an annual allocation report on the company's website as a separate report, including the total amount of proceeds allocated to eligible green assets and the amount of unallocated proceeds. Where feasible, SPDB commits to provide project examples. The impact reporting will include relevant environmental performance indicators. This process is in line with current market practice.

Use of proceeds reporting:

- | | |
|--|---|
| <input checked="" type="checkbox"/> Project-by-project | <input type="checkbox"/> On a project portfolio basis |
| <input type="checkbox"/> Linkage to individual bond(s) | <input type="checkbox"/> Other (<i>please specify</i>): |

Information reported:

- | | |
|--|--|
| <input checked="" type="checkbox"/> Allocated amounts | <input type="checkbox"/> Green Bond financed share of total investment |
| <input type="checkbox"/> Other (<i>please specify</i>): amount of unallocated Proceeds | |

Frequency:

- | | |
|---|--------------------------------------|
| <input checked="" type="checkbox"/> Annual | <input type="checkbox"/> Semi-annual |
| <input type="checkbox"/> Other (<i>please specify</i>): | |

Impact reporting:

- | | |
|--|---|
| <input checked="" type="checkbox"/> Project-by-project | <input type="checkbox"/> On a project portfolio basis |
| <input type="checkbox"/> Linkage to individual bond(s) | <input type="checkbox"/> Other (<i>please specify</i>): |

Frequency:

- | | |
|---|--------------------------------------|
| <input checked="" type="checkbox"/> Annual | <input type="checkbox"/> Semi-annual |
| <input type="checkbox"/> Other (<i>please specify</i>): | |

Information reported (expected or ex-post):

- | | |
|---|--|
| <input checked="" type="checkbox"/> GHG Emissions / Savings | <input checked="" type="checkbox"/> Energy Savings |
|---|--|

- | | |
|---|--|
| <input checked="" type="checkbox"/> Decrease in water use | <input checked="" type="checkbox"/> Other ESG indicators (please specify): Length of tracks built or maintained in case of infrastructure, Additional green area (m2), Number of ecological parks/areas built, Number of protected species |
|---|--|

Means of Disclosure

- | | |
|---|---|
| <input type="checkbox"/> Information published in financial report | <input type="checkbox"/> Information published in sustainability report |
| <input type="checkbox"/> Information published in ad hoc documents | <input checked="" type="checkbox"/> Other (please specify): a separate document to be published on SPDB's official website. |
| <input type="checkbox"/> Reporting reviewed (if yes, please specify which parts of the reporting are subject to external review): | |

Where appropriate, please specify name and date of publication in the useful links section.

USEFUL LINKS (e.g. to review provider methodology or credentials, to issuer's documentation, etc.)

SPDB's corporate website is available at: <https://news.spdb.com.cn>

SPECIFY OTHER EXTERNAL REVIEWS AVAILABLE, IF APPROPRIATE

Type(s) of Review provided:

- | | |
|--|--|
| <input type="checkbox"/> Consultancy (incl. 2 nd opinion) | <input type="checkbox"/> Certification |
| <input type="checkbox"/> Verification / Audit | <input type="checkbox"/> Rating |
| <input type="checkbox"/> Other (please specify): | |

Review provider(s):

Date of publication:

ABOUT ROLE(S) OF INDEPENDENT REVIEW PROVIDERS AS DEFINED BY THE GBP

- i. Second Party Opinion: An institution with environmental expertise, that is independent from the issuer may issue a Second Party Opinion. The institution should be independent from the issuer's adviser for its Green Bond framework, or appropriate procedures, such as information barriers, will have been implemented within the institution to ensure the independence of the Second Party Opinion. It normally entails an assessment of the alignment with the Green Bond Principles. In particular, it can include an assessment of the issuer's overarching objectives, strategy, policy and/or processes relating to environmental sustainability, and an evaluation of the environmental features of the type of projects intended for the Use of Proceeds.
- ii. Verification: An issuer can obtain independent verification against a designated set of criteria, typically pertaining to business processes and/or environmental criteria. Verification may focus on alignment with internal or external standards or claims made by the issuer. Also, evaluation of the environmentally sustainable features of underlying assets may be termed verification and may reference external criteria. Assurance or attestation regarding an issuer's internal tracking method for use of proceeds, allocation of

funds from Green Bond proceeds, statement of environmental impact or alignment of reporting with the GBP, may also be termed verification.

- iii. Certification: An issuer can have its Green Bond or associated Green Bond framework or Use of Proceeds certified against a recognized external green standard or label. A standard or label defines specific criteria, and alignment with such criteria is normally tested by qualified, accredited third parties, which may verify consistency with the certification criteria.
- iv. Green Bond Scoring/Rating: An issuer can have its Green Bond, associated Green Bond framework or a key feature such as Use of Proceeds evaluated or assessed by qualified third parties, such as specialized research providers or rating agencies, according to an established scoring/rating methodology. The output may include a focus on environmental performance data, the process relative to the GBP, or another benchmark, such as a 2-degree climate change scenario. Such scoring/rating is distinct from credit ratings, which may nonetheless reflect material environmental risks.

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