

SECOND PARTY OPINION (SPO)

Sustainability Quality of the Issuer and Green Bond Framework

Kanton Basel-Stadt
6 December 2022

VERIFICATION PARAMETERS

Type(s) of instruments contemplated	<ul style="list-style-type: none">Green Bond
Relevant standards	<ul style="list-style-type: none">Green Bond Principles, as administered by ICMA (as of June 2021 with June 2022 Appendix 1)
Scope of verification	<ul style="list-style-type: none">Kanton Basel-Stadt Green Bond Framework (as of December 5, 2022)Kanton Basel-Stadt Asset Pool (as of December 5, 2022)
Lifecycle	<ul style="list-style-type: none">Pre-issuance verification
Validity	<ul style="list-style-type: none">As long as there is no material change to the Framework and the asset portfolio (as of December 5, 2022)

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SCOPE OF WORK

Kanton Basel-Stadt ('the Issuer') commissioned ISS Corporate Solutions ('ICS') to assist with its Green Bond by assessing three core elements to determine the sustainability quality of the instrument:

1. Kanton Basel-Stadt's Green Bond Framework (December 5, 2022 version) – benchmarked against the International Capital Market Association's (ICMA) Green Bond Principles (GBP).
2. The Asset Pool – whether the projects contribute positively to the UN SDGs and perform against ISS ESG's issue-specific key performance indicators (KPIs) (See Annex 1).
3. Linking the transaction to Kanton Basel-Stadt's overall ESG profile – drawing on the issuance-specific use of proceeds category.

ASSESSMENT SUMMARY

SPO SECTION	SUMMARY	EVALUATION ¹
Part 1: Alignment with GBP	The Issuer has defined a formal concept for its Green Bond regarding use of proceeds, processes for project evaluation and selection, management of proceeds and reporting. This concept is in line with the Green Bond Principles.	Aligned
Part 2: Sustainability quality of the Asset Pool	<p>The Green Bond will (re-)finance eligible asset categories which include: Green Buildings.</p> <p>Those use of proceeds categories have a significant contribution to SDG 11 'Sustainable Cities and Communities', and limited contribution to SDG 7 'Affordable and Clean Energy', and SDG 13 'Climate Action'.</p> <p>The remaining use of proceed categories improve the operational impacts of Kanton Basel-Stadt's borrower(s) and mitigate potential negative externalities of its sector on SDGs 7 'Affordable and clean energy' and SDG 13 'Climate action'.</p> <p>The environmental and social risks associated with those use of proceeds categories are well managed.</p>	Positive
Part 3: Green Bond's link to the Issuer's sustainability strategy	<p>According to the ISS ESG Country Rating Switzerland published on October 21, 2022, the Issuer shows a high sustainability performance on key ESG issues for sovereign Issuers.</p> <p>The use of the Green Bond's proceeds is consistent with the Issuer's sustainability strategy and material ESG topics for sovereigns. The rationale for issuing a Green Bond is clearly described by the Issuer.</p>	Consistent

¹ ISS ESG's evaluation is based on the Kanton Basel-Stadt's Green Bond Framework (December 5, 2022), on the analysed Asset Pool as received December 5, 2022, and on the ISS ESG Country Rating updated on the October 21, 2022 and applicable at the SPO delivery date.

SPO ASSESSMENT

PART I: ALIGNMENT WITH ICMA GREEN BOND PRINCIPLES

This section describes ISS ESG's assessment of the alignment of the Kanton Basel-Stadt's Green Bond Framework (dated December 5, 2022) with the Green Bond Principles

GREEN BOND PRINCIPLES	ALIGNMENT	ISS ESG'S OPINION
1. Use of Proceeds	✓	<p>ISS ESG considers the Use of Proceeds description provided by Kanton Basel-Stadt's Green Bond Framework as aligned with the Green Bond Principles.</p> <p>The Issuer's Green categories align with the project categories as proposed by the Green Bond Principles and criteria are defined in a clear and transparent manner. Disclosure of distribution of proceeds by project category is provided and Environmental benefits are described.</p>
2. Process for Project Evaluation and Selection	✓	<p>ISS ESG considers the Process for Project Evaluation and Selection description provided by Kanton Basel-Stadt's Green Bond Framework as aligned with the Green Bond Principles.</p> <p>The project selection process is defined and structured. ESG risks associated with the project categories are identified and managed through an appropriate process. Moreover, the projects selected show alignment with the sustainability strategy of the Issuer.</p>
3. Management of Proceeds	✓	<p>ISS ESG finds that the Management of Proceeds proposed by Kanton Basel-Stadt's Green Bond Framework as aligned with the Green Bond Principles.</p> <p>The net proceeds collected will be equal to the amount allocated to eligible projects, with no exceptions. The net proceeds will be tracked in an appropriate manner and attested in a formal internal process. The net proceeds are managed per bond (bond-by-bond approach). Moreover, the Issuer discloses the temporary investment instruments for unallocated proceeds.</p> <p>The Issuer commits to segregate the proceeds collected by having them in a central account managed as a temporary measure.</p>

<p>4. Reporting</p>	<p>✓</p>	<p>ISS ESG finds that the allocation reporting proposed by Kanton Basel-Stadt's Green Bond Framework as not aligned with the Green Bond Principles.</p> <p>The Issuer commits to disclose the allocation of proceeds transparently and to report at an appropriate frequency. The reporting will be publicly available on the Issuer's website ². Kanton Basel-Stadt explains the level of expected reporting and the scope of reporting. Moreover, the Issuer commits to report annually, until the proceeds have been fully allocated.</p>
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² The allocation report will be published on the website of the Finanzverwaltung Basel-Stadt (Basel-Stadt tax authority) in the year following the issue. This information will be published on the homepage of the financial administration of Basel-Stadt: <https://www.fv.bs.ch/themen/green-bonds.html>

PART II: SUSTAINABILITY QUALITY OF THE USE OF PROCEEDS CATEGORIES

A. CONTRIBUTION OF THE GREEN BONDS TO THE UN SDGs

Companies can contribute to the achievement of the SDGs by providing specific services/products which help address global sustainability challenges, and by being responsible corporate actors, working to minimize negative externalities in their operations along the entire value chain.





1. Products and services

The assessment of UoP categories for (re)financing products and services is based on a variety of internal and external sources, such as the ISS ESG SDG Solutions Assessment (SDGA), a proprietary methodology designed to assess the impact of an Issuer's products or services on the UN SDGs, as well as other ESG benchmarks (the EU Taxonomy Climate Delegated Acts, the ICMA Green and/or Social Bond Principles and other regional taxonomies, standards and sustainability criteria).

The assessment of UoP categories for (re)financing specific products and services is displayed on a 5-point scale (see Annex 1 for methodology):

Significant Obstruction	Limited Obstruction	No Net Impact	Limited Contribution	Significant Contribution
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Each of the Green Bonds' Use of Proceeds categories has been assessed for its contribution to, or obstruction of, the SDGs:

USE OF PROCEEDS	CONTRIBUTION OR OBSTRUCTION	SUSTAINABLE DEVELOPMENT GOALS
Green Buildings (New buildings) <i>Energy-efficient and ecological criteria:</i> – SNBS - Standard Gold	Significant Contribution	
Green Buildings (New buildings) <i>Energy-efficient and ecological criteria:</i> - Minergie®-P/-A/-ECO- Standard (administrative property) – 2000 Watt-Areal® - Standard	Limited Contribution	
Green Buildings (New buildings) <i>Energy-efficient and ecological criteria:</i> – Compatible with the SIA energy efficiency path.	Limited Contribution	 

2. Improvements in operational performance (processes)

The below assessment aims at qualifying the direction of change (or “operational impact improvement”) resulting from the operational performance projects (re)financed by the UoP categories, as well as related UN SDGs impacted. The assessment displays how the UoP categories are mitigating the exposure to the negative externalities relevant to the business model and the sector of the Issuer.

The table below aims at displaying the direction of change resulting from the operational performance improvement projects. The outcome displayed does not correspond to an absolute or net assessment of the operational performance.

USE OF PROCEEDS (PROCESSES)	OPERATIONAL IMPACT IMPROVEMENT ³	SUSTAINABLE DEVELOPMENT GOALS
<p>Green Buildings Refurbishment/Conversion At least one of the criteria covered</p> <p><i>Energy-efficient and ecological criteria:</i></p> <ul style="list-style-type: none"> - Minergie®/-P/-A/-ECO - Standard Renewal - 25% below the SIA requirements for conversions (QH,li / SIA 308/1) - GEAK® Plus certificate with improvement by at least one category - individual energy measures such as thermal insulation, climate-friendly heat generation (thermal solar systems, heat pumps, regenerative energy sources, heat recovery), photovoltaic systems - Individual ecological measures such as resource-saving construction through the use of existing building fabric (reduction of grey energy), the use of re-source-saving construction methods (timber construction) or the use of recycled materials (recycled concrete, sand, wood, insulating materials with recycled content). 		

³ Limited information is available on the scale of the improvement as no threshold is provided. Only the direction of change is displayed.

B. MANAGEMENT OF ENVIRONMENTAL & SOCIAL RISKS ASSOCIATED WITH THE ASSET POOL

Green Buildings – New Buildings

The table below presents the findings of an ISS ESG assessment of the asset pool⁴ against ISS ESG KPIs. All of the assets are/or will be located in Switzerland.

ASSESSMENT AGAINST ISS ESG KPI

Environmental aspects of construction (or production) and operation

- ✓ 77% of assets provide for sustainable procurement regarding building materials (e.g., recycled materials, third-party certification of wood-based materials). No or limited information is available on sustainable procurements regarding building materials for the remaining projects.

Conservation and biodiversity management

- ✓ 100% of assets are located in the city of Basel and have a policy on responsible site selection in place (e.g., brownfield development, exclusion of protected areas, and sites of high environmental value).

Site selection

- ✓ 100% of the assets are located within 1 km of one or more modalities of public transport.

Construction standards

- ✓ 100% of assets are located in Switzerland where high labor and health and safety standards are in place (e.g., ILO core conventions).

User safety

- ✓ 100% of assets that provide for measures to ensure operational safety according to national legislation (e.g., emergency exits, fire sprinklers, fire alarm systems).

Water

- 15% of the assets provide information on measures to reduce water consumption (e.g., water metering, high-efficiency fixtures and fittings, and rainwater harvesting). No or limited information is available for the remaining assets.

⁴ By number of projects

Green Buildings – Renovation, Refurbishment, Conversion

ASSESSMENT AGAINST ISS ESG KPI

Environmental aspects of construction (or production) and operation

- No or limited information is available on projects that meet high environmental standards and requirements in the supply chain (e.g., Suppliers are required to have an EMS and/or ISO 14001/EMAS)
- No or limited information is available on projects that feature take back and recycling at end-of-life (e.g., WEEE)

Energy efficiency

- ✓ 100% of the assets underwent an appropriate and detailed selection process that ensures good standards regarding energy efficiency.

Labour, Health, and Safety

- ✓ 100% of assets are located in Switzerland where high labor and health and safety standards are in place (e.g., ILO core conventions).

PART III: THE TRANSACTIONS' LINK TO KANTON BASEL-STADT'S SUSTAINABILITY STRATEGY

A. SWITZERLAND'S EXPOSURE TO ESG RISKS

This section aims to provide macro-country level ESG risks and offers additional context to the issuance assessed in the present report. It leverages ISS ESG Country Rating methodology as well as relevant external sources such as United Nations Development Programme, Transparency International and Institute for Economics & Peace.

Issuer overview

Switzerland is located in Western Europe. The Issuer is a federal republic (formally a confederation), classified as a high-income country by the World Bank. The Issuer has an estimated population of 8.4 million inhabitants as of 2020, with 73.849% of its population living in urban areas, and a level of greenhouse gas emissions per capita of 0.07 as of 2019, which has decreased in recent years.

Additional information relating to the Issuer, based on international indices:

INDEX	RANK, AS OF DATE
Human Development Index ⁵	2, in 2020
Corruption Perception Index ⁶	84, in 2021
Global Peace Index ⁷	7, in 2021

ESG risks associated with the Issuer and sovereign Issuers

Leveraging ISS ESG's Country Rating methodology, ISS ESG assessed the current sustainability performance of the Issuer to be high. Please note that the consistency between the issuance subject to this report and the Issuer's sustainability strategy is further detailed in Part III.B of the report.

Key challenges faced by sovereign Issuers in terms of sustainability management are displayed in the table below. Please note, this is not an Issuer-specific assessment.

ESG KEY ISSUES FOR SOVEREIGN ISSUERS	
Political system and governance	Natural resources
Human Rights and fundamental freedoms	Climate change and energy
Green conditions	Product and consumption

⁵ Source: <https://hdr.undp.org/en/countries/profiles/FRA>

⁶ Source: <https://www.transparency.org/en/cpi/2021/index/fra>

⁷ Source: <https://www.visionofhumanity.org/maps/#/>

Exposure to controversial areas

At the date of publication, the country of Issuer is exposed to the following areas which may be considered controversial by investors:

SOVEREIGN CONTROVERSIAL AREAS	DESCRIPTION
Euthanasia	-
Nuclear power	> 10% of total primary energy supply (TPES), no decision on abandoning nuclear power but moratorium on NP plants

B. CONSISTENCY OF GREEN BONDS WITH KANTON BASEL STADT'S SUSTAINABILITY STRATEGY

The Canton of Basel-Stadt is obliged by the constitution to strive for sustainable development. According to section 15 of its constitution, the state is to be guided in the fulfillment of its the needs and well-being of the population and, at the same time, takes into account the dignity, personality and personal responsibility of the individual. It fulfills ecological, economic and social needs of the present generation and at the same time enables future generations to choose their own way of life. In doing so, it works towards the preservation of the natural resources, equal opportunities, cultural diversity, integration, equality and economic development.

The Canton has a holistic understanding of sustainable development. The following six areas can be derived from the cantonal constitution (§ 15):

- Population
- State action
- Basic needs and well-being
- Natural resources
- Green cohesion
- Economic development

These six areas are considered closely interrelated and influence each other in a variety of ways.

Rationale for the Issuance

With the launch of the Green Bond, the Canton of Basel-Stadt aims to promote the sustainable development of the region. The green bonds of the Canton of Basel-Stadt stand for environmentally friendly construction and contribute to conserving resources, minimizing emissions and taking social aspects into account.

Opinion: *ISS ESG finds that the use of the Green Bond's proceeds is consistent with the Issuer's sustainability strategy and material ESG topics for sovereigns. The rationale for issuing a Green Bond is clearly described by the Issuer.*

DISCLAIMER

1. Validity of the Second Party Opinion (SPO): As long as there is no material change to the Framework and the underlying asset portfolio (as of December 5, 2022).
2. ISS Corporate Solutions, Inc. ("ICS"), a wholly owned subsidiary of Institutional Shareholder Services Inc. ("ISS"), sells/distributes SPOs which are prepared and issued by ISS ESG, the responsible investment arm of ISS, on the basis of ISS ESG's proprietary methodology. In doing so, ISS adheres to standardized procedures to ensure consistent quality of responsibility research worldwide.
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ANNEX 1: Methodology

ISS ESG Green Bond KPIs

The ISS ESG Green Bond KPIs serve as a structure for evaluating the sustainability quality – i.e., the social and environmental added value – of the Use of Proceeds of Deutsche Bank’s Green Finance Instruments.

It comprises firstly the definition of the Use of Proceeds category offering added social and/or environmental value, and secondly the specific sustainability criteria by means of which this added value and therefore the sustainability performance of the assets can be clearly identified and described.

The sustainability criteria are complemented by specific indicators, which enable quantitative measurement of the sustainability performance of the assets, and which can also be used for reporting. If most assets fulfil the requirement of an indicator, this indicator is then assessed positively. Those indicators may be tailor-made to capture the context-specific environmental and associated social risks.

Environmental and Social risks assessment methodology

ISS ESG evaluates whether the assets to be financed under the Issuer’s Framework are covered by relevant ESG risk mitigation policies and measures. The assessment “no or limited information is available” either indicates that no information was made available to ISS ESG or that the information provided did not fulfil the requirements of the ISS ESG Green Bond KPIs.

The evaluation was carried out using information and documents provided to ISS ESG on a confidential basis by Kanton Basel-Stadt (e.g., Due Diligence Reports). Further, national legislation and standards, depending on the asset location, were drawn on to complement the information provided by the Issuer.

Assessment of the contribution and association to the SDG

The 17 Sustainable Development Goals (SDGs) were endorsed in September 2015 by the United Nations and provide a benchmark for key opportunities and challenges toward a more sustainable future. Using a proprietary method, ISS ESG identifies the extent to which Kanton Basel-Stadt’s Green Bonds contribute to related SDGs.

ANNEX 2: ISS ESG Country Rating Methodology

ISS ESG's Country Ratings assess the extent to which a sovereign Issuer is positioned to successfully manage salient risks related to ESG themes, thus providing investors with forward-looking information on sustainability risks, adverse impacts, and opportunities for investments.

For more information, please visit:

<https://www.issgovernance.com/file/publications/methodology/Country-Rating-Methodology.pdf>

ANNEX 3: Quality management processes

SCOPE

Kanton Basel-Stadt commissioned ISS ESG to compile a Green Bonds SPO. The Second Party Opinion process includes verifying whether the Green Bond Framework aligns with the Green Bond Principles and to assess the sustainability credentials of its Green Bonds, as well as the Issuer's sustainability strategy.

CRITERIA

Relevant Standards for this Second Party Opinion

- Green Bond Principles
- ISS ESG Key Performance Indicators relevant for Use of Proceeds categories selected by the Issuer

ISSUER'S RESPONSIBILITY

Kanton Basel-Stadt's responsibility was to provide information and documentation on:

- Framework
- Asset Pool
- Documentation of ESG risks management at the asset level

ISS ESG'S VERIFICATION PROCESS

ISS ESG is one of the world's leading independent environmental, social and governance (ESG) research, analysis and rating houses. The company has been actively involved in the sustainable capital markets for over 25 years. Since 2014, ISS ESG has built up a reputation as a highly-reputed thought leader in the green and Green bond market and has become one of the first CBI-approved verifiers.

ISS ESG has conducted this independent Second Party Opinion of the Green Bond to be issued by Kanton Basel-Stadt based on ISS ESG methodology and in line with the ICMA Green Bond Principles.

The engagement with Kanton Basel-Stadt took place in November and December 2022.

ISS ESG'S BUSINESS PRACTICES

ISS has conducted this verification in strict compliance with the ISS Code of Ethics, which lays out detailed requirements in integrity, transparency, professional competence and due care, professional behaviour and objectivity for the ISS business and team members. It is designed to ensure that the verification is conducted independently and without any conflicts of interest with other parts of the ISS Group.

About ISS ESG SPO

ISS ESG is one of the world's leading rating agencies in the field of sustainable investment. The agency analyses companies and countries regarding their environmental and social performance.

We assess alignment with external principles (e.g. the ICMA Green / Social Bond Principles), analyse the sustainability quality of the assets and review the sustainability performance of the Issuer themselves. Following these three steps, we draw up an independent SPO so that investors are as well informed as possible about the quality of the bond / loan from a sustainability perspective.

Learn more: <https://www.isscorporatesolutions.com/solutions/esg-solutions/green-bond-services/>

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