Bhutan Conference on Green Bond Issuance



Session 4: Green Bond Market Development and Issuance

Topic: Green Bond Certification and Preparation

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Climate bonds Certification process for issuers

We will use Climate bond initiative as the example to elaborate the certification process for issuers

- 1. Prepare the Bond
- 2. Engage a verifier
- 3. Get Certified & Issue a Certified Climate Bond
- 4. Confirm the Certification post-issuance
- 5. Report annually





1. Prepare the bond

- Identify assets that meet the relevant sector criteria (e.g. Energy):
 - 1. Inclusion:
 - a. Solar Energy
 - b. Wind Energy
 - c. Bioenergy
 - d. Hydropower
 - e. Geothermal
 - f. Other renewable energy (Sea and Ocean)
 - g. Energy distribution & Management
 - h. Energy Storage
 - 2. Exclusions:
 - a. Nuclear Power
 - b. Fossil Fuels







- Identify assets that meet the relevant sector criteria (e.g. Agriculture & Forestry):
 - 1. Inclusion:
 - a. Forestry activities that:
 - i. Avoid or substantially reduce carbon loss
 - ii. Deliver substantial carbon sequestration
 - b. Agriculture that:
 - i. Reduces carbon and GHG gas emissions
 - ii. Increases soil based carbon sequestration
 - iii. Improves climate resilience
 - 2. Exclusion:
 - 1. Forestry of timber harvesting
 - 2. Agriculture of Peat land







• Explanation and restrictions of the projects (hydropower as an example):

	Hydropower	Run of river and Small hydro <15MW (CDM defined)	Small hydro facilities that require small or no reservoirs.
		Existing large hydro >20MW in temperate zones	
		Re-powering of existing large hydro system	New infrastructure applied to existing facilities that increases the efficiency and energy yield from existing hydro-electric facilities







- Engage a Bond distributor/underwriter
- Determine the **bond terms** and the **coupon rate**
- Draft the private placement offer letter
- Draft an **undertaking** on (examples only):
 - a) The project and asset are not nominated to other financial instrument
 - b) What account will dedicate to manage the proceed
 - c) The use of allocated proceed
 - d) How they are going to manage the unallocated proceed







- Compile supporting information and create Green bond framework:
 - 1. The environmental objectives of the Green Bond and how the issuer's strategy aligns with such objectives, and the rationale for issuing
 - 2. The process by which the issuer determines how Green Projects align with the Cert-issuer's Taxonomy
 - 3. A description of the Green Projects to be financed or refinanced by the Green Bond
 - 4. The process for linking the issuer's lending or investment operations for Green Projects to the Green Bond issued. The issuer shall track the amount allocated to Green Projects in an appropriate manner until such amount equals the net proceeds and document the allocation through a formal internal process
 - 5. A description of the Reporting including information on the expected frequency, the methodology and the assumption to be used for the calculation of core impact metrics related the Cert-issuer's Taxonomy







- Other supporting documents:
 - a) Allocation report detail on the money allocation on different projects
 - b) Impact report:

Impact metrics of hydro-power (environmental):

- i. Run of water
- ii. Temperature of water
- iii. Plant and animal in the river and on land
- iv. Reservoir effect and cause of methane generation
- v. Flooding of land, forest and farmland
- vi. Any special structure to mitigate the impact? (e.g. fish ladders)
- vii. GHG mitigation

Impact metrics of hydro-power (Social):

- i. Relocation
- ii. Archeological sites
- c) Internal control system on use of proceed







- How proceeds of the bond will be used:
 - 1. Prepare a use of proceed statement:

Net Proceed	\$200,000,000
Planning, R&D and EIA	XXXXXXX
Construction	XXXXXXX
Salaries	XXXXXXX
Relocation	XXXXXXX

- 2. Set up an internal audit system to monitor on the proceed
- 3. Set up an internal periodic reporting system (monthly or quarterly)





Sample

GREEN BOND FRAMEWORK



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 - 3.1 Second Party Opinion
 - 3.2 Annual Assurance Report







2. Engage a verifier

- Engage an Approved Verifier to pre- and post-issuance Certification
 - 1. Different Cert-issuer have different criteria and procedure to approve their Verifiers
 - 2. Verifiers normally need to have an internal training to understand the procedure, documentation requirement and the taxonomy of the Certissuer
 - 3. The Verifiers need to collect the relevant information provided by the bond issuer
 - 4. The Verifier need to verify the project using certain international assurance standard
 - 5. e.g. CBI request their verifier to use ISAE 3000 as the assurance standard, verifiers need to have good experience on adopting ISAE3000







Engage a verifier -- continue

- Verifier must be experience in three key areas:
 - 1. Issuance of debt instruments in the capital markets and management of funds within issuing organizations
 - 2. Technical characteristics and performance of low carbon climate resilient projects & assets
 - 3. Assurance procedures and provision of assurance services in line with accepted international standards (ISAE3000 equivalent)
- Role of a Verifier
 - 1. Assess the eligibility of assets and the readiness of the issuer at the pre-issuance stage
 - 2. Provide assurance over the actual use of proceed and internal systems & controls at the post-issuance stage







Engage a verifier -- continue

- About ISAE 3000
 - 1. ISAE3000 is the assurance standard for compliance sustainability and outsourcing audits
 - 2. Mainly deals with assurance of non-financial information
 - 3. The standard includes:
 - a. Ethical requirements
 - b. Required planning and audit procedures
 - c. Reporting requirements
 - d. Quality requirements
 - e. Professional skepticism
 - 4. ISAE3000 recognizes two type of reports: type I report containing the control framework (which is pre-issuance cert stage in CBI); type II report that describes the operational effectiveness of the control framework for a period of six months (which is post-issuance cert stage in CBI







Engage a verifier -- continue

• Sample of an assurance report for Pre-issuance requirements



Independent Practitioner's Limited Assurance Report

To the Board of Directors of Swire Properties Limited

We have been engaged to perform a limited assurance engagement on the selected information described below and set out in the Green Bond Report of Swire Properties Limited (the "Company") as at 30th September 2018.

Selected Information

The scope of our work was limited to assurance over the Selected Information in page 3 of the Green Bond Report as at 30th September 2018 as summarised below:

- · amounts of proceeds allocated to the Eligible Green Projects and
- the remaining balance of unallocated proceeds as at 30th September 2018.

Our assurance does not extend to information in respect of earlier periods or to any other information included in the Green Bond Report as at 30th September 2018.

Reporting Criteria

The criteria used by the Company to prepare the Selected Information is set out in Appendix 1 of this report (the "Reporting Criteria").

Directors' Responsibilities

The Directors of the Company are responsible for:

- · designing, implementing and maintaining internal controls over information relevant to the preparation of the Selected Information that is free from material misstatement, whether due to fraud or error;
- establishing objective in Reporting Criteria for preparing the Selected Information;
- measuring and reporting the Selected Information based on the Reporting Criteria; and
- the content of the Green Bond Report as at 30th September 2018.

Our Independence and Quality Control

We have complied with the independence and other ethical requirements of the Code of Ethics for Professional Accountants issued by the Hong Kong Institute of Certified Public Accountants (the "HKICPA"), which is founded on fundamental principles of integrity, objectivity, professional competence and due care, confidentiality and professional behaviour.

Our firm applies Hong Kong Standard on Quality Control 1 issued by the HKICPA and accordingly maintains a comprehensive system of quality control including documented policies and procedures regarding compliance with ethical requirements, professional standards and applicable legal and regulatory requirements.

Our Responsibilities

It is our responsibility to express a conclusion on the Selected Information based on our work performed and to report our conclusion solely to you, as a body, in accordance with our agreed terms of engagement and for no other purpose. We do not assume responsibility towards or accept liability to any other person for the contents of this report.

We conducted our work in accordance with Hong Kong Standard on Assurance Engagements 3000 (Revised) "Assurance Engagements Other Than Audits or Reviews of Historical Financial Information" issued by the HKICPA. This standard requires that we plan and perform our work to form the conclusion whether the Selected Information is free from material misstatement.

The procedures performed in a limited assurance engagement vary in nature and timing from, and are less in extent than for a reasonable assurance engagement. Consequently the level of assurance in a limited assurance engagement is substantially lower than the assurance that would have been obtained had a reasonable assurance engagement been performed. The extent of procedures selected depends on the practitioner's judgment and our assessment of the engagement risk. Within the scope of our work we performed amongst others the following procedures:

- · made enquiries of the Company's management, including those with involved in providing information relating to the Green Bond Report as at 30th September 2018;
- checked the approval of allocation of proceeds by the Sustainable Development Steering Committee or the Executive Committee of Swire Properties Limited to the Company's proposal for eligible use of proceeds relating to the transactions;
- tested the mathematical accuracy of the remaining balance of unallocated proceeds; and
- checked, on a sample basis, the use of proceeds as approved by the Sustainable Development Steering Committee or the Executive Committee of Swire Properties Limited to capital expenditure supporting payment documents and ensured that these are for approved projects.

Our work did not include reviewing the effectiveness of systems, processes and controls that generated the Selected Information. Thus, our work was not performed for the purposes of expressing an opinion on the effectiveness and performance of the Company's management systems, processes and controls, and not for the purposes of expressing an opinion on any statutory financial statements.

Inherent Limitation

The Selected Information needs to be read and understood together with the Reporting Criteria, which the Company is solely responsible for selecting and applying. The absence of a significant body of established practice on which to draw to evaluate and measure information allows for different, but acceptable, measurement techniques and can affect comparability between entities and over time. The Reporting Criteria used for the reporting of the Selected Information are as at 30th September 2018.

Conclusion

Based on the procedures performed and evidence obtained, nothing has come to our attention that causes us to believe that the Selected Information as at 30th September 2018 has not been prepared, in all material respects, in accordance with the Reporting Criteria.

Restriction on Use

Our report has been prepared for and only for the board of Directors of the Company and for no other purpose. We do not assume responsibility towards or accept liability to any other person for the content of the report.

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PricewaterhouseCoopers



3. Get Certified & issue a Certified Climate Bond

- Pre-issuance Certification
 - 1. Submit the Verifier's Report and Information Form to the Cert-issuer
 - 2. Receive a decision on pre-issuance Certification
 - 3. Issue your bond, using the Certified Climate Bond mark

Verifier Issuer submits **Standards Board** Issuer provides Issuer draft of undertakes updated Info confirms prepares for Information readiness Form & verifier Pre-Issuance Certification Certification Form to CBI assessment report to CBI







4. Confirm the Certification post-issuance

- Within 12 months of issuance, submit the Verifiers post-issuance report
 - 1. The issuer should engage the same Verifier to undertake both the pre-issuance and post-issuance activities under the one engagement
 - 2. The issuer must complete the Assurance Engagement and submit the Verifier's Report to the Climate Bonds Standard Board to maintain the Certification status of the bond awarded at the pre-issuance stage, proving its conformance with the Climate bond Standard
 - 3. If the Climate Bonds Standard Board is satisfied that the issuer and the bond are compliant with the Post-Issuance Requirement of the Climate Bond Standard, it shall provide a statement to confirm the cert of the bond. The issuer then has the right to continue using the Climate Certification Mark for the duration of the bond







Confirm the Certification post-issuance-- continue

Post issuance Certification

Issuer closes book and issues bond Proceeds allocated to projects & assets Verifier undertakes assurance procedures Issuer submits updated Info Form & verifier report to CBI Standards Board confirms Climate Bond Certification





Distribution of the bond

- Work with the distributor and underwriter to distributors
- Conduct road show to targeted investor





5. Report annually

- Prepare a simple report each year for term of the bond
- Provide it to the bond holders and the Cert-issuer

~ Thank You ~



