

Identification of Pilot Tenders and Projects from Target Sectors in Bhutan

Preparing for demonstration of GPP in practice and building demand-
and supply-side GPP capacities

September 2015

Green Public Procurement in Bhutan

ABOUT GPP BHUTAN

The Green Public Procurement in Bhutan project (GPP Bhutan) is an EU-funded project under the EuropeAid SWITCH-Asia Programme. It aims to establish a strategic approach to scaling-up public demand for environmentally and socially preferable goods, services and infrastructure in Bhutan. The project seeks to promote value-for-money across the asset life cycle rather than simply at the point of purchase, in order to reduce the negative environmental impacts and maximize social benefits from procurement.

The project is implemented by a consortium of two international and three national organizations, namely the International Institute for Sustainable Development (Project Lead, Canada), the Bhutan Chamber of Commerce and Industry (Bhutan), the Royal Institute of Management (Bhutan), the Royal Society for Protection of Nature (Bhutan), and the Collaborating Centre on Sustainable Consumption and Production (Germany).

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ABOUT THIS REPORT

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This report was primarily prepared by Kezang with assistance from Pem Lama, and was informed by previous studies conducted by GPP Bhutan project partners.

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- GPP Bhutan (2015). *Quantitative Mapping of Public Procurement in Bhutan: An overview of patterns, volumes and values of public spending on procurement of works, goods and services.* Thimphu.
- GPP Bhutan (2015). *Assessment of Supplier Pre-qualification Requirements in Bhutan: Identifying opportunities for integrating environmental and social criteria in the supplier pre-qualification stage.* Thimphu.
- GPP Bhutan (2015). *Market Assessment of Green Goods, Services and Works in Bhutan: Contextualising and validating target sectors and creating the baseline for procurement-induced green consumption and production.* Thimphu.

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ACRONYMS

10YFP	10-Year Framework of Programmes
ADC	Austrian Development Cooperation
BOIC	Business Opportunity and Information Centre
BSB	Bhutan Standards Bureau
BSR	Bhutan Schedule of Rates
CSME	Cottage, Small and Medium-sized Enterprises
DES	Department of Engineering Services
DGPC	Druk Green Power Corporation
DPR	Detailed Project Report
EC	European Commission
GAP	Good Agricultural Practices
GDP	Gross Domestic Product
GHG	Greenhouse Gas
GPP	Green Public Procurement
ICLEI	International Council for Local Environmental Initiatives
ICT	Information and Communication Technology
IFC	International Finance Corporation
IGPN	International Green Purchasing Network
IISD	International Institute for Sustainable Development
ISO	International Organization for Standardization
IT	Information Technology
LCC	Life Cycle Cost
MLD	Million litres per day
MOAF	Ministry of Agriculture and Forests
MOE	Ministry of Education
MOEA	Ministry of Economic Affairs
MOF	Ministry of Finance
MOFA	Ministry of Foreign Affairs
MOH	Ministry of Health
MOHCA	Ministry of Home and Cultural Affairs
MOIC	Ministry of Information and Communications
MOLHR	Ministry of Labour and Human Resources
MOU	Memorandum of Understanding
MOWHS	Ministry of Works and Human Settlement
NDA	Non-Disclosure Agreement
NEC	National Environment Commission
Nu.	Ngultrum (Bhutanese currency)
PAC	Project Advisory Committee
PPP	Public-Private Partnership
PPPD	Public Procurement Policy Division
PRR	Procurement Rules and Regulations
RGOB	Royal Government of Bhutan
RPN	Responsible Purchasing Network
SCP	Sustainable Consumption and Production
SDC	Swiss Development Cooperation
SDG	Sustainable Development Goal
SNV	Stichting Nederlandse Vrijwilligers (Foundation of Netherlands Volunteers)
SOE	State-Owned Enterprise
TA	Technical Assistance
TT	Thimphu <i>Thromde</i> (Municipality)
UNDP	United Nations Development Programme
UNEP	United Nations Environment Programme
VCA	Value Chain Analysis
VVCP	Vegetable Value Chain Programme

EXECUTIVE SUMMARY

Government and public agencies are major consumers. By using their purchasing power to procure environmentally friendly goods, services and works, government and public agencies can make a significant contribution to Sustainable Consumption and Production (SCP). The promise of “greening” public spending can enable policy makers to “lead by example” through implementing more sustainable practices in their pursuit of sustainable development goals.

By systematically integrating environmental and social considerations into public tenders and projects, the government can use its buying power to send a strong message about its commitment to the development philosophy of Gross National Happiness (GNH) and, more importantly, promote economic activity by creating the demand for more sustainable goods, services and works.

The main focus of this report is to establish a long list of potential pilot tenders and projects from target sectors along with commentaries and then shortlist six pilot tenders and projects for mentoring in the subsequent phases of the project. The mentoring of pilot tenders and projects is aimed to allow for demonstration of GPP in practice and serve as a critical capacity building opportunity for both procurers and suppliers.

A long list of pilot tenders and projects from target sectors, along with commentaries on each potential pilot tender and project are discussed, using the following criteria:

- Level/frequency of public spending on sector
- Environmental/social impact
- Public sectors' market share
- Relevance to domestic production chains
- Participation of cottage, small, and medium-sized enterprises (CSMEs)

Based on public procurement market intelligence data gathered from previous studies conducted under GPP Bhutan, and further supplemented by a literature review of resources on GPP and bilateral meetings held with participating public agencies and other relevant agencies through the first year of the project, the following six pilot tenders and projects in target sectors are shortlisted for real-time mentoring in the later phases of GPP Bhutan:

- i. Tender for office supplies (paper, printing consumables and other stationery)
- ii. Tender for management consultancy services
- iii. Tender for catering: food and beverages services
- iv. Tender for road construction
- v. Tender for building construction
- vi. Project: technical advisory services to Thimphu *Thromde* (municipality) on Public-Private Partnership (PPP) projects

The report also highlights challenges and opportunities associated with the selection of the six pilot tenders and projects for mentoring in the subsequent phases of GPP Bhutan.

This report, along with the other GPP Bhutan activity reports, shall also serve as the basis to seek formal authorisation from target sector public agencies to mentor the six selected pilot tenders and projects and obtain access to all required data for implementation of these tenders and projects. Any sensitive information imparted to GPP Bhutan for this activity will be guarded with utmost confidentiality.

SECTION 1: INTRODUCTION

Government and public agencies are major consumers. By using their purchasing power to procure environmentally friendly goods, services and works, government and public agencies can make a significant contribution to Sustainable Consumption and Production (SCP). The promise of “greening” public spending can enable policy makers to “lead by example” through implementing more sustainable practices in their pursuit of sustainable development goals.

Green Public Procurement, GPP (synonymous with Sustainable Public Procurement, SPP, in this report) is at the core of international cooperation processes on SCP. GPP/SPP features indeed as one of the five initial programmes of the 10-Year Framework of Programmes on SCP (10YFP), a global framework of action adopted by the Rio+20 Conference to accelerate the shift towards SCP in both developed and developing countries. SCP has also emerged as an important part of the 2030 Agenda for Sustainable Development, with one of the 17 goals, Goal 12, devoted to SCP: “Ensure sustainable consumption and production patterns”, with GPP targets and indicators.

The basic concept of GPP relies on having clear, verifiable and justifiable environmental and social criteria for procurement of goods, services and works, based on a life-cycle approach and scientific evidence base.

GPP can have powerful benefits – both for public agencies and for the environment and society, including:

- **Reducing GHG emissions**
GPP can help a country to make major cuts in Greenhouse Gas (GHG) emissions – through energy efficient construction and transport, and choosing products and services with a lower carbon footprint throughout their life-cycle.
- **Meeting other environmental goals**
Air and water quality, resource use, waste generation – all are affected by the purchases that governments and public agencies make. GPP can lead to major improvements both locally and globally.
- **Financial efficiency**
GPP is efficient procurement. A focus on buying only what governments and public agencies need can help reduce overall public spending. Considering the life cycle costs of a product rather than just the purchase price (i.e. also considering usage, maintenance and disposal costs) will also bring clear financial benefits.
- **Moving the market by driving innovation**
As governments and public agencies are such large buyers, they have considerable market power. The purchasing decisions they make can influence the development of new, more sustainable products and services.
- **Boosting supply chain competitiveness**
Encouraging improvements in the products and services offered by suppliers/contractors helps companies improve their competitiveness in national and international markets.
- **Achieving social goals**
Key local issues such as employment, working conditions and the marginalization of certain groups can also be addressed through GPP. GPP can also help tackle global issues such as child labour and fair trade.
- **Demonstrating political commitment**
Implementing GPP is a highly visible way of demonstrating a country’s commitment to sustainability.

Many different approaches to implementing GPP are taken by public agencies in various parts of the world, in terms of organization, scope, ambition and a number of other areas. The right approach for a country will likely depend on a variety of factors including:

- Political/high-level support
- Patterns, volumes and values of procurement
- Knowledge and experience in GPP, and sustainability issues generally
- Availability of sustainable products and services in national and regional markets

However, our public procurement research and analysis show that GPP implementation is possible in any country. GPP ranges from small scale actions such as buying re-cycled paper or fair trade coffee, to the retrofitting of public buildings with high energy efficiency standards or procuring efficient and clean transport services. With such a large market share, public buyers can have a big influence in driving the market towards sustainable solutions.

This report contains the findings from previous studies conducted under GPP Bhutan into the public procurement ecosystem in Bhutan. Based on these findings, and further supplemented by a literature review of GPP resources and bilateral meetings with participating public agencies and other relevant agencies, this report establishes a long list of pilot tenders and projects from target sectors along with commentaries on each potential pilot tender/project, using multiple criteria prescribed in the GPP Bhutan project document. Six pilot tenders and projects are then shortlisted that will allow for mentoring and demonstration of GPP in practice and building demand- and supply-side GPP capacities in the later phases of GPP Bhutan (i.e. work package 6).

The report also highlights challenges and opportunities associated with implementing the selected six pilot tenders and projects.

This report, supplemented by the other GPP Bhutan reports, will serve as the basis for seeking formal authorisation to mentor the six selected pilot tenders and projects in the subsequent phases of the project and obtain access to all required data for smooth implementation of these tenders and projects.

SECTION 2: SCOPE AND METHODOLOGY

2.1 Scope

The main focus of the report is to establish a long list of potential pilot tenders and projects from target sectors along with commentaries and shortlist six pilot tenders and projects for mentoring in the subsequent phases of the project. The mentoring of pilot tenders and projects will allow for demonstration of GPP in practice and serve as a critical capacity building opportunity for both procurers and suppliers.

The report also highlights challenges and opportunities associated with the selection of the six pilot tenders and projects for mentoring in the subsequent phases of the project.

This report, supplemented by the other GPP Bhutan activity reports, will serve as the basis to seek formal authorisation from target sector public agencies to mentor the six selected pilot tenders and projects and obtain access to all required data for implementation of these tenders and projects.

2.2 Methods and Data

This report uses public procurement market intelligence data gathered from previous studies conducted under GPP Bhutan by the project partners. Extensive references are made to the following three peer reports on public procurement in Bhutan:

- GPP Bhutan (2015). *Quantitative Mapping of Public Procurement in Bhutan: An overview of patterns, volumes and values of public spending on procurement of works, goods and services.* Thimphu.
- GPP Bhutan (2015). *Assessment of Supplier Pre-qualification Requirements in Bhutan: Identifying opportunities for integrating environmental and social criteria in the supplier pre-qualification stage.* Thimphu.
- GPP Bhutan (2015). *Market Assessment of Green Goods, Services and Works in Bhutan: Contextualising and validating target sectors and creating the baseline for procurement-induced green consumption and production.* Thimphu.

Further, a literature review of resources on GPP, including academic and other studies (both online and offline) has been conducted and bilateral meetings held with participating public agencies and other relevant agencies through the first year of the project, to supplement the market intelligence data gathered under GPP Bhutan.

A long list of pilot tenders and projects from target sectors, along with commentaries on each potential pilot tender/project are discussed, using the following criteria:

- Level/frequency of public spending on sector
- Environmental/social impact
- Public sectors' market share
- Relevance to domestic production chains
- Participation of cottage, small, and medium-sized enterprises (CSMEs)

Potential pilot tenders and projects, in general, fall into one of the target sectors identified in Table 1.

Table 1: Overview of areas of frequent public expenditure

Goods	Services	Infrastructure
Air conditioning	Management consultancy services	Commercial buildings
Office ICT	IT consultancy services	Residential buildings
Vehicles	Software	Airports
Indoor and outdoor lighting	Servers and data centres	Schools
Paper	Electricity	Correctional facilities
Office supplies	Couriers and postal	Power plants & distribution grids
Fuel	Fleet and vehicles	Water treatment facilities
Furniture	Waste handling	Sewage treatment plants
Apparel	Catering: food and beverage	Municipal/Hazardous waste management facilities
	Landscaping	Roads

Source: GPP Bhutan Project Summary (2014)

Subsequently, six pilot tenders and projects in target sectors are shortlisted for real-time mentoring in the later phases of GPP Bhutan that will allow for demonstration of GPP in practice and building demand-side and supply-side GPP capacities. Decisive factors in determining the pilot tenders and projects include significance in budgetary or sustainability terms, political priorities and sensitivity, upcoming tenders and projects, existence of relevant and easy-to-use criteria, market availability and economic efficiency.

Formal authorisation to mentor these tenders and projects will be sought from target sector public agencies and access to all required data obtained through the next phase of the project. Any sensitive information imparted to GPP Bhutan for this activity will be guarded with utmost confidentiality.

SECTION 3: DATA AND FINDINGS OF GPP BHUTAN PEER REPORTS

This report benefits extensively from the data and findings of three GPP Bhutan peer reports on public procurement in Bhutan conducted by the project partners:

- GPP Bhutan (2015). *Quantitative Mapping of Public Procurement in Bhutan: An overview of patterns, volumes and values of public spending on procurement of works, goods and services.* Thimphu.
- GPP Bhutan (2015). *Assessment of Supplier Pre-qualification Requirements in Bhutan: Identifying opportunities for integrating environmental and social criteria in the supplier pre-qualification stage.* Thimphu.
- GPP Bhutan (2015). *Market Assessment of Green Goods, Services and Works in Bhutan: Contextualising and validating target sectors and creating the baseline for procurement-induced green consumption and production.* Thimphu.

The findings of these peer reports are summarised in the following subsections.

3.1 Data and Findings of Activity 1.1: Quantitative Mapping of Public Procurement in Bhutan

The data and findings of Activity 1.1 under GPP Bhutan are summarised in Table 2, Table 3 and Table 4 below.

Table 2: Public procurement expenditure share, 2008-2013

Procurement Category	Procurement expenditure by				Total		
	Ministries (Million Nu.)	Districts (Million Nu.)	Autonomous Agencies (Million Nu.)	SOEs (Million Nu.)	Million Nu.	Percent	
Goods	8,954	2,325	1,188	4,174	16,641	18%	
Services	12,003	2,098	2,403	5,678	22,182	24%	
Works	23,094	16,474	2,774	59	42,401	47%	
Goods/Services	3,380	888	669	4,632	9,569	11%	
Total	Nu. (Million)	47,431	21,785	7,034	14,544	90,793	100%
	Percent	52%	24%	8%	16%	100%	

Government bodies (ministries, districts and autonomous agencies) and state-owned enterprises (SOEs) together spent Nu. 90.793 billion on procurement during 2008-2013.

The ten ministries spent Nu. 47.4 billion (52 per cent) on procurement, followed by districts spending Nu. 21.8 billion (24 per cent), SOEs spending Nu. 14.5 billion (16 per cent) and autonomous agencies spending the least with Nu. 7 billion (8 per cent). Thus, procurement by ministries, autonomous agencies and SOEs, mostly based in Thimphu, accounted for 76 per cent of the total public procurement spend.

For the same period, works accounted for Nu. 42.4 billion (47 per cent) followed by services with Nu. 22.2 billion (24 per cent), goods with Nu. 16.6 billion (18 per cent) and goods/services with Nu. 9.6 billion (11 per cent), respectively.

Table 3: Capital expenditure by ministries, 2008-2013

Ministry	Procurement expenditure (in Million Nu.)	Procurement expenditure (by per cent)
MOWHS	17,001	35.84%
MOAF	5,605	11.82%
MOH	4,539	9.57%
MOHCA	4,297	9.06%
MOIC	4,196	8.85%
MOE	4,062	8.56%
MOEA	3,263	6.88%
MOF	2,207	4.65%
MOLHR	1,168	2.46%
MOFA	1,093	2.31%
Total	47,431	100%

Out of the ten ministries, the Ministry of Works and Human Settlements (MOWHS) spent the most on public procurement with 35.84 percent, followed by the Ministry of Agriculture and Forests (MOAF) with 11.82 percent and then the Ministry of Health (MOH) with 9.57 percent.

Expenditure on works largely included infrastructure development works namely roads (including culverts, drains etc.) and buildings while expenditure on services was mostly spent on professional services.

Similarly, procurement expenditure at the district level for the same period was also dominated by works, mostly spent on buildings and roads. Of the 20 districts, Trashigang, Monggar and Chukha are the districts with the highest expenditure, most of it concentrated on works. Goods account for the second highest expenditure with major expenditure composed of office supplies, printing, publications, textbooks and library, and furniture.

Table 4: Public procurement expenditure vis-à-vis National Budget and GDP, 2008-2013

Fiscal Year	RGOB Budget (Million Nu.)	Govt. Proc. Exp. (Million Nu.)	Govt. Proc. to National Budget	SOEs Exp. (Million Nu.)	SOEs Proc. to National Budget	GDP (Million Nu.)	Govt. Exp. to GDP	SOEs Exp. to GDP
2008-2009	21,585	8,934	41%	2,095	10%	61,221	15%	3%
2009-2010	26,304	13,298	51%	2,512	10%	72,497	18%	3%
2010-2011	31,587	15,878	50%	2,733	9%	84,950	19%	3%
2011-2012	37,923	19,178	51%	3,179	8%	97,453	20%	3%
2012-2013	33,486	18,963	57%	4,026	12%	104,378	18%	4%
Total	150,885	76,251	51%	14,545	10%		18%	3%

The total public procurement expenditure accounted for approximately 61 per cent of RGOB's total plan budget outlay in the 10 FYP (2008-2013). This translated to an average 21 per cent of the country's GDP. Out of this, the government's procurement expenditure formed 18 per cent while those of SOEs formed 3 per cent of the GDP.

The areas of frequent public expenditure for Bhutan were as follows:

- For Goods – office supplies, printing, publications, text books, library goods, furniture and general tools,
- For Services – professional services, wheeling services, purchase of electricity and aircraft fuel, and
- For Works – construction of buildings, construction of roads, construction of bridges and other structures.

In terms of budget source for procurement expenditure by the ten ministries, RGOB's budget supported 48 per cent (Nu. 22.7 billion) of the total procurement followed by an equally high share of 46 per cent (Nu. 21.8 billion) supported by external grants. Only 6 per cent (Nu. 2.9 billion) was supported through loans.

3.2 Findings of Activity 1.4: Assessment of Public Procurement Supplier Pre-qualification Requirements in Bhutan

The main findings of Activity 1.4 under GPP Bhutan are summarised below:

- The Procurement Rules and Regulations 2009 (PRR 2009, revised June 2014) stipulates a generic provision for pre-qualification under clause 2.2.1 and also cross references to other clauses, namely clause 2.1.3 (Qualification Criteria for Bidders) and clause 5.1.2 (Invitation for Bids).
- The use of supplier pre-qualification processes and procedures are optional. It is generally used for contracts that are large and technically complex in nature, and done so generally to save time and cost during the bidding process.
- Stakeholders (procurers and suppliers) have different understandings and interpretations of the pre-qualification requirements. There are procurers and suppliers who are aware of pre-qualification criteria, requirements and processes. However, there are other groups who either interpret pre-qualification as a form of tendering or ignore it altogether.
- The existing pre-qualification provisions in the PRR 2009 do not make any explicit reference to incentives for enhanced sustainability up the value chain. This provides an opportunity for public procurers to incrementally embed environmental and social criteria in the supplier pre-qualification stage.
- A good starting point is to include green products and services in the Bhutan Schedule of Rates (BSR). However, products and methods of providing services may undergo constant evolution in terms of being greener. Thus, the BSR would either need to provide generic green criteria or be updated regularly.
- In the long term, as the number of complex and high public spend projects increase, there is a need to develop and use a standard pre-qualification document wherein environmental and social sustainability (e.g. ISO14001) criteria are made explicit in the pre-qualification requirements.
- Most importantly, creation of education, awareness and advocacy on the green concept is crucial for successful implementation of GPP in Bhutan. Currently, most stakeholders are either unclear on the concept or have concerns that higher prices make GPP impracticable in the Bhutanese context.

3.3 Data and Findings of Activity 1.5: Market Assessment for Green Goods, Services and Works in Bhutan

3.3.1 Data and findings – Demand side of public procurement

- On the demand side, procurement in the public sector is dominated by the 10 ministries, who account for 52 per cent of public spending.
- Procurement of works accounts for the highest expenditure with Nu. 42.4 billion (47 per cent), followed by services with Nu. 22.2 billion (24 per cent) and goods with Nu. 16.6 billion (18 per cent).
- There is a keen interest among government agencies to promote the production and consumption of green goods, works and services as they directly support economic, environmental, and social sustainability principles that form the cornerstone of GNH.
- In general, procurers were found to be willing to procure green goods, works and services as long as suppliers could ensure consistency in quality and delivery. Procurers are willing to pay a higher price to suppliers if these requirements are met.
- A better interpretation of the PRR 2009 is required by both procurers and suppliers in order to dispel the belief that only the cheapest bid wins and that buyers do not value quality.

3.3.2 Data and findings – Supply side of public procurement

- Interest and willingness was observed on the part of public procurers to purchase local products, even if it was at a comparatively higher price, provided producers/suppliers demonstrated certainty and consistency in the quality and quantity of products they supplied.
- Main building construction materials such as bricks are largely imported whereas others like cement, aggregate/stones, iron/metal and wood/timber are locally sourced. Minor construction materials like glass, plastics and ceramics are 100 percent imported.
- For road construction works, materials like stones, sand and aggregate/gravel are locally obtained whereas tar/bitumen is imported.
- In the services sector, more than 80 per cent of catering (food & beverages) is provided by local caterers/suppliers.
- With regard to goods, most are imported. Even wooden furniture is still mostly imported.
- The Value Chain Analysis (VCA) of two local products (concrete bricks and double-glazed glass windows) showed that locally produced construction materials offer value-added benefits. It not only meets national and international quality standards, but also has other benefits, such as, use of energy efficient and eco-friendly production technologies, use of local resources and creation of employment.
- Suppliers are of the view that while the government encourages them to support green initiatives, protection measures to discourage cheaper non-green products in the market are not in place. There are also no incentives for supply of green goods, works and services. The suppliers suggested the following measures to foster sustainable production towards promoting a green economy:
 - Preferential treatment for green goods, services and works in awarding public contracts
 - Incorporation of green procurement provisions in the PRR and enforcement of its implementation
 - Encouragement for procurement of locally produced and BSB certified products (construction materials), in the PRR and BSR

- Leadership by the government in the shift to a green economy and procurement of green goods and services.
- Suppliers also shared ideas and provided examples for the government to initiate measures that may encourage shift in mindsets and upscaling of production of green goods, works and services in the private sector:
 - Periodic review and revision of PRR, and BSR to embrace green and innovative concepts
 - Protection for locally manufactured products through tax holidays (green tax breaks and subsidies)
 - Providing government land on lease to support local green production/ manufacturing
 - Preferential interest rates or soft construction loans for green buildings
 - Green certification by either existing agencies like MOWHS, BSB and NEC or a Green Building Council (to be established)
 - Awareness, exposure and training programmes to suppliers on public procurement documents and innovative concepts such as green goods, works and services
- Suppliers felt that transparency is key and inherent in the move towards green public procurement because it will enhance the delivery of value for money for the tax payer and the government.
- The need to improve communication channels and coordination between the procurers and the suppliers were also observed. Misconception on incapability of the local suppliers with the public procurers is due to limited communication between the two main stakeholders in public procurement.
- Suppliers from the services sector expressed that there are international projects where local counterparts/consultants are not hired. They felt it should be made mandatory to hire local counterparts, so as to facilitate transfer of knowledge and skills and ensure sustainability in the long run.

SECTION 4: FINDINGS FROM LITERATURE REVIEW AND OUTCOMES OF BILATERAL MEETINGS

Findings from the literature review of resources on GPP and outcomes of bilateral meetings held with participating public agencies and other relevant agencies in the initial implementation phase of GPP Bhutan supplement the data and findings of reports generated in the first year of the project. Together, these provide the basis for drawing up the long list of pilot tenders and projects with commentaries and final selection of the six pilot tenders and projects in the target sectors.

4.1 Findings from Literature Review

A literature review of resources on GPP, including academic and other studies was conducted for the purposes of this report. Data, reports and other information published by IISD, UNEP, ICLEI – Local Governments for Sustainability, the European Commission (EC), the International Green Purchasing Network (IGPN), the Responsible Purchasing Network (RPN) and other initiatives that promote and expand GPP activities were gathered. In addition, online material posted by national governments on their GPP programmes and activities was reviewed where relevant.

Literature and resources on GPP point to the need to consider the following factors in the selection of pilot tenders and projects in the identified target sectors, which will be implemented in the subsequent phases of the project:

- **Environmental and/or social impacts** – How significant are the environmental and/or social impacts of the product/service throughout its life-cycle, compared to other products/services?
- **Budgetary importance** – How much does the public agency spend on the product/service in comparison to other products/services?
- **Potential to influence the market** – How significant are public purchases within the total market for the product/service, and therefore how much influence can they have?
- **Lifecycle cost (LCC) and market availability** – Market research can be useful to determine whether appropriate alternatives are available in the market at a competitive cost (or is the agency prepared to pay slightly more)? The assessment of “cost” should consider all costs throughout the lifecycle – purchase price, usage costs (energy/water consumption, maintenance), and disposal costs.
- **Innovation potential** – Is there an opportunity to encourage the market for new and innovative green products?
- **National priorities** – Are there any product/service groups which are prioritised at the national level, or for which national guidance on GPP (such as recommended criteria) is available?
- **Political priorities:**
 - Are there particular local environmental priorities, such as urban air quality, energy/water consumption, or waste generation?
 - Do certain product/service groups have a high political sensitivity which would hinder GPP activities, e.g. a polluting local industry?
 - What commitment levels can be expected from the ministries/departments/agencies involved?
 - Which product/service groups offer the highest visibility to the public? e.g., low emission buses, publications on re-cycled paper and so on.
- **Practical considerations:**
 - Are there any important contracts up for renewal, or are there long-running contracts existing for certain product/service groups?

- What time and financial resources are available for implementation?
- Are there any particular product/service groups where there is already some environmental and/or social safeguards expertise?
- **Making it easy:**
 - Products will likely be easier to start with than services.
 - Start with a product where environmental and social criteria will be straightforward, e.g., IT equipment, paper, food and so on.
 - Think about products demonstrating the highest potential savings over the life-cycle (typically energy consuming products), or with relatively small levels of spending (such as paper or cleaning products).

4.2 Outcomes of Bilateral Meetings in Thimphu

Based on information gathered during project conception and proposal writing phase by IISD and other implementing partners, and further supplemented by knowledge and experience among its local recruits, GPP Bhutan conducted bilateral meetings with participating public agencies and other relevant agencies based in Thimphu, in the initial phase of the project. Bilateral consultation meetings were held with the following organizations:

- Ministry of Foreign Affairs
- Ministry of Finance (including Public Procurement Policy Division)
- Ministry of Works and Human Settlement
- Ministry of Economic Affairs
- Gross National Happiness Commission
- National Environment Commission
- Thimphu *Thromde* (Municipality)
- Druk Holding & Investments Limited
- SNV Bhutan
- SDC Bhutan
- ADC Bhutan
- UNDP Bhutan
- Asian Development Bank
- World Bank (including IFC)

Takeaways from these meetings were helpful in identifying the potential areas and target sectors for GPP Bhutan to focus on. Potential places to start action included:

- Interest from central government bodies to buy local food, beverages and bamboo waste baskets as well as natural fiber-based disposable crockery for government events
 - Advice on preliminary tenders with incremental scaling
- Funding from the Business Opportunity and Information Centre (BOIC) – an autonomous agency established in 2014 by the RGOB to promote the growth of cottage and small enterprises - and 5 percent procurement set-aside for local suppliers and domestic bidders
 - Advise and explore synergies: to what extent can procuring agencies buy from CSMEs eligible for BOIC funding?

- Procurement arrangements between farmers groups and schools/institutes
 - Review procurement procedures to enable local buying
- Bhutan Green Building Design Guidelines
 - Integration into tenders
- Create market for electric vehicles
 - Design tenders for electric vehicles
- Bhutanese building materials
 - Advice on preliminary tenders with incremental scaling
- Public-Private Partnerships (PPPs)
 - Advice on PPP projects and associated tenders

Most importantly, these meetings opened up dialogues with relevant public agencies and other stakeholders, which were crucial to the success of GPP Bhutan's activities in the first year. Besides, consultations on the modalities for launching pilot tenders and projects in the later phase of the project have been initiated with target sector public agencies.

SECTION 5: LONG LIST OF PILOT TENDERS AND PROJECTS WITH COMMENTARIES

Selecting which procurement categories and sectors to focus preliminary efforts on is important in order to maintain the interest and commitment of procurers, suppliers and the political leadership. This will depend on balancing a number of overlapping and sometimes conflicting considerations such as:

- Goods/services/works where government spend represents a large enough market share to influence and transform the market through changes in demand characteristics
- Items and services of significant spend
- Sectors and production processes where environmental and social impacts are high
- Sectors which are of priority for domestic cottage, small and medium-sized industrial development
- Target sectors for foreign direct investment
- Production processes and sectors that are of priority for sustainable development

For Bhutan, the following selection criteria have been used to arrive at the long list of pilot projects/tenders in target sectors along with commentaries on each tender/project:

- Level/frequency of public spending on sector
- Environmental and/or social impact
- Public sector's market share
- Relevance to domestic production chains
- Participation of cottage, small and medium-sized enterprises (CSMEs)

The selection criteria will determine the potential of the goods/services/works to influence the domestic market. This may be due to the size or visibility of the contract or the value placed by suppliers on having public sector clients.

A longlist of twelve pilot tenders and projects with commentaries is described below.

5.1 Potential Pilot Tenders: Goods

Based on information summarised in Table 1 and supplemented by data and findings of Activity 1.1 and 1.5 reports prepared under GPP Bhutan, the following three potential (Goods) tenders have been identified for piloting:

- i. Pool vehicles
- ii. Office supplies (paper, printing consumables and other office stationery)
- iii. Fossil fuel

Each of these tenders is then subject to the selection criteria for short-listing along with commentaries as elaborated in Table 5.

Table 5: Potential pilot tenders (goods) with commentaries

Selection Criteria	Potential pilot tenders (goods) with commentaries		
	Pool vehicles	Office supplies	Fossil fuel
Level/frequency of public spending	High and frequent spending – high upfront cost + operation and maintenance costs	Significant and frequent spending by all ministries and other public agencies	High and frequent spending vis-à-vis pool vehicles
Environmental and/or social impact	Fossil-fuel run vehicles negatively impacts the environment – air and sound pollution – operational energy impact – high environmental and social impacts over the life cycle	Forest destruction and potential loss of biodiversity, water and energy consumption during production, use of chemicals and optical brightening agents, wastes from disposal, packaging wastes, etc.	Negative impact on environment and society
Public sector's market share	Significant market share, as most government ministries and public sector bodies import vehicles	Very significant as all offices of ministries and other public agencies consume on a daily basis	Government pool vehicles are the major users
Relevance to domestic production chains	Opportunity to promote import of fuel-efficient and hybrid vehicles and e-vehicles manufactured by local companies	Opportunity to promote use of recycled paper, refill toners, traditional paper etc. in offices	All domestic manufacturers deploying fossil-fuel run plants and machinery
Participation of CSMEs	As agents and outlets for foreign vehicle companies	As retailers, vendors and suppliers	As distributors for foreign companies

Further, using the factors for screening of pilot tenders and projects from section 4 of this report, i.e. the findings from literature review and outcomes of bilateral meetings with potential target sector agencies, office supplies (paper, printing consumables and other office stationery) meets the most considerations among the three goods identified. Hence, procurement of office supplies is selected as one of the six tenders for piloting under GPP Bhutan.

5.2 Potential Pilot Tenders: Services

Based on information summarised in Table 1 and supplemented by data and findings of Activity 1.1 and 1.5 reports prepared under GPP Bhutan, the following three potential (services) tenders have been identified for piloting:

- i. Management consultancy
- ii. IT consultancy (including software development)
- iii. Catering: food and beverages

Each of these tenders is then subject to the selection criteria for short-listing along with commentaries as elaborated in Table 6.

Table 6: Potential pilot tenders (services) with commentaries

Selection Criteria	Potential pilot tenders (services) with commentaries		
	Management consultancy	IT consultancy	Catering: food and beverages
Level/frequency of public spending	Significant spending by many government and public sector bodies	Intermittent spending by many government and public sector bodies	High and frequent spending by the government at state/ government events, functions etc.
Environmental and/or social impact	No direct environmental or social impact unless foreign consultants are recruited resulting in carbon footprint from international travel, loss of employment to local consultants etc.	No direct environmental or social impact unless foreign IT consultants are recruited resulting in carbon footprint from international travel, loss of employment to local consultants etc.	<ul style="list-style-type: none"> Impacts from use of harmful chemicals in the production and manufacture of food and beverages, and their transportation Negative impact on the occupational health of farmers due to the mishandling and misuse of certain pesticides and fertilizers
Public sector's market share	Very significant market share	Significant market share	Very significant market share
Relevance to domestic production chains	Relevant to domestic capacity building	Relevant to software development and production chains	Organic production methods and packaging wastes
Participation of CSMEs	Local consultants and consulting firms	Local IT consultants and consulting firms	Rural suppliers and local caterers

Further, using the factors for screening of pilot tenders and projects from section 4 of this report, i.e. the findings from literature review and outcomes of bilateral meetings with potential target sector agencies, management consultancy and catering (food and beverages) meet the most considerations among the three services identified. Hence, procurement of management consultancy and catering (food and beverages) are selected as two of the six tenders for piloting under GPP Bhutan.

5.3 Potential Pilot Tenders: Works

Based on information summarised in Table 1 and supplemented by data and findings of Activity 1.1 and 1.5 reports prepared under GPP Bhutan, the following three potential (works) tenders have been identified for piloting:

- i. Water/sewage treatment plants
- ii. Roads
- iii. Buildings

Each of these tenders is then subject to the selection criteria for short-listing along with commentaries as elaborated in Table 7.

Table 7: Potential pilot tenders (works) with commentaries

Selection Criteria	Potential pilot tenders (works) with commentaries		
	Water/sewage treatment plants	Roads	Buildings
Level/frequency of public spending	Frequent spending by municipal and local agencies	Very high and frequent spending by government/MOWHS – plans to blacktop motor roads till the Gewog Centres by end of 11FYP	High and frequent spending by government and public agencies, mainly in the social sector (e.g. healthcare facilities, school buildings etc.)
Environmental and/or social impact	Triggers environmental and social safeguards	<ul style="list-style-type: none"> Health, safety and environmental risks Traffic and land use impacts to communities 	Impacts from use of buildings – energy consumption, water consumption, indoor air quality, impacts on traffic or land use, waste generation etc.
Public sector's market share	Not very significant	Very significant market share – Department of Roads/MOWHS is the dealing agency	Significant market share – Department of Engineering Services/MOWHS is the dealing agency
Relevance to domestic production chains	Not relevant!	Raw materials such as cement, aggregates/stones, sand and cement	Construction materials such as bricks, cement, aggregates/stones, wood/timber and iron/metal
Participation of CSMEs	Local companies and enterprises participate in building these plants	Local contractors and/or sub-contractors are involved	Local contractors and/or sub-contractors are involved

Further, using the factors for screening of pilot tenders and projects from section 4 of this report, i.e. the findings from literature review and outcomes of bilateral meetings with potential target sector agencies, roads and buildings meet the most considerations among the three works identified. Hence, procurement of roads and buildings are selected as two of the six tenders for piloting under GPP Bhutan.

5.4 Potential Pilot Projects

Based on information summarised in Table 1 and supplemented by the outcomes of the bilateral meetings held with potential target sector agencies under GPP Bhutan, the following three projects have been identified for piloting:

- i. Technical Advisory (TA) services to Thimphu *Thromde* (TT) on PPP projects
- ii. Collaborate with SNV Bhutan to upscale the Vegetable Value Chain Programme in Eastern Bhutan (VVCP-E) to a national level in the form of a policy recommendation
- iii. Review Detailed Project Reports (DPRs) of Druk Green Power Corporation (DGPC)'s recent power plants (Dagachhu and Nikachhu)

Each of these projects is then subject to the selection criteria for short-listing along with commentaries as elaborated in Table 8.

Table 8: Potential pilot projects with commentaries

Selection Criteria	Potential pilot projects with commentaries		
	TA to TT	VVCP – SNV Bhutan	DPRs – DGPC
Level/frequency of public spending	Significant public spend by TT on PPP projects as Bhutan's biggest and capital city, and as one of the fastest growing cities in Asia	Potential to increase volume and frequency of public spend on vegetable supply by farmers groups to schools and institutes	Significant volume and high frequency of public spend on hydropower projects
Environmental and/or social impact	TT's projects trigger both environmental and social safeguards	VVCP fosters social cohesion and strengthens communal bonding/harmony	DGPC projects trigger both environmental and social safeguards
Public sector's market share	Significant market share as more than 1/7 th of the country's population reside in Thimphu	Potential to up-scale across the country contributing to import substitution	Significant market share as hydropower is the highest revenue generator for Bhutan
Relevance to domestic production chains	Creating demand for locally produced construction materials	Creating demand for locally produced vegetables	Capacity building of local contractors to take on future hydropower projects
Participation of CSMEs	Local contractors and sub-contractors participate in TT's projects	Farmers and farmers groups as suppliers	Local contractors participate as JV partners / sub-contractors

Further, using the factors for screening of pilot tenders and projects from section 4 of this report, in particular the findings from the literature review, technical advisory services to Thimphu *Thromde* on PPP projects meets the most considerations among the three projects identified for piloting under GPP Bhutan.

SECTION 6: SIX SELECTED PILOT TENDERS AND PROJECTS

This section describes the six pilot tenders and projects from target sectors in Bhutan that were selected by drawing on the preceding section and further supplemented by additional commentaries taking into account the following key questions:

- Which tenders and projects are practicable for implementation within the project period?
- Which tenders and projects would result in the most benefits to procurers and have long-term impacts on sustainable consumption and production?
- What time and financial resources are available for implementation?
- Does the tender/project provide an opportunity to encourage the market for new and innovative green products/services?
- Does the tender/project have a high political sensitivity which would hinder GPP activities?
- What commitment levels can be expected from the ministries/departments/agencies involved?

The six tenders and projects selected for piloting along with additional corresponding commentaries are described below.

6.1 Tender for office supplies (paper, printing consumables and other stationery)

All offices of the government and other public agencies frequently procure office supplies and will continue to be a significant part of any public office expenditure for the foreseeable future. Public procurement of office supplies in Bhutan is generally done in the first half of a fiscal year.

There are environmental and social impacts associated with manufacturing, using and disposing of office supplies, with additional impacts from printing consumables (toner, cartridges, drums and so on).

The implementation of this pilot tender will involve prior extensive consultation with one of the ministries or public agencies including a thorough internal needs analysis to ascertain the broader impacts of the contract on the procuring agency, and how these could be mitigated to ensure greater returns for the environment, economy and society.

6.2 Tender for management consultancy services

In addition to the findings under activity 1.1 and activity 1.5 of GPP Bhutan, the Royal Audit Authority issued the *Auditor General's Advisory Series 2013 on Procurement of Consultancy Services*. It states that during 2008-2013, the Government spent Nu. 4.6 billion on consultancy services, of which 39 percent was spent on hydropower projects and 9 percent for Accelerating Bhutan's Socio-economic Development (ABSD) project. The other 52 percent were mainly spent for activities such as preparation of drawings and designs of roads, bridges and buildings, drafting of legislation, standards and manuals of a technical nature, development of information systems, and so on.

The RAA study assessed whether the government achieved value for money in the procurement of consultancy services by various procuring agencies and highlighted issues that impede economy, efficiency and effectiveness in the management and procurement of consultancy services. The report also offers a series of recommendations for the government and agencies concerned to bring about value-added partnership in the engagement of consultants.

6.3 Tender for catering: food and beverages services

Catering (food and beverages) services are largely provided by local caterers and restaurateurs in Bhutan. Many government bodies and public agencies frequently procure catering services for organized public events such as meetings, conferences/conventions, workshops, seminars, trainings, exhibitions, and public celebrations.

Hence, it is important to ensure that food and beverages bought by the public sector meet the highest possible standards, from nutritional content through to how and where the food is produced. Rather than using cheaper raw materials that are imported, caterers must supply food and beverages produced from locally sourced raw materials (cereals, vegetables, fruits, etc.). Purchase of food and beverages produced using Good Agricultural Practices (GAPs) must be promoted.

6.4 Tender for road construction

Findings under activity 1.1 of GPP Bhutan show that 28 percent (Nu. 13.26 billion) of the total RGOB budget of the 10th FYP was spent on road infrastructure (including culverts, drains, etc.) and was the highest and frequent public expenditure area, followed by buildings (13 percent) and professional services (8 percent).

Construction and maintenance of road infrastructure is a major source of emissions and energy usage. Procuring green roads, however, is neither commonplace nor trivial to implement. New ways to enhance the green procurement of roads are therefore needed, and can potentially involve life cycle assessment and green labeling methods.

Hence, the project will explore implementing a pilot tender for a green road construction work in close collaboration with the Department of Roads, MOWHS.

6.5 Tender for building construction

Findings under Activity 1.1 of GPP Bhutan show that 13 percent (Nu. 6.36 billion) of the total RGOB budget of the 10th FYP was spent on building construction works, and was the second highest public spend area, after roads (28 percent) and followed by professional services (8 percent). Hence, it is worthwhile for the project to explore implementing a pilot tender for a green building construction work in close collaboration with the Department of Engineering Services/MOWHS. Bilateral discussions are in progress for working together on a government office building construction project.

It is also an opportunity for MOWHS to test the relevance and practicality of the ministry's Bhutan Green Building Design Guidelines (June 2013), which was formulated with the main objective of ensuring that buildings in Bhutan are designed and constructed in a green and sustainable way.

6.6 TA services to TT on PPP projects

Thimphu *Thromde* (TT) implements numerous municipal PPP projects annually in water supply, sewage treatment, waste management, vehicle parking management, roads, street lighting, urban settlement zoning and so on. GPP Bhutan will provide TA services to TT on PPP projects on an ongoing basis within the scope and timeframe of the project.

Besides availing TA services on PPP projects, TT is also keen to explore collaborating with GPP Bhutan to pilot a green tender in implementing a 1 MLD sewage treatment plant for Motithang area under Thimphu municipality. Other immediate areas of interest to TT include reviewing the plastic to oil plant project documents, advisory services on the ongoing street lighting system procurement, and financial analysis on the waste collection and segregation facility.

Formal authorisation to launch these six tenders and projects will be established and access to all required data obtained in the subsequent phase of the project in close consultation with relevant ministries and public agencies. Sustainability criteria to be used in these pilot tenders and projects shall be informed by the GPP handbooks on goods, services and works being developed under the project.

Any sensitive information imparted to GPP Bhutan for this activity will be guarded with utmost confidentiality through Memoranda of Understanding (MOUs) and Non-Disclosure Agreements (NDAs) signed between GPP Bhutan and participating government/public agencies, if required.

The knowledge gained and lessons learnt from implementing the six pilot tenders and projects will feed into establishing the knowledge platform and developing GPP curricula under future GPP Bhutan activities. It will also demonstrate GPP in practice in target sectors and helps build demand-side and supply-side capacities on GPP tenders and projects.

SECTION 7: POTENTIAL CHALLENGES AND PROPOSED SOLUTIONS

The benefits and opportunities of GPP are clear and widely recognized. However, a number of potential challenges remain with regard to the selected six pilot tenders and projects and their successful implementation under GPP Bhutan. These challenges are highlighted in Table 9 along with the proposed solutions to mitigate and/or avoid implementation hurdles going forward.

Table 9: Potential challenges and proposed solutions

Potential Challenges	Proposed Solutions
Securing formal authorisation from PPPD/MOF and procuring agencies	Strategically engage in open dialogue with PPPD/MOF, e.g. through PAC meetings and other public procurement events. Generally, procuring agencies follow PPPD/MOF's procurement directives, guidelines etc.
Access to all required data (e.g. annual work plans including budgets)	Convene one-on-one meetings with procuring agencies to consult and seek their cooperation and pursue signing MOU and/or NDA, with participating public agencies, if deemed necessary
Resistance to change, from both procurers and suppliers	Raise awareness, train and educate both procurers and suppliers, and identify a high-level champion/patron or two for GPP
Market availability of GPP preferable alternatives	<ul style="list-style-type: none"> Good market intelligence about potential sustainable and green solutions available is highly beneficial for public agencies to implement GPP. Informing the market about GPP objectives in advance and engaging in open dialogue with potential suppliers (early market engagement) is an effective way to optimize GPP results.
Cost considerations – Are greener alternatives likely to be cost neutral or will they affect procurers budgets?	Providing simple information on the financial benefits of using life cycle costing, can help to overcome such perceptions, though the short term nature and separation of internal budgets may still cause problems.
Non-availability of national GPP criteria – For many product and service groups, green purchasing criteria need to be developed which can be inserted directly into the pilot tenders and projects	GPP Handbook on Goods and Services in Bhutan, and GPP Handbook on Public Works in Bhutan, both under development, should pave the way for setting national GPP criteria for target products and services, supplemented by international resources on GPP.
Visibility of GPP activities to the public, the market, other contracting agencies and project staff	Conduct advocacy campaigns and outreach programmes on GPP and participate in sustainability initiatives and projects taking place in Bhutan and other countries. High-profile changes like the type of vehicles used by an agency, or a switch to organic food in the schools, can help build awareness on GPP and improve the image of the project and implementing partners.

Besides, target agencies/sectors must have appropriate practical skills, knowledge and access to information to implement GPP tenders and projects. For example, training and guidance may be needed on:

- How to integrate GPP criteria into tender procedures
- Where to find assistance in developing GPP criteria
- How to assess and verify GPP claims made by suppliers
- How to evaluate life-cycle costs in tendering

GPP Bhutan will address these through its various activities in the subsequent phases of the project.

SOURCES AND BIBLIOGRAPHY

- ADB (2014). *Review and Compendium of Environmental Policies and Laws in Bhutan: Input to the Asian Judges Network on Environment*. Prepared by Antonia Gawel and Irum Ahsan for the Asian Development Bank.
- CII (2013). *Public Procurement and Transformative Solutions. A Migration Strategy for India's Procurement in the 21st Century*. Confederation of Indian Industry.
- Ecoinstitut (2013). *SEAD Guide for Monitoring and Evaluating Public Procurement Programs*. Super-Efficient Equipment and Appliance Deployment (SEAD) Procurement Working Group, Collaborative Labeling and Appliance Standards Program (CLASP).
- EEB (2012). *Guidance to Foster Green Public Procurement*. European Environmental Bureau (2012).
- Forum for the Future (2007). *Buying a Better World: Sustainable Public Procurement*. Forum for the Future, London, UK.
- ICLEI (2007). *The Procura+ Manual. A Guide to Cost-Effective Sustainable Public Procurement, 2nd Edition*. ICLEI – Local Governments for Sustainability, European Secretariat.
- ICLEI (2015). *Sustainable Procurement Resource Centre*. Retrieved from: <http://www.sustainable-procurement.org/>
- MOF (2014). *Public Procurement Rules and Regulations 2009 (revised 2014)*. Public Procurement Policy Division, Ministry of Finance.
- Perera, O. (2010). *Procuring Green in the Public Sector: A Checklist for Getting Started*. International Institute for Sustainable Development.
- Perera, O. (2012). *The Case for Pursuing Sustainable Public Procurement in Lower Income Countries*. International Institute for Sustainable Development.
- RAA (2013). *Auditor General's Advisory Series 2013 on Procurement of Consultancy Services*. Royal Audit Authority of Bhutan, Thimphu.
- UNEP (2012). *Sustainable Public Procurement Implementation Guidelines: Introducing UNEP's Approach*. United Nations Environment Programme.
- UNEP (2013). *Sustainable Public Procurement: A Global Review Final Report*. United Nations Environment Programme.
- UNEP (2015). *Sustainable Consumption and Production Indicators for the Future SDGs*. UNEP Discussion Paper.

DEFINITIONS

Autonomous agency: Government agency which is not under the direct purview of the Royal Civil Service Commission.

Bhutan Schedule of Rates (BSR): A publication delivered by the Department of Engineering Services and Bhutan Standards Bureau prescribing rates for works by individual component, the quality, quantity, and scope of which is governed by the Specifications for Building and Road Works.

Bidding documents: The set of documents sold or issued by the intending employer/purchaser/procuring agency to potential bidders in which the specifications, terms and conditions of the proposed procurement are prescribed. The terms "bidding documents", "tender documents" and "bid documents" are synonymous.

Consultancy services: Expert services provided by the contractor based on specialized expertise and skills as to prepare and implement a project, conduct training, provide technical assistance, conduct a research and analysis, work out a design, and supervise the contract execution.

Consultant: An individual of a legal entity entering into a contract to provide consultancy services.

Contractor: An individual or a legal entity entering into a contract to execute works, supplies or services.

Goods: Any object in solid, liquid or gaseous form that has an economic utility or value, which can be exchanged or traded.

Government agency: An entity of the Government whose source of funding is the Government.

Green growth: Growth that emphasizes sustainable use of "natural capital," along with managing environmental risks cost-effectively and in an institutionally sound manner to limit risks to human health and of irreversible degradation of the natural environment.

Life cycle cost (LCC): This is the cost of an asset, or its part throughout its cycle life, while fulfilling the performance requirements.

Procurement cycle: Cyclical process of key steps when procuring goods or services or works, from identification of a need and conducting market analysis through to the process of selecting the supplier, managing their performance and reviewing lessons learnt.

Procurement: The purchase of goods, services or the engagement of contractors for execution of works by procuring agencies.

Procurer: Refers to public agencies engaged in the procurement of goods, works or services.

Services: Consulting and other services.

Standard Bidding Document (SBD): Standard document required under the PRR 2009 to be used for the procurement of goods and works in the bidding processes that are financed in whole or in part by the government.

State Owned Enterprise (SOE): Any enterprise with state ownership, a distinct legal form (separate from the public administration) and having commercial sales and revenues.

Supplier: Refers to any business entity that supplies goods, works or services to the public agencies.

Sustainable Consumption and Production (SCP): The use of services and products which respond to basic needs and bring a better quality of life while minimizing the use of natural resources and toxic materials as well as the emissions of waste and pollutants over the life cycle of the service or product so as not to jeopardize the needs of future generations.

Tender: See Bidding Documents.

Value Chain Analysis (VCA): A process where a firm identifies its primary and support activities that add value to its final product and then analyze these activities to reduce costs or increase differentiation.

Value for Money (VFM): is a term used to assess whether or not an organisation has obtained the maximum benefit from the goods and services it both acquires and provides, within the resources available to it.

Work/Works: Any activity involving construction, fabrication, repair, overhaul, renovation, decoration, traditional Bhutanese painting, installation, erection, excavation, dredging which make use of a combination of labour, machinery, equipment, material and technology.